# THE DEVELOPMENT OF ACCOUNTING IN PALESTINE DURING THE FIRST MILLENNIUM: 1000-332 BC

by

LYNNE CORNELIUS

submitted in accordance with the requirements for the degree of

MASTER OF ARTS

in the subject

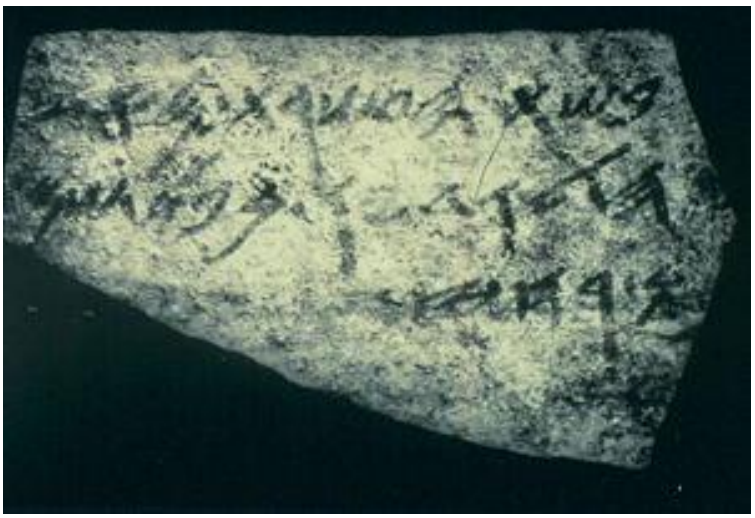
BIBLICAL ARCHAEOLOGY

at the

UNIVERSITY OF SOUTH AFRICA

SUPERVISOR: PROFESSOR M LE ROUX

November 2015



Samaria Ostracon No. 17a: 'In the tenth year, from Azzah to Gaddiyaw, a jar of refined oil'[1]

Arad Ostracon No. 1[2]: 'To Eliashib: And now, give the Kittiyîm 3 baths of wine, and write the name of the day. And from the rest of the first flour, send one homer of flour in order to make bread for them. Give them the wine from the *aganoth* vessels.' (Aharoni 1981:12)

[1] The Center for Online Judaic Studies (http://cojs.org/samaria_ostraca-_8th_century_bce/).
[2] The Center for Online Judaic Studies (http://cojs.org/arad_ostraca-_c-_600_bce/).

Student number: 48495190

I declare that **THE DEVELOPMENT OF ACCOUNTING IN PALESTINE DURING THE FIRST MILLENNIUM: 1000-332 BC** is my own work and that all the sources that I have used or quoted have been indicated and acknowledged by means of complete references.

I further declare that I have not previously submitted this work, or part of it, for examination at UNISA for another qualification or at any other higher education institution.

9 November 2015

..... .....

SIGNATURE DATE

(Mrs L Cornelius)

# SUMMARY

The chief aims of this study are to determine what, if any, accounting processes were employed during the first millennium BC (1000-332 BC) in Palestine, to determine whether these were the result of the socio-economic requirements of the various centralised polities operative in Palestine during this period, how these processes developed over the course of the first millennium and whether they conform to the definition of accounting provided in Chapter One. I have adopted an archaeological, epigraphic and qualitative approach taking into consideration the historical and socio-economic backgrounds of the different political administrations in control during the period under discussion. The evidence demonstrates that the adopted processes can be regarded as accounting processes since they conform to at least three of the four components of the definition of accounting and that these processes developed over the course of time depending on the particular requirements of the ruling authority.

**Key terms:**
Development of accounting; Palestine; Judah; Israel; Assyria; Babylonia; Persia; socio-economic environment; recordkeeping; epigraphic evidence; tokens; bullae; seals; ostraca; papyri; tablets; accounting processes; definition of accounting.

# ACKNOWLEDGEMENTS

This dissertation is the result of an intense interest on my part to learn more about the 'world of the Bible' that was further kindled by my participation in the 2011 excavations at Hazor. It is also due to the effort and sacrifices made, not merely by myself but, more importantly, by those who lent their help and support and without whom this study would not have seen the light of day:

1. First and foremost, my devotion and thanks must go to my Lord, through whom my desire to learn more about Him and the nation that He created was born.

2. The University of South Africa for their financial support throughout the three long years it took to complete this study. Also the Department of Biblical and Ancient Studies, some of whose personnel, who were always just a telephone call away and never stinted on their advice and support, I got to know personally.

3. My supervisor, Magdel le Roux, whom I regard more as a friend than as a lecturer. Thank you for your words of encouragement that always came at just the right moment when I needed them the most as well as for your excellent guidance and advice over the past three years. Hopefully there will be more time for tennis now!

4. Elsabé Nel, Unisa subject librarian, who was always ready to be of assistance whenever I needed it.

5. Irene Barkly, Isabel Blom, Retha Badenhorst, Marie de Wet, Wilna Stavast and Surita Lessing from the Interlibrary Loan department at North-West University in Potchefstroom; Georgene Mulder and Isabel Vogel from the Ferdinand Postma Library; and Hester Lombard, Berna Bradley and Lizette Myburgh from the Theology Library, who all went out of their way to obtain books and articles for me and who also scanned and emailed documents to me when I was unable to go to the library myself. I cannot thank you enough for your unselfish assistance!

6. My friends and colleagues who regularly asked how my study was progressing and always had a word of encouragement for me. A special thanks to Solly, who was always willing to fetch and return books when I was unable to do so, as well as to Gene, who went out of her way to obtain information for me.

7. My parents who have always supported me in whatever I undertook and understood the necessity for me to complete my dissertation and accepted my excuse for not visiting as often with grace. Dad and Mom, I remember where your house is!

8. My children, Dougie and Nikki, and my new son-in-law, MJ, for their understanding and constant support and encouragement. Also, a very special thanks to my husband, Barrie, who, for the most part, drew the short end of the stick – for your love, patience and understanding and for organising dinner whenever you saw I was snowed under.

# TABLE OF CONTENTS

**CHAPTER THREE**

**THE HISTORICAL BACKGROUND AND SOCIO-ECONOMIC ENVIRONMENT IN PALESTINE DURING THE ASSYRIAN, BABYLONIAN AND PERSIAN PERIODS (734-332 BC)**

**CHAPTER FOUR**

**ACCOUNTING PROCESSES IN PALESTINE DURING THE FIRST MILLENNIUM (1000-332 BC)**

# LIST OF ILLUSTRATIONS

# LIST OF TABLES

# CHAPTER ONE

# INTRODUCTION

## 1.1 TERMINOLOGY

'Accounting' is defined as 'the principles and methods involved in keeping a financial record of business transactions and in preparing statements concerning the assets, liabilities and operating results of a business' (Reader's Digest Universal Dictionary 1987:21). The word is derived from the French word *acompt*, which took its origin from the Latin word *computare* and means 'to calculate' (Reader's Digest Universal Dictionary 1987:21, 329). Latin is made up of various Indo-European languages and originated when people from these different language groups came from central Europe to the region of Latium, in which Rome was located, in about 1000 BC (Palmer 1954:38). One of the earliest known Latin inscriptions dates to the sixth century BC (Clackson & Horrocks 2007:2, 86-87). However, the Roman Empire began its rule in Palestine[3] only from 37 BC (Currid 1999:19, Fig. 1). Between the end of the Persian Empire and the beginning of the Roman Empire in Palestine, Greek was the *lingua franca* (Clackson & Horrocks 2007:86). The term for 'accounting' in ancient Greek is *logistikos*, which concerns the practical science of calculation, and is derived from the ancient verb *logidzomai*, which means 'to count', 'to calculate' or 'to bring to account' (Richard 2010:6). The root of *logistikos* is 'log', which means 'to gather', 'to pick', 'to sort', 'to count', 'to number', 'to say', 'to mean' and 'to read'. *Computare* is made up of *com*, which means 'with' or 'together', and *putare*, which means 'to make clean', 'to evaluate' and 'to weigh' (Richard 2010:23). Ancient Hebrew as well as the Arabic language developed from the Phoenician alphabet, albeit in different forms (Richard 2010:4). In spite of this, there is a tie between the two languages for the word 'accounting'. In Modern Arabic, the word for 'accounting' is *mouhâssaba*, which is derived from the verb *hassaba* of which the root is *hsb*, meaning 'to count'. In Modern Hebrew, the word for 'accounting' is *hèshbonaout* and is derived from the root *hech*, meaning 'to think'. It contains the consonants *h*, *sh* and *b*, which

[3] The term 'Palestine' has been in common usage since Neo-Assyrian times and is well attested in classical sources, first and foremost in the *History of Herodotus* (sixth century BC) (Lemche 1997:153; see Thompson 1999:80). To Herodotus, it was simply the southern Syrian region which lay between the Phoenician cities and Egypt. In the absence of a more appropriate term and for the sake of convenience, 'Palestine' will thus be used in this study.

match the Arabic root *hsb* (this root is found in Gn 15:6[4] which reads as follows: Abram believed the Lord, and he counted it to him for righteousness) (Richard 2010:4).

From the above meanings, the different components of the definition of accounting may be determined as follows (Richard 2010:21-25):[5]

- To select relevant information ('to gather/pick/sort');
- To perform calculations ('to count/calculate/number');
- To record the information (for others 'to read'); and
- To give account ('to say').

Each of the above steps involves some form of evaluation and reasoning.

These components may now be compared with today's version and be found to correspond:

- To identify financial information;
- To measure financial information;
- To record financial information; and
- To report financial information (AICPA 1953:9; AAA 1966:1; Myburgh, Fouché & Cloete 2012:2).

The term 'ancient Israel' has been the cause of much dispute among scholars where the 'minimalists' claim the 'ancient Israel' of the Bible is a 'scholarly construct based upon a misreading of the biblical tradition and divorced from historical reality' (Whitelam 1996:3). Accordingly, since there was no ancient Israel, there was also no state of Israel. However, any use of the term in this study is not meant to be controversial. The term 'Israel' comprises various meanings: the person Israel whose name was changed from Jacob to Israel (Gn 32:28); the group of people who came out of Egypt with Moses; the geographical area 'from Dan to Beersheba' prior to and during the early Israelite Monarchy before its division; and the smaller northern kingdom after the division (Stevens 2006:2). Similarly, the term 'Judah' can refer to one of Jacob's sons or to the region allocated to the tribe of Judah which later became the southern kingdom after the division. After the northern kingdom was annexed by the Assyrian empire, the southern kingdom appropriated the name 'Israel'. The use of the terms 'Israel' and 'Judah' throughout this study depends on the period under discussion. Prior to the

[4] The King James Version has been quoted throughout this study.
[5] This definition was derived from Richard's (2010) study of sixty-five languages wherein he studied the word bases or stems together with their roots that were used to denote accounting.

division of the Israelite Monarchy, 'Israel' denotes the geographical area 'from Dan to Beersheba' as well as the group of people who identified themselves as the nation of Israel. After the division, 'Israel' represents the northern kingdom and 'Judah' the southern kingdom.

## 1.2 BIBLICAL OVERVIEW

Glautier (1983:55) writes as follows: 'The objectives of accounting systems may be associated directly with political power structures and the political paradigms on which they are established'.

The Bible narrates the rise of the Israelite Monarchy from the time of Saul (1 Sm 9:15-16) until its fall at the hands of the Assyrians (2 Ki 15:29; 17:5-6; 18:13) and the Babylonians (2 Ki 24:10-16). In these narratives, we read of the threats neighbouring states posed for the Israelite people, their longing for a monarch who would protect them against those threats and the problems experienced by the various monarchs in securing the Israelite nation. However, we also read of their triumphs in consolidating that nation through warfare, the expansion of territory and the establishment of international trade and, ultimately, of the nation's downfall and eventually becoming subject to foreign powers.

David and most of the subsequent kings had to contend with warfare against neighbouring states. David was responsible for appointing civil servants, judges, priests and an army (2 Sm 8:16-18; 1 Chr 18:15-17, 24-27). 2 Chronicles 11:11-12 tells us defences were strengthened and commanders and supplies of food, olive oil and wine were placed in the strengthened towns and cities.

During his reign, Solomon established twelve districts and appointed a governor over each (1 Ki 4:7). These governors were responsible for supplying the king and his household with provisions. His extensive building activities, most notably his palace, the First Temple and other constructions at Megiddo, Gezer and Hazor, are portrayed in the biblical record as well as the materials he used in their construction, some of which were obtained from foreign sources. Under Solomon, the concept of corvée labour in Israel was fully adopted. Before the work was carried out, he conducted a census of all the aliens in Israel in order to determine the number of available workers for these building activities. Even Israelites were conscripted as part of the labour force (1 Ki 5:13). We also read that Solomon received 666 talents of gold

annually, excluding the income received from merchants and traders (1 Ki 10:14-15; 2 Chr 9:13-14).

After Solomon's reign, the Monarchy was split and separate kings for the regions of Judah and Israel were appointed. Jeroboam, who became the first king of the northern kingdom of Israel, erected two golden calves at Bethel and Dan so that his subjects did not have to go to Jerusalem to offer sacrifices. He also built shrines, appointed priests and instituted a festival. In Judah, Rehoboam was appointed king and during his reign, Shishak, the king of Egypt, attacked Jerusalem and carried off the treasures from the Temple and the royal palace (1 Ki 14:25-26; 2 Chr 12:9). We also read that Rehoboam had an army at his disposal (1 Ki 12:21; 2 Chr 11:1). They were succeeded by other kings who strengthened their armies and fortified their territories against their enemies (1 Ki 15:17; 2 Chr 14:7-8; 16:1; 17:1-2), sent gifts of silver and gold to neighbouring rulers in order to establish treaties with them (1 Ki 15:18-19; 2 Chr 16:2-3), built fleets of ships (1 Ki 22:48), collected money to be used for repairs to the Temple (2 Ki 12:9-12; 2 Chr 24:8-11), received tribute from neighbouring regions (2 Chr 17:11) and accumulated much wealth (2 Ki 20:13; 2 Chr 17:11-12; 32:27-29).

The Assyrians, in their turn, exacted tribute payments from the kings of Judah and Israel (2 Ki 16:7-8; 17:3; 18:14-15; 2 Chr 28:21) and commanded a 'large army' (2 Ki 18:17). They deported the people from the northern kingdom of Israel and replaced them with people from the other regions they had conquered (2 Ki 17:23-24). During their conquest of Judah, the Babylonians kept Jerusalem under siege for approximately two years before the city succumbed (2 Ki 25:1-2) and then deported most of the inhabitants to Babylon (2 Ki 25:21; 2 Chr 36:20). When the Persians came into power, they allowed the Israelites to return to their homeland and rebuild their towns and cities and, according to the biblical narratives (Ezr 1:4), even provided them with silver, gold, goods and livestock. We also read that people from Tyre living in Jerusalem imported fish and other merchandise and sold them to the inhabitants of Judah (Neh 13:16). In addition, the two books of Ezra and Nehemiah include several references to taxes.

A centralised government, such as those discussed above, requires means in order to fulfil its function as protector of and provider to the nation. In early Israel, warfare and the expansion of territory necessitated manpower and supplies. In this respect, international trade was able to provide some of those requirements. Additional income was produced in the form of taxes and this was also used to provide for building projects and for the upkeep of temples. This, in

turn, required records to be kept of the number of military personnel and the receipt and distribution of supplies. During the Assyrian, Babylonian and Persian periods, these empires governed the region of Syria-Palestine from afar, which in turn dictated that more complex measures be taken to ensure that control over the area was maintained. This inevitably suggests that accounting most likely played an important role in their affairs.

According to Garbutt (1984:88), data was recorded for three main purposes, namely, for future use, for the communication of information and for ceremonial use. Documents from the ancient world indicate that accounting was important even then. Abundant evidence from Mesopotamian and Egyptian sources regarding the recordkeeping of economic transactions exists. However, there appears to be limited evidence from the beginning of the first millennium BC up to the Assyrian conquest; thereafter, the evidence increases substantially.

A preliminary literature review indicates that an enormous amount of research has been done on the origins of counting and accounting and how this appears to have led to writing and the development of the different alphabets, but much of this research has been conducted in Mesopotamia and Egypt. Some research has also been conducted on recordkeeping methods in Palestine during the monarchic period, as well as during the Assyrian, Babylonian and Persian periods. However, this research appears to concentrate on recordkeeping methods in general and does not focus on the contributions of the available evidence in the development of accounting during the first millennium BC in Palestine.

## 1.3 RESEARCH PROBLEM

It is not clear what emphasis was placed on the importance of accounting in Palestine and how this developed during the first millennium BC from the reign of David up until the end of the Persian era. No study focusing specifically on accounting processes appears to have been made for the period characterised by the advent of the Monarchy, followed by the Assyrian, Babylonian and Persian periods in the region so that one may determine if and how these methods developed over the course of approximately seven centuries. In addition, to my knowledge, no books appear to exist that focus specifically on accounting processes during the monarchic period. Furthermore, any books providing information on the processes used during the Assyrian, Babylonian and Persian periods include this information only as small sections concerning coinage, weights, measures and lists of supplies. The bulk of information concerns economics and trade and, while this most certainly influences accounting, very little

attention is focused on the processes used to record economic transactions, how these developed during the first millennium BC and whether these processes were applied to achieve certain objectives or were merely used for the sake of recordkeeping.

## 1.4 HYPOTHESIS

An archaeological and epigraphic approach might be helpful in determining what accounting processes were employed during the first millennium BC and, in particular, how they developed. As is generally the case, methods and processes change or improve due to developing technologies and adjusting needs – one of the objectives of this study would be to determine whether this was the case from 1000-332 BC. This evidence may then be applied to ascertain whether these processes were employed with the specific objectives of the relevant administration in mind. The hypothesis established for this study is, therefore, that accounting processes during the first millennium BC in Palestine were the result of the socio-economic requirements of the various centralised polities operative in the region and that these processes developed over the course of several centuries. Furthermore, these accounting processes conform to the definition of accounting.

## 1.5 AIMS AND OBJECTIVES

The primary aim of this dissertation is to conduct a study of the accounting processes adopted in Palestine from the beginning of the first millennium BC until the end of Persian rule in the region and to determine the development of these processes during this period. To this end, the study will use archaeology and epigraphy to fill the gaps in current research.

The focus of this study will be on the historical and socio-economic background during the relevant period; the history of scripts, languages and the alphabet; and the available epigraphic evidence concerning the recording of accounting transactions. My objectives will be to examine the accounting processes employed and to determine whether these processes conform to the four components of the definition of accounting (see 1.1) and whether these processes adapted and improved over the delineated time period.

## 1.6 RESEARCH METHODOLOGY

### 1.6.1 Approach

This study will examine ancient accounting processes from an archaeological and epigraphic perspective and will make use of a combination of research methods. A qualitative approach, which constitutes an attempt to gain a deeper understanding of people in terms of their own definitions of their worlds and which in turn requires interpretation, will be employed wherein a study based largely on analysing extant information will be conducted (Le Roux & Vermaak 2013:8-9). The study will also use an archaeological approach since it will investigate, analyse and interpret material culture and environmental data and use this to determine what accounting processes were employed during the first millennium BC in Palestine.

Even when past studies, such as Finkelstein & Silberman (*David and Solomon: in search of the Bible's sacred kings and the roots of Western tradition,* 2006), Mazar (*The era of David and Solomon*, 1979), Stern (*Archaeology of the land of the Bible: Volume II*, 2001), Mazar (*Archaeology of the land of the Bible: 10,000-586 B.C.E.,* 1992) and King and Stager (*Life in biblical Israel,* 2001), include discussions on international and domestic trade, the economy and types of currencies in use in Palestine during the first millennium BC, none have focused on the impact these and other factors had on the development of accounting methods. With this in mind, this study will examine the socio-economic environment during the first millennium BC by considering the historical situation as well as the development of writing and how these affected the processes used to record transactions. Attention will be given to both textual and artefactual evidence.

### 1.6.2 Structure of dissertation

Following the introduction, a discussion of the socio-economic environment of Palestine during the monarchic period as well during the Assyrian, Babylonian and Persian periods will be followed by the epigraphic evidence for accounting systems during the first millennium BC in Palestine. The body of the dissertation is therefore divided into chapters based on these divisions.

*Chapter Two. The historical background and socio-economic environment in Palestine during the United and Divided Monarchies.* During Iron 1, the structure of rural households

comprised extended families, which were led by lineage or village elders. However, this structure was affected by urbanisation during the establishment of the Monarchy during Iron II and usually comprised only nuclear families. Once ancient Israel became a state, it required people and produce in order to carry out its obligations of being protector of and provider to its people. To necessitate this, the state conscripted soldiers and levied taxes. In turn, this required account to be kept of what was received and what was distributed.

This chapter will therefore describe the requirements for the establishment of a state as well as look at the forms of administration under the various Judaean and Israelite monarchs. This will provide the socio-economic background against which the recording of economic data became a necessity. As mentioned above (see 1.2), Glautier (1983:53, 55) states that the political structure during any given period dictates the accounting systems that were employed by each political dispensation. These systems may have included the extent of resources controlled by the state, the levying of taxation to provide the necessary income for the state and the possible threat of war which required extra resources.

*Chapter Three. The historical background and socio-economic environment in Palestine during the Assyrian, Babylonian and Persian periods (734-332 BC).* This chapter will look at the historical background and the characteristics of the Assyrian, Babylonian and Persian conquests since this will assist in establishing the socio-economic environment within which Palestine operated while subject to foreign rule. The archaeological evidence for the establishment of administrative centres in Palestine, or the lack thereof, as well as the development of bureaucracy in its various formats under the auspices of the foreign empires during their rule in the region will also be discussed.

*Chapter Four. Accounting processes in Palestine during the first millennium (1000-332 BC).* This chapter will discuss the emergence of writing and the development of various scripts and written languages in Palestine as one of the requirements for statehood and will also briefly describe the role of the scribe in recording information. The rest of the chapter will be devoted to an examination of the epigraphic evidence, namely ostraca, tablets and papyri, regarding the recording of transactions with respect to the receipt and distribution of commodities, the receipt of tax payments and the recording of debt.

*Chapter Five. Conclusion.* This chapter will summarise the most salient points of each of the preceding chapters. From this, based on the definition of accounting (see 1.1), a conclusion

will be reached on what accounting processes were employed during the first millennium BC in Palestine, how these processes developed during the course of seven centuries and whether they conform to the definition of accounting.

## 1.7 LITERATURE REVIEW

The information for this study was obtained from primary sources, such as textual (including biblical and extra-biblical), epigraphic and archaeological evidence, and from secondary sources, such as specialised books and articles. Internet databases were used to gain access to specialised electronic journal articles and theses. These secondary sources provide additional information on the epigraphic and archaeological finds. All available sources have, however, been treated with circumspection since some are not meant to be regarded as historical writings and others often reflect the writers' own ideologies.

### 1.7.1 Primary sources

The primary sources consulted for this study comprise the biblical books 1 and 2 Kings, 1 and 2 Chronicles, Ezra and Nehemiah; the Assyrian, Babylonian and Persian sources; and other textual and epigraphic evidence in the form of papyri, tablets and ostraca. Due to the fact that such evidence from Palestine is not readily available to students located outside the region, I have relied heavily on the translations of many of the Assyrian, Babylonian and Persian texts and inscriptions which are available to students with little or no knowledge of the Akkadian, Aramaic or Old Persian languages. These works include *Ancient records of Assyria and Babylonia, Volumes I and II* translated by Luckenbill (1968a & 1968b), the *Assyrian and Babylonian Chronicles* translated by Grayson (1975), the *Cyrus Cylinder* translated by Oppenheim (in Pritchard [ed], 1969), translations of *The Royal Inscriptions of the Neo-Assyrian Period* which are available on the RINAP Project website (2011) and *Reliefs and inscriptions at Karnak, Vol. III: the Bubastite Portal* by Hughes et al (1954) who provide photographs and facsimile drawings of the inscriptions on the Bubastite Portal which was built by Shishak I and forms the southern entrance to the First Court of the Temple of Amun at Karnak. Sources that were consulted concerning administration methods and accounting processes in the form of numerous deciphered epigraphic inscriptions, bullae, seals, coins, ostraca, tablets and papyri include *The lmlk research website* by Grena (2002); 'Bullae and seals from a post-exilic Judean archive' by Avigad (1976a) in *Qedem*; *Corpus of West Semitic stamp seals* by Avigad (1997); 'Hebrew bullae' by Shoham (2000) in *Excavations at the City*

*of David 1978-1985: Vol. 6 Inscriptions*; 'A hoard of Tyrian and Athenian coins from Dalton, Israel' by Gitler and Tal (2014) in *Phéniciens d'orient et d'occident: Mélanges Josette Elayi*; 'A hoard of Phoenician coins' by Lambert (1932) in *Quarterly of the Department of Antiquities of Palestine*; *Arad inscriptions* by Aharoni (1981); *The objects from Samaria* by Crowfoot, Crowfoot and Kenyon (1957); *Leaves from an epigrapher's notebook* by Cross (2003); *Hebrew inscriptions* by Dobbs-Allsopp et al (2005); *Aramaic papyri of the fifth century B.C.* by Cowley (1923); 'The Elephantine papyri in English: three millennia of cross-cultural continuity and change' by Porten (1996) in *DMOA: Studies in Near Eastern Archaeology and Civilisation, Vol. XXII*; *The Lachish Letters* by Torczyner (1938); *Wadi Daliyeh II: the Samaria papyri from Wadi Daliyeh* by Gropp (2001); 'An Aramaic joint venture agreement: a new interpretation of the Bauer-Meissner papyrus' by Szubin and Porten (1992) in *Bulletin of the American Schools of Oriental Research*; 'The Aramaic inscriptions' by Naveh (1973) in *Beer-Sheba I: **e**xcavations at Tel-Beer-Sheba 1969-1971 seasons*; *Aramaic ostraca of the 4th century BC from Idumaea* by Ephʿal and Naveh (1996); and 'New Aramaic ostraca from Idumea and their historical interpretation' by Lemaire (2006) in *Judah and the Judeans in the Persian period*.

### 1.7.2 Secondary sources

Secondary sources consulted include numerous books and articles that have been written regarding the historical and socio-economic environment in Palestine during the period covered by this research, the emergence of writing and the development of the accounting processes in the region. As far as I have been able to ascertain, there are no books that focus specifically on accounting processes in Palestine during the first millennium BC – the archaeological evidence pertaining to recordkeeping, weights, measures and currency is usually included as separate sections in books discussing archaeological evidence in general or included under other related sections. In addition, this evidence is not necessarily discussed within the context of accounting and the development thereof.

For information on the historical and socio-economic environment from the beginning of the first millennium BC until the end of the Persian era in Palestine, a number of books and articles were consulted. *A history of Israel* by Bright (2000) explains the reasons for the rise of the Monarchy and provides a comprehensive discussion of the reign of each Israelite monarch as well as the following periods characterised by the conquests of Palestine by the Assyrians, Babylonians and Persians. *Archaeology of the land of the Bible: 10,000-586 B.C.E.*

by Mazar (1992) provides extensive histories for each distinctive period from the Neolithic period until the end of the Babylonian period. These two authors also discuss demographics, settlement patterns, socio-economic environment, literacy and the most relevant archaeological discoveries pertaining to each period. In addition to his discussions of the archaeological discoveries pertaining to the Assyrian, Babylonian and Persian periods in Palestine, Stern (*Archaeology of the land of the Bible: Volume II*, 2001) provides comprehensive historical information for each of these periods. Nam (*Portrayals of economic exchange in the Book of Kings*, 2012) describes the effect the Assyrian empire had on Palestine with respect to population shifts, the upgrading of fortifications with its associated need for resources and people, the exaction of tribute payments and the explosion of literary activity, most specifically, of economic texts, which include the Samaria and Arad Ostraca.

Detailed information on the development of the different alphabets and scripts used in the ancient Near East is provided by King and Stager (2001) in *Life in biblical Israel*, by Rollston (2010) in *Writing and literacy in the world of ancient Israel*, by Kutscher (1982) in *A history of the Hebrew language*, by Naveh (1982) in *Early history of the alphabet: an introduction to West Semitic epigraphy and palaeography* and by Hess (2006) in 'Writing about writing: abecedaries and evidence for literacy in ancient Israel' in *Vetus Testamentum*. This is supported by archaeological and epigraphic evidence. Scribal education and the importance of scribes are also discussed by Rollston as well as by Stone (1969), who discourses on the scribal profession during the reigns of David and Solomon in 'Antecedents of the accounting profession' in *The Accounting Review*.

An important source for the administrative systems that were employed during the first millennium BC can be found, most notably, through the use of ostraca as well as seals and seal impressions on bullae and other clay objects. These give an indication of who was responsible for what. The recording of transactions is found, *inter alia*, on ostraca from Samaria, Arad, Meẓad Ḥashavyahu, Ḥorvat ʿUza, Lachish, Tell el- Farʻah (South), Tell el-Kheleifeh, Beersheba, Tell Jemmeh and sites in Idumaea and Philistia as well as in documents from Elephantine and the Wâdi ed-Dâliyeh. A number of scholars discuss these finds at length. They include Nam (*Portrayals of economic exchange in the Book of Kings*, 2012), Aharoni ('Three Hebrew ostraca from Arad' in *Bulletin of the American Schools of Oriental Research*, 1970), Kaufman ('The Samaria ostraca: an early witness to Hebrew writing' in *The Biblical Archaeologist*, 1982), Dearman ('On recordkeeping and the preservation of documents in ancient Israel [1000-587 BC]' in *Libraries and Culture*, 1989), Stern

(*Archaeology of the land of the Bible: Vol II*, 2001) and Mazar (*Archaeology of the land of the Bible: 10,000-586 B.C.E.,* 1992). Röthlin's (2009) dissertation, 'Gold and silver for a kingdom – the Judaean economy in the Iron Age II: possible sources for King Hezekiah's wealth', provides comprehensive information on the Judaean economy during Iron II as well as archaeological evidence for domestic and international trade, corvée labour and taxes. King and Stager (2001) supply specific information on trade, weights and currency during the first millennium BC in *Life in biblical Israel*.

The sources that were consulted concerning the available epigraphic evidence in the form of ostraca, tablets and papyri for the application of accounting processes are included under 'Primary sources' above (see 1.7.1).

# CHAPTER TWO

## THE HISTORICAL BACKGROUND AND SOCIO-ECONOMIC ENVIRONMENT IN PALESTINE DURING THE UNITED AND DIVIDED MONARCHIES

### 2.1 INTRODUCTION

Biblical, extra-biblical and archaeological sources provide a vast amount of information on the period of the Divided Monarchy (ca. 925-586 BC), particularly from the time of the Assyrian conquest (see Chapter Three). Unfortunately, written sources for the period of the United Monarchy are mainly limited to the biblical narratives, while archaeology for this period is sparse and does not provide conclusive evidence for a number of questions: what material evidence exists for the United Monarchy; does archaeology reflect the transition from a tribal society to a centralised government; and what evidence is there for the complex international trade relations, particularly during Solomon's time (Mazar 1992:369-371)?

Talmon (1979:5) states that 'only under the monarchy did Israel crystallize as a people with a common faith and consciousness of a common origin and establish a national territorial framework on a basis of political sovereignty'. The need for a centralised form of government as opposed to the former traditional tribal society resulted from the prolonged struggle against Israel's neighbours, particularly the Philistines (Mazar 1992:369; Talmon 1979:9).

According to Yeivin (1979b:147), a central authority must function according to certain requirements. He states as follows:

> Any social entity organized on the basis of a central authority, ... necessarily needs a certain set of practical conventions on which it acts, both in executing its functions, as well as in maintaining its relations with the individuals comprised in that entity, in order to enforce their compliance with their duties, and to ensure the exercise of their rights. Moreover, any such entity, ... requires a regional division and a hierarchical grading in organizing its functioning and carrying out its duties ... of the population toward its ruler on the one hand, and those of the ruler toward his subjects on the other.

Two basic requisites for the continuity of a central government are the administration of the nation and the organisation of an army (Talmon 1979:13-15). Soldiers must be recruited,

trained and furnished with weapons. In ancient times, a central government also made it possible to introduce cavalry and chariots, which in turn required accommodation and stables. The co-ordination of all these factors can only be carried out by a central authority. Flowing from this are the provisions needed for military personnel and, as a result, taxation is introduced. This, in turn, requires administration of and control over the nation's finances through the recording of transactions, which, in turn, requires that administrative personnel be engaged and compensated (Talmon 1979:14).

According to numerous scholars, the most important criterion for the emergence of 'statehood' is a centralised administration (Dever 1997:248; Finkelstein 1999:39; Gelinas 1995:228; Mazar 1992:369; Sahlins 1968:6; Service 1962:175; see Dever 2002:126). 'Statehood' is characterised not by size and urbanisation, but by monumental architecture, organised industrial production and the emergence of writing (Finkelstein 1999:39).[6] These three aspects will, therefore, be discussed (the former two in this chapter and the third in Chapter Four) in order to determine whether the United and Divided Monarchies conformed to these characteristics since this will support the need for accounting. Prior to this, however, a concise history for the relevant periods will be provided as background.

## 2.2 THE UNITED MONARCHY (CA. 1020-925 BC)[7]

Mazar (1992:387-389) is of the opinion that 'the rise of the Monarchy brought about changes in the socioeconomic structure of Israelite society, and in consequence a new pattern of settlement was formed'. This resulted in small villages either being abandoned or converted to a more urbanised culture. Occupation levels dating to the time of David and Solomon (tenth century BC) have been excavated at various sites throughout Palestine: Megiddo, Hazor, Gezer, Dan, Taanach, Yoqneam, Tell Abu Hawam, Tel Mevorakh, Shiqmona, Tirzah/Tell el-Farʿah (North), Tell el-Mazar, Tell Qasîle, Beth-Shemesh, Timnah/Tel Batash, Tell Beit

[6] Finkelstein & Silberman (2006:100-101) propose that the northern kingdom of Israel attained the status of a 'state' only from the mid-ninth century BC and the southern kingdom of Judah only from the seventh century BC (see Dever 2002:124). Other references on the phenomenon of 'statehood' include Dever (1997), Gelinas (1995), Meyers (1998) and Schäfer-Lichtenberger (1996).

[7] The debate on whether there was a United Monarchy and whether Saul, David and Solomon were actual historical monarchs as well as the precise dates and length of their reigns has been the source of much debate (see Dever 2002; Finkelstein & Silberman 2006; Fritz & Davies 1996; Handy 1997), one that does not fall within the scope of this study (readers can also refer to the Tel Dan stele, dated to the reign of Jehoram, king of Judah [ca. 847-842 BC], which mentions 'the House of David' [Biran & Naveh 1993:90, 93; Dever 2002:128]). This chapter is mainly concerned with the socio-economic environment and the archaeological evidence pertaining to the presence of a centralised administration in Palestine during the monarchic period.

Mirsim, Lachish, Arad and Tel Beersheba. Fortifications have been uncovered at Megiddo, Hazor, Gezer, Yoqneam, Tell Beit Mirsim, Tell en-Naṣbeh and Beth-Shemesh (Mazar 1992:387-389).

Settlement in the central Negev[8] highlands also expanded during the tenth century BC, probably in order to secure the trade with Arabia (Cohen 1985; Mazar 1992:390; Meshel 1977:132). Fortified settlements (referred to as 'fortresses') were located on hills while other groups of unfortified dwellings were found either adjacent to the fortresses or at some distance from them.[9]

### 2.2.1 Historical background

#### *2.2.1.1 Saul[10]*

Saul is not mentioned in any extra-biblical source (Finkelstein & Silberman 2006:64). However, according to the biblical narratives, Saul was the first king of Israel and came from the town of Gibeah (currently identified with Tell el-Ful) in the region of Benjamin (1 Sm 10). 1 Samuel 14:47-48 summarises Saul's reign as follows:

> After Saul had assumed rule over Israel, he fought against their enemies on every side: Moab, the Ammonites, Edom, the kings of Zobah, and the Philistines. Wherever he turned, he inflicted punishment on them. He fought valiantly and defeated the Amalekites, delivering Israel from the hands of those who had plundered them.

Although one of the main reasons for the appointment of Saul as king was to defend Israel against the Philistines, Saul began his military campaigns against the Ammonites who were laying siege to Jabesh Gilead and succeeded in liberating the town (Tsevat 1979:67; Yeivin 1979b:148; see 1 Sm 11:1-11). His son, Jonathan, followed this up by attacking the Philistine outpost of Geba in Benjamin (1 Sm 13:3-4). The Philistines responded by gathering at Michmash, but Saul and his men drove the Philistines out of the region. Even though Saul had to contend with the Philistines throughout his reign (see 1 Sm 14:52), according to Tsevat

[8] Although different scholars use either 'Negeb' or 'Negev', the spelling 'Negev' is used throughout this study.
[9] The dating of these fortresses has been attributed to the late eleventh century BC by Finkelstein (1986), while Meshel (1977:132) states that, *if* (my italics) they are to be attributed to the eleventh century BC, they should be dated to the time of Saul.
[10] Although the reign of Saul falls outside the realm of this dissertation, I have included a brief history for the sake of comprehensiveness.

(1979:68-69), he is to be acknowledged as the king who consolidated the Israelite tribes and formed them into a nation.

#### *2.2.1.2 David*

After Saul's death, his son, Ish-Bosheth, became king 'over Gilead, Asher and Jezreel, and also over Ephraim, Benjamin and all Israel', which he ruled from Mahanaim in Transjordan (2 Sm 2:8-9), while David ruled over Judah from Hebron for the first seven and a half years of his reign (2 Sm 5:5). After the death of Ish-Bosheth, David attacked and conquered Jerusalem, 'took up residence in the fortress and called it the City of David' and established his sovereignty over Judah and Israel for the next 33 years (2 Sm 5:5-9). He proceeded to subjugate his enemies that surrounded the region of Palestine: Philistia, Ammon, Moab, Edom, the Bedouin of the Negev and the Arameans (Aharoni 1968a:261). David exacted tribute from the Moabites and the Arameans, established garrisons in Damascus and throughout Edom and consigned the Ammonites to forced labour (2 Sm 8:2, 6, 14; 12:29-31). The Phoenicians under Hiram, king of Tyre, on the other hand, as well as the territories of Hamath, Geshur and Philistia[11] were allowed to maintain their independence, but were subject to some kind of treaty (Aharoni 1968a:261, 264; Malamat 1963:14-15). Tyre and Hamath also provided numerous gifts to David, including cedar logs, stonemasons and carpenters for his palace as well as silver, gold and bronze (2 Sm 5:11; 8:9-10), while, during Solomon's reign, Philistia felt obligated to extradite Shimei's slaves, who had sought asylum in Gath, back to Israel (1 Ki 2:39-40).[12]

---

[11] Malamat (1963:14-15) asserts that David did not conquer Philistia itself, but only broke their military power. According to him, most of David's campaigns against the Philistines took place outside or on the borders of Philistia, but did not penetrate far into the region itself (see 2 Sm 5:25; 21:15-22; 1 Chr 14:16; 20:4-8). The places mentioned in these passages are Gibeon, Gezer, Gob and Gath. Gibeon and Gezer fall outside Philistia (Perego 1999:39, Map 21); Gob, an abbreviation for Gibbethon (Eissfeldt 1943:120-122), was originally identified with Tel el-Malat, 5 km west of Gezer (Von Rad 1933:30), but may also have been identified with either Tell Ras Abu Hamid or Eltekeh, although Eltekeh may also be located at Tell esh-Shallaf (Na'aman 1986a:108); and Gath is not to be confused with the city-state of the same name, but is located in northern Philistia (Malamat 1963:15) and has been identified with Tell Ras Abu Hamid by Mazar (1954:231-232, 234-235). The biblical narratives do not, as with Edom, Moab and Ammon, mention any tribute being paid by Philistia or of any military or administrative authority being established in the region by David. This can also be seen in the incident where Shimei's slaves fled to the city-state of Gath, something that would not have occurred if Philistia had been under Israelite rule (1 Ki 2:39-40). However, according to Aharoni (1968a:261), David conquered the region of Ekron in the northern part of Philistia.

[12] In the ancient Near East, the extradition of refugees formed not only part of a vassal treaty, but also of what is referred to as a 'parity treaty', a treaty between equally sovereign states (Malamat 1963:15).

David's kingdom therefore extended from the border of Egypt in the south to the border of Hamath in the north and from the desert in the east to the Mediterranean Sea in the west (Figure 2.1). As a result, David controlled two important trade routes, the *Via Maris* ('Way of the Sea'), the Latin name for a route extending from Egypt along the coast to Syria, and the King's Highway, which also extended from Egypt to Damascus in Syria, but first turned eastward across the Sinai Peninsula before turning north through Transjordan to Syria (Silver 1983:41-42). Moreover, due to the agreement with the region of Hamath, David's control also included the desert routes to Tadmor as well as Tiphsah, which was located on the Euphrates (Aharoni 1968a:264).

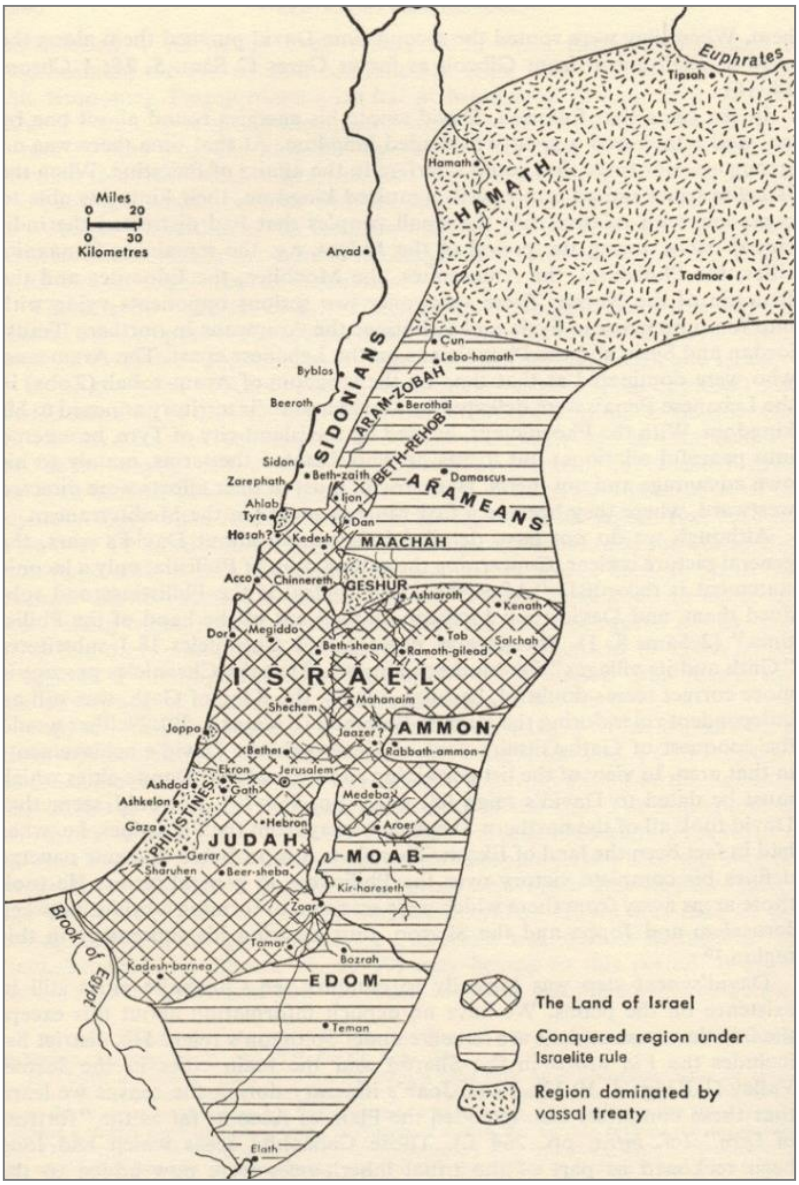



Figure 2.1: David's kingdom (Aharoni 1968a:262, Map 21)

*2.2.1.3 Solomon*

After David's death, Solomon had to contend with dealing with a handful of domestic political enemies (Malamat 1963:11; Mazar 1979:92). According to 1 Kings 2:13-46, these included Adonijah (Solomon's older brother), Joab (the commander of the army), Abiathar (the priest) and Shimei (who had cursed David). This may have provided the Egyptian Pharaoh with the opportunity to reconquer Philistia, which culminated in an attack on Gezer on the north-eastern border of Philistia (Aharoni 1968a:272; Malamat 1963:11). Aharoni (1968a:272, 275) offers the explanation that, due to Egypt's loss in power during the previous two centuries, it was unable to penetrate further into Palestine and thus preferred to enter into a treaty with Solomon by offering Gezer to him as a gift on his marriage to Pharaoh's daughter. Malamat (1963:17) explains further that the appearance of the Egyptians on the doorstep of Israel and the capture of Gezer held significant political implications for Solomon and, although he could have responded using military interventions, he chose instead to offer the treaty whereby the Egyptian Pharaoh was compelled to concede some of his conquered territory in the form of a dowry to Solomon.[13]

It is not possible to determine with certainty which Pharaoh attacked and conquered Gezer (Malamat 1963:11-12). However, contemporary Egyptian sources indicate that it could most likely have been Siamun, who ruled circa 976-958 BC (Kitchen 1986:110-111; Malamat 1963:12). A relief from Tanis, which depicts Siamun attacking an enemy armed with a weapon characteristic of the Sea Peoples, may serve as corroborating evidence. Moreover, a scarab bearing the name of Siamun was found at Tell el-Farʿah (South) – identified with ancient Sharuhen – which is located on the road running from Egypt to Philistia. Sharuhen was previously an important Egyptian stronghold and may have been re-established as such by Siamun as part of his campaign against Philistia. More evidence possibly supporting a campaign by Siamun against Philistia comes from Tel Mor, located close to Ashdod (Dothan 1978:889-890). The Philistine stratum (Stratum III), which was a small open settlement

[13] Although marriage alliances were frequently used in the ancient Near East to cement diplomatic relations between two rulers, it was previously unheard of for an Egyptian ruler to offer his daughter's hand in marriage to a foreigner (Malamat 1963:8, 10). According to Malamat (1963:11), the fact that Egypt resorted to such an arrangement is indicative of Egypt's inferior status as a significant political power at the time, a fact testified to, in his opinion, by the split of the Egyptian kingdom into the northern Tanite and southern Theban factions. Contrast Kitchen (1986:110-111) who states that, contrary to the New Kingdom period half a millennium earlier, from the end of the eleventh century BC, marriages between a Pharaoh's daughter and a foreigner are well attested. Moreover, 'the Tanite and Theban lines were largely two branches of one family' and Siamun's invasion of Philistia was for the mutual benefit of Egypt and Israel due to the Philistine threat.

comprising agricultural structures, courts and silos, was destroyed during the early tenth century BC. Siamun could have carried this out on his way to reconquer Philistia, although it is also possible that David destroyed the settlement during one of his campaigns against the Philistines (Dothan 1978:890).[14] Malamat (1963:15), however, maintains that Gezer was not conquered by David, but remained under Philistine rule until it was attacked by Siamun.

As mentioned above, the Egyptian Pharaoh did not concede all of his conquered territory to Solomon. Subsequently, Solomon lost possession of Ekron and the coastal region as far as the Yarkon River, and Gezer became a frontier fortress (Aharoni 1968a:275). Solomon also lost the region of Aram following a rebellion by Rezon, who took control of Damascus, as well as the region of Edom when Hadad returned from Egypt, where he had sought refuge during the reign of David, and revolted against Solomon. In spite of this, Solomon managed to retain control over the Arabah and Ezion-geber/Elath. Moreover, Solomon gave twenty Galilean towns to Hiram, king of Tyre, as part payment for the supply of materials and labour for the construction of the temple and his palace (Aharoni 1968a:275; see 1 Ki 9:11-13). Consequently, Solomon's kingdom was significantly smaller than the kingdom ruled by David (Figure 2.2).

[14] On the other hand, if Malamat's assertions are correct (see n. 11),[15] David would not have penetrated this far into Philistia.
[15] Throughout this study, the abbreviation 'n.' denotes the word "note".


Figure 2.2: Solomon's kingdom depicting the twelve administrative districts (Aharoni 1968a:276, Map 23)

### 2.2.2 Monumental architecture

Monumental architecture, as one of Finkelstein's (1999:39) requirements for statehood, is referred to in this study in terms of monumental buildings such as palaces, fortresses, administrative buildings, shrines and temples as well as city walls and gates.

#### *2.2.2.1 Saul*

(a) Gibeah

A fortress (Fortress I) that may possibly be attributed to the time of Saul was excavated at Gibeah. Based on pottery evidence, it has been dated to the first part of the second period at Tell el-Ful, circa 1020-1000 BC (Albright 1933:7-8; Graham 1978:23; Sinclair 1960:26). This fortress was originally attributed to the first period at the site (thirteenth-twelfth centuries BC). The fortress was later destroyed by fire, either early in Saul's reign before the battle at Michmash or at the end of his reign after the battle of Gilboa. Since the reconstruction of the fortress (Fortress II) closely followed the original plan, Albright (1933:8) prefers the former alternative while Sinclair (1960:6) favours the period after the battle of Gilboa. This second fortress was abandoned circa 990 BC (Sinclair 1960:6-7) and was replaced by another fortress (Fortress III) and a revetment that was built only much later, during the eighth century BC (Albright 1933:10). Unfortunately, as Albright explains further, virtually every trace of Fortress II that was located outside the revetment was used in the construction of Fortress III and a later village.

(b) Megiddo

Megiddo during Saul's time was a typical Canaanite-Philistine settlement (Yadin 1970:94-95). Structures were large and spacious and were built of brick laid on stone foundations. The narratives in 1 Samuel 13:19-20 are supported by the evidence of a vast amount of metal tools found at the site. The settlement was destroyed, possibly by David, and was followed by a poor unfortified settlement with the outside walls of the houses serving as a defensive wall (Yadin 1970:84, 94-95).

#### *2.2.2.2 David*

(a) Jerusalem

A structure built over a stone terrace system was excavated on the eastern slope of the City of David above the Gihon spring (Mazar 1992:374). It is known as the 'Stepped Stone Structure' and is part of a massive retaining wall, preserved to a height of 16.5 m that, most likely, supported a monumental building for which, unfortunately, no remains have been found. The

dates of the structure and the terraces have been ascribed to different periods by various scholars: Mazar, A (2006:260-264) dates both elements to either Iron I or early Iron II[16] based on contemporaneous pottery assemblages; Cahill (1998) also suggests a contemporaneous date, but slightly earlier, during the thirteenth-twelfth centuries BC; Mazar (1992:374) ascribes the structure to the tenth century BC (he does not mention the date of the terraces specifically); Steiner (1998) attributes the terraces to Iron I and the structure to the tenth century BC; and Finkelstein and Silberman (2006:270) assert that, based on pottery found within the structure itself, the latest of which they attribute to, possibly, the early eighth century BC, its construction should be dated to 'at least a century later than the days of David and Solomon'. Based on some tenth century BC ceramic evidence found on the floors built just above the 'Stepped Stone Structure', the structure was partially dismantled to make way for a new building during this period (Cahill 1998). Mazar, E (2006) found remains of another large building, which she termed the 'Large Stone Structure', north of the 'Stepped Stone Structure', similar in style and perhaps forming part of that structure. Kenyon (1963:17-18; see Mazar, E 2006) had originally found a section of this structure that she attributed to a casemate wall built by Solomon. Mazar, A (2006:270; 2010:34) concurs with Mazar, E (2006) that these two structures are part of the same unit. Walls between 1.8 m and 2.4 m wide were found and the north-eastern side of the structure was built atop a 6 m high man-made rock scarp. The building was erected on a previously unsettled area that, according to Mazar, E (2006), fell outside the earlier Canaanite city walls. Subsequent phases of construction have been dated to Iron IIA (tenth-ninth centuries BC) based on pottery remains, while Iron I pottery was found beneath the building. Consequently, Mazar, E (2006) dates the original construction of the building either to the end of Iron I or the beginning of Iron II and questions the possibility of this being David's palace. Alternatively, Mazar, A (2006:269-270; 2010:40-41) and Faust (2010:119-123, 127) date both structures to Iron I, which would then indicate that they could, perhaps, be part of the Jebusite fort and, therefore, are not part of the palace that was built for David.[17] Mazar (2010:45-46) refers to 2 Samuel 5:7-8, which states that David renamed the Jebusite fort and tentatively suggests that these finds may indicate that 'Jerusalem was a rather small town with a mighty citadel, which could have been a center of a substantial regional polity'. Pottery dated to the eighth-sixth centuries BC (Iron IIB), found in the north-eastern corner of the building, provides a *terminus post quem* for the use of the

[16] This study uses the Iron Age chronology advocated by Mazar (2011:105-107).
[17]For detailed writings on the subject, see Faust (2010), Finkelstein (2011), Finkelstein et al (2007) and Mazar (2010).

building. Numerous Iron IIA ceramic remains have been found in excavated areas in the south-eastern corner of the City of David (Areas D and E), which may be compared with Lachish V (see 2.3.2.8) (Mazar, A 2006:266). Apart from these finds, the general shortage of Iron IIA remains in Jerusalem complicates the task of determining the precise character of the site during this period. Taking into consideration that from the eighth century BC, there is considerable evidence for a strongly fortified settlement at Jerusalem (see 2.3.2.6), it is difficult to understand how the site developed so quickly from an ostensibly small settlement (Ussishkin 2003:109).

(b) Megiddo and Tell Qasîle

The destruction of Megiddo Stratum VIA and Tell Qasîle Stratum X has been dated to the first quarter of the tenth century BC, most likely as a result of David's expansion into Philistia (Currid 1991:31; Mazar 1992:374-375).[18] The first phase of a palace (Palace 1723) that was excavated at Megiddo (Stratum VB) has been credited to David (Aharoni 1972:308; Currid 1991:35).[19] According to Currid, David's plan of the palace, which formed the foundation for the later phase built by Solomon (see 2.2.2.3[b]), followed that of similar palaces in Syria and Phoenicia. The Bible tells us that Hiram, king of Tyre, sent artisans to David to help build his palace at Jerusalem (2 Sm 5:11), which supports the evidence of Phoenician influence on Israelite architecture, including the palace at Megiddo.

(c) Tell Beit Mirsim and Beth-Shemesh

A city wall excavated at Tell Beit Mirsim is a casemate wall that was first erected in either late Stratum $B_2$ or early Stratum $B_3$ and has been dated by Albright (1943a:11-14, 37) to the early tenth century BC. A contemporary wall, almost identical in plan and dimensions, was also found at Beth-Shemesh and was, consequently, attributed by Albright to 'common supervision'. Due to the significant differences between these two walls and those at

[18] Finkelstein and Silberman (2006:97) attribute the destruction of Megiddo Stratum VIA and Tell Qasîle Stratum X to a century later than David. They posit that, based on new excavations, architectural observations and radiocarbon dating, 'Philistine life... and Canaanite life... continued uninterrupted well into the tenth century BCE'. They suggest that the conclusions drawn by the excavators of sites throughout Palestine were guilty of 'using the biblical narrative as the basis for archaeological interpretation and then using the interpreted remains as proof of the Bible's historical accuracy'.

[19] Aharoni (1972:308) also attributed a second palace (Palace 6000) to David; this palace has, however, been attributed by other scholars to Solomon (see 2.2.2.3[b]). Conversely, Mazar (1992:374) and Yadin (1970:95) are of the opinion that Megiddo was only a small unfortified town with no public buildings during David's time.

Megiddo, Gezer and Hazor that have been attributed to Solomon (see 2.2.2.3[g]), Albright (1943a:14, 37) maintains that the former were constructed during David's time to fortify the settlements against the Philistines.

(d) Beersheba and Dan

The monumental city walls and gates at Beersheba and Dan, comprising outer and inner gates, have been attributed by Aharoni (1974a:14-15; 1974b:38; 1975:147-148) to the activities of David, due to their almost identical plan and their dissimilarity to the Solomonic gates. The city wall in Stratum V at Beersheba was erected on an artificial rampart supported by a glacis (Aharoni 1974b:36; Yadin 1979:222). On the other hand, Biran (1974a:48-49), the excavator of Tel Dan, asserts that the gate complex was built at the end of the tenth century BC, possibly during the reign of Jeroboam I. He bases his conclusion on the late tenth century BC pottery fragments that were found in the fill used to level the surface. In contrast, Aharoni (1974a:15, n. 7) maintains that these sherds do not constitute sufficient evidence for Biran's dating. Yadin (1979:322, n. 64), on the other hand, agrees with Biran that the gates at Dan could not have antedated the period of the Divided Kingdom. Pottery and ashes found on the pavement between the inner and outer gates led Biran to date the destruction of the gate complex to the ninth century BC, although he was not able to narrow it down any further. If the attribution of the gate complex to Jeroboam I is correct, then Ben-Hadad of Damascus could have been responsible for its destruction, circa 855 BC. Alternatively, Biran (1974a:50) posits that Ahab could also have been responsible for the construction of the gate complex, which could then possibly put its destruction at the hands of Hazael, circa 814 BC.

(e) Arad

Stratum XI at Arad has been attributed to the tenth century BC by Herzog et al (1984:6), although they do not specify whether it originated with David or Solomon, while Mazar and Netzer (1986:90) propose that Stratum XI should be dated to the ninth century BC. Aharoni (1981:122-123) also suggests a tenth century BC date for Stratum XI based on the destruction of this stratum by Pharaoh Shishak in circa 920 BC. The first fortress, using the casemate system, was erected in Stratum XI and measured only 50 m x 50 m. A tower was built at each corner as well as two additional towers each on the western and northern sides and the city gate was located in the north-eastern corner. Within the fortress, a temple was built in the north-western corner with a possible storehouse located between the temple and the gate as

well as other structures, including residential quarters for craftsmen, south of the temple. Since Pharaoh Shishak's list of cities destroyed by him mentions two places called Arad, Herzog et al (1984:8) suggest that one of them must have been Tel Arad.

#### *2.2.2.3 Solomon*

(a) Jerusalem

The biblical narratives provide a detailed description of the Solomonic temple and Solomon's palace in Jerusalem (1 Ki 6-7; 2 Chr 4). Prototypes of the tripartite plan (three successive rooms along a single axis) of the temple can be seen in Middle Bronze Age temples such as those at Ebla, Megiddo and Shechem; in Late Bronze Age temples such as the one at Tel Mumbakat in northern Syria; and also in an eighth century BC temple at Tell Tainat in northern Syria (Dever 2002:145-146, 155; Mazar 1992:377). Cedar wood, which was used extensively in the temple and the palace, was also used in the Canaanite and Philistine temples at Lachish and Tell Qasîle. The two ornamental pillars, named Boaz and Jachin, find their origin in the Late Bronze Age temple at Hazor and also appear on a terra cotta temple model from tenth century BC Tell el-Farʿah (North) (Dever 2002:153; Mazar 1992:277). As the tenth century BC is regarded as the 'dark age' in the history of ancient Near Eastern art (Frankfort 1996:279), the decorations in the temple (palmettes, chains, open flowers and pomegranates) provide information regarding monumental art during the tenth century BC (Mazar 1992:378). A running row of spirals turning back on themselves, representing 'chains', is depicted on a basalt offering basin from a Late Bronze Age temple at Hazor; 'open flowers' representing lilies or papyrus blossoms were common motifs in the Late Bronze Age and have also been found on carved ivories from ninth-eighth century BC Samaria, on seals and on painted storage jars from eighth century BC Kuntillet 'Ajrûd; and 'pomegranates' were associated with fertility and are depicted on Late Bronze Age pendants on bronze braziers and also on seals and ivory priests' wands such as an eighth century BC specimen from Jerusalem (Dever 2002:150). Solomon's palace also included a number of features (a colonnade, a throne room that served as a judgment seat and residential quarters that were located behind the throne room) that appeared in contemporary or slightly later palaces found at Megiddo and cities in Syria and southern Anatolia, such as Tell Halaf, Zinçirli, Karatepe and Tell Tainat (Aharoni 1974a:15; Dever 2002:155; Mazar 1992:378-379; Ussishkin 1973:84-85; 2009:476). Another feature of Solomon's palace was the 'Palace of the Forest of Lebanon', a separate structure with four rows of cedar columns supporting a cedar roof,

which also appears in a ninth century BC Phoenician temple at Kition on Cyprus (Mazar 1992:379). The palace Solomon built for his wife, the Pharaoh's daughter, was a separate dwelling located within the main palace, an additional feature also found at other Iron Age cities, such as at Zinçirli, the capital of the Aramean kingdom of Samaʾl, which comprised four additional palaces (Mazar 1992:379; Ussishkin 1973:82). Nevertheless, all the above descriptions do not provide proof of the actual existence of Solomon's palace at Jerusalem for which, since it is not possible to conduct excavations on the Temple Mount, there is currently no archaeological evidence. Ussishkin (2003:110-112; 2009:480; 2012:108; 2015a) believes that only a modest unfortified settlement with perhaps a fort existed in the City of David during the reign of Solomon. However, Na'aman (1996:22-23) suggests that, although the biblical narratives regarding Solomon's palace and the temple may be exaggerated and reflect royal structures from later periods, they must be based, to a certain extent, on historical truth.

(b) Megiddo

At Megiddo, the second phase of Palace 1723 (see 2.2.2.2[b]) and a second palace (Palace 6000) have been attributed by Currid (1991:35) to Solomon's building activities. Mazar (1992:382), Ussishkin (1973:95) and Yadin (1970:95) assert that the construction of Palace 1723 should be ascribed in full to Solomon, while Aharoni (1972:303, n. 10) declares that both palaces should be attributed to the reign of David.[20] Both palaces conform to features of the palace at Jerusalem and the other palaces in Syria and Anatolia mentioned above (Mazar 1992:382-383, 472; Ussishkin 1973:95-102). At Tell el-Mazar (located in the Jordan Valley), a large public building, which included casemate rooms similar in plan to those around Palace 6000 at Megiddo and perhaps related to the metal-processing activities in the Jordan Valley, was excavated (Mazar 1992:389-390). Furthermore, the use of wooden beams placed horizontally between courses of ashlar masonry (1 Ki 7:12), as can be seen in the city-gate and the gate to the southern palace at Megiddo, is typical of Phoenician architecture (Ussishkin 1973:105). Solomon's stratum (VA-IVB) at Megiddo came to an end when it was destroyed by Pharaoh Shishak in circa 918 BC (Currid 1991:38).

[20] For detailed arguments and counter-arguments on the stratigraphy of Megiddo, particularly with regard to the palaces, walls and gates, see Aharoni (1972), Currid (1991), Franklin (2006, 2007), Ussishkin (1980, 2007) and Yadin (1960, 1970, 1980).

(c) Tirzah/Tell el-Farʿah (North)

Dever (2002:140) compiled a list of the possible capital towns of the administrative districts of Solomon, taking into consideration those specifically mentioned in 1 Kings 4 and adding to that list where no towns were named. The additional towns were chosen on the basis of their size and prominence. Most of these towns provide archaeological evidence for large-scale centralised planning during the tenth century BC (Dever 2002:142). Other than Megiddo, Hazor and Gezer, which have already been discussed above, the tenth century level at Tirzah/Tell el-Farʿah (North) in the district of Ephraim yielded an offset-inset city wall, a two-entry city-gate, a large public structure near the gate and adjoining blocks of four-room houses. According to Dever (2002:142), all these structures are 'so well laid out that they reflect a measure of urban planning' (see Chambon 1993:439).

(d) Beth-Shemesh

Apart from Gezer, which is an excellent example of tenth century BC urbanisation, Beth-Shemesh could also possibly have been the capital of the Benjamin district (Dever 2002:143). Level 3 (950-790 BC) at the site reflects the '"footprints" of state organization' encompassed in an administrative centre with fortifications, an underground water reservoir, an open 'commercial' area, an iron smithy, a storehouse and a large public building (Bunimovitz, Lederman & Manor 2009:116, 127). This level was destroyed in a massive conflagration, judging by the date, most probably by Jehoash, king of Israel, during his war against Amaziah, king of Judah (Bunimovitz et al 2009:128).

(e) Ezion-geber/Tell el-Kheleifeh

A massive square structure, classified as a storehouse for an administrative fort at the site and surrounded by a mud brick glacis, a square courtyard and casemate wall, was excavated in Stratum I at Ezion-geber which, on the basis of prevailing data, has been identified with Tell el-Kheleifeh (Glueck 1965:71, 74-75, 80-81; Yadin 1979:224).[21] Based on the building style, pottery and biblical references, both Glueck (1965:75, 82) and Yadin (1979:224) have ascribed the structure to the time of Solomon, although Glueck acknowledges that this

[21] Glueck (1965:73) originally classified the structure as a smelter, but later revised his interpretation on the basis of an article by Rothenberg (1962:44-56).

assumption remains an open question. Pratico (1985:13), on the other hand, asserts that the handmade 'Negevite[22] ware' that was used to date the earliest phase at the site 'is not chronologically diagnostic' and can only be dated by associated wheel-made forms. Unfortunately, the wheel-made pottery finds from Tell el-Kheleifeh date no earlier than the eighth century BC (Pratico 1985:15). As a result, the attribution of the construction of the fort to Solomon remains uncertain. The destruction of this stratum could perhaps be attributed to Shishak (Glueck 1965:82).

(f) Ḥorvat Ritma

Another Negev fortress is located at Ḥorvat Ritma (Meshel 1977:110). The first period (Period III) was established during the eleventh-tenth centuries BC and includes a fort located on the acropolis, a second official structure erected next to the fort that has been termed the 'Commandante's House', dwellings, reservoirs and a cemetery (Meshel 1977:111, 113). Similar to other fortresses in the region, the pottery finds from this level include handmade 'Negevite ware' and wheel-made ware which, according to Meshel (1977:119, 125), could be dated to any time between the eleventh and ninth centuries BC. As a result, Meshel (1977:132) compares the architectural designs and pottery to those found in the country north of the Negev. This, together with the evidence of town planning and the location of the site within the belt of Negev fortresses, led Meshel to propose that the fort was constructed by a central authority and he suggests either David or Solomon as the developer.

(g) Fortifications

Solomon also fortified a number of cities, such as Jerusalem, Hazor, Megiddo, Gezer, Lower Beth-horon, Baalath and Tadmor (1 Ki 9:15-18). Hazor, Megiddo and Gezer are situated along the *Via Maris*, while Gezer, Beth-horon and Baalath (if Baalath is to be identified with Kiriath-Jearim) defend the approach to Jerusalem and Tadmor is a strategic point on the route to the Euphrates (Aharoni 1974a:16). At Megiddo, one of two underground water installations was discovered (Yadin 1979:198). The earliest, excavated by Solomon, is a passage leading from inside the settlement to a spring located at the foot of the tell; the second has been dated to the time of Ahab (see 2.3.2.3). Based on red-slipped and hand-burnished ware that is

[22] As with the spelling 'Negev' (see n. 8), the words 'Negebite' and 'Negevite' are used by different scholars. This study uses the spelling 'Negevite' throughout.

characteristic of the tenth century BC (see 2.4.2) and the similarity in the design of the gates, the monumental six-chambered gates and corresponding walls at Megiddo, Hazor and Gezer are deemed to be part of Solomon's fortifications at these three sites (Currid 1991:33; Dever 1967:60-61; 2002:132; Mazar 1992:385-387; Yadin 1958a:83-86; 1958b:3-4; 1972:135).[23] On the other hand, Ussishkin (1980:17) dates the 'Solomonic' gate at Megiddo to a period later than Solomon. In support of a Solomonic date, the destruction level of the Gezer gate and walls, which contains typical late tenth century BC pottery, corresponds to the campaign of Pharaoh Shishak in circa 925 BC, as mentioned on his stele and in the biblical texts as taking place 'in the fifth year of King Rehoboam', Solomon's son and successor (Dever 2002:132, 137; see 2 Chr 12:2). This serves to corroborate that these fortifications were erected by Solomon. The features of these Solomonic cities point to centralised planning and attest to their administrative character, the purpose of which was to promote commerce and attend to administrative matters (Yadin 1979:199, 209).

### 2.2.3 Administrative organisation

#### *2.2.3.1 Saul*

Unfortunately, since the Monarchy was in its infancy during Saul's reign, it is difficult to clearly distinguish Saul's administrative organisation from the tribal organisation during the period of the Judges in the biblical record (Tsevat 1979:70-71; Yeivin 1979b:148). In addition, the archaeological record provides very little information from the period of his reign (Mazar 1992:371; Tsevat 1979:71). Nevertheless, one new aspect required attention during Saul's rule; the administrative expenses of the Monarchy had to be met (Talmon 1979:13; Tsevat 1979:71). According to the biblical narratives, Saul had a large army (1 Sm 15:4) and he appointed various officials (1 Sm 22:9). These people had to receive some form of compensation (see 1 Sm 22:7). This compensation could take different forms: spoils of war (1 Sm 14:32, 36); conquered property; gifts (1 Sm 10:27); or taxes (1 Sm 17:25) (Tsevat 1979:71). According to Tsevat, since Saul's kingdom was not extensive and his campaigns were few, spoils of war and conquered property could not have provided adequate funds and the value of any gifts received by Saul was not sufficient to maintain a nation's finances; the

[23] For the debate surrounding the dating of the outer wall at Gezer, see Dever (1967:60-61; 1986:10, 29, Table 1), Dever et al (1971:113-115), Finkelstein (1981:136-145), Kempinsky (1972:185; 1976:212-213) and Mazar (1992:387, 400, n. 17).

only other possible option was that Saul levied taxes on the people of Israel. Compare Yeivin (1979b:149) who asserts that 1 Samuel 17:25 probably does not refer to fiscal taxes, but rather that the relevant person would be exempt from bringing gifts to Saul. In the opinion of Yeivin (1979b:149), Saul financed the administration's expenses from his private income, but he does not elaborate on the source of that income.

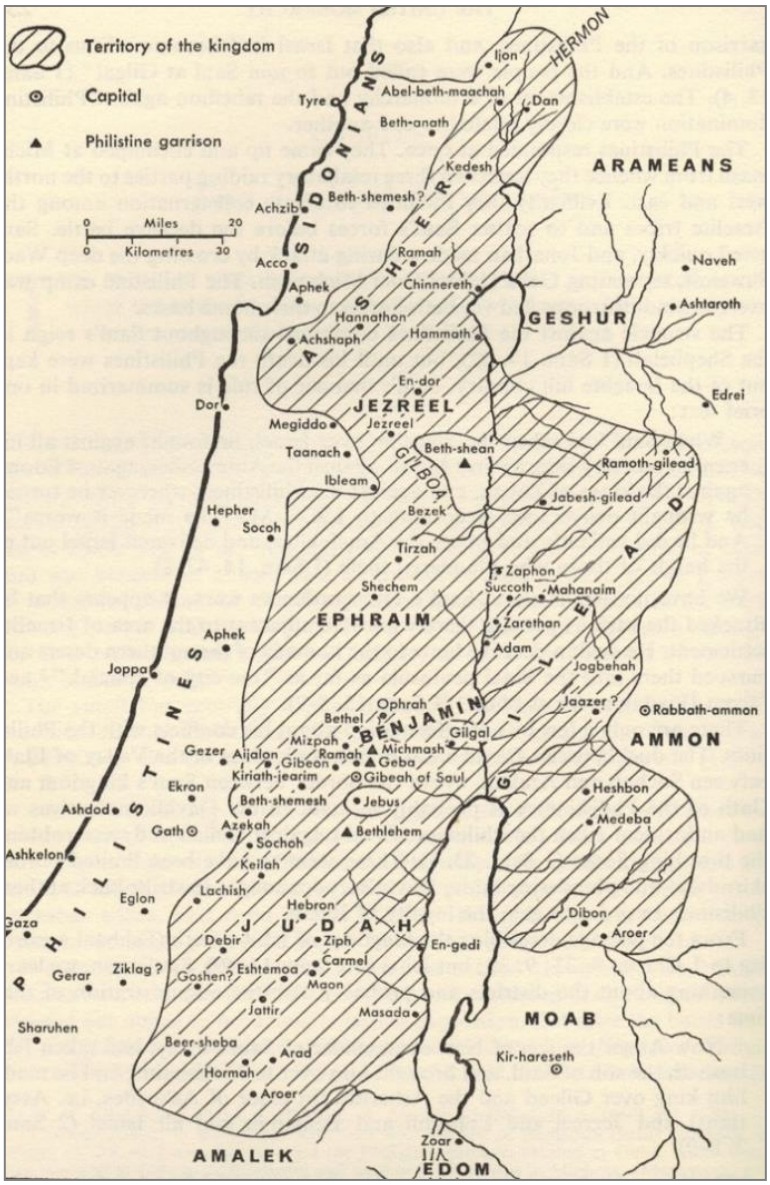



Figure 2.3: Saul's kingdom (Aharoni 1968a:256, Map 20)

Saul's administrative organisation is reflected in the six districts which formed the extent of his kingdom (Figure 2.3) (Aharoni 1968a:257). These districts were based in part on the

traditional tribal allocations and included Asher, Ephraim, Benjamin, the part of the Jezreel Valley under Israelite control, Gilead (Gad) and Judah.[24]

#### *2.2.3.2 David*

According to Yeivin (1979b:149-150), it was David who set the model for administrative matters under the Monarchy by following the example of the Canaanite city-states he conquered. While he retained senior officials from these conquered areas, the military and religious functions of the state were entrusted to Israelites. 2 Samuel 8:15-18 records the names of the chief officials of David's kingdom in order of status:[25] Joab (David's nephew), commander-in-chief of the army; Jehoshaphat, recorder; Zadok and Ahimelech, priests; Seraiah, secretary/scribe; Benaiah, commander of the foreign mercenaries; and David's sons, royal advisers/priests (Yeivin 1979b:158). The positions of recorder and scribe follow Phoenician, and possibly Canaanite, tradition (Mazar 1979:86). The Phoenician or Canaanite scribe played both a political and an economic role, negotiating with foreigners and keeping a record of all the king's accounts. A second list of David's officials can be found in 2 Samuel 20:23-26.[26] The order of names in this list has changed and includes an additional name, that of Adoniram, who was in charge of forced labour (corvée), probably due to the preparations for the temple (Yeivin 1979b:158). This practice was also probably adopted from the Canaanites (Mazar 1979:86).

1 Chronicles 23-27 includes other officials and stewards under David's administration. Yeivin (1979b:164) regards this list as belonging to the earlier part of his reign since one of the officials 'took care of the king's sons' (1 Chr 27:32). These officials comprise additional priests and scribes together with singers, gatekeepers, treasurers, judges, army commanders and tribal chieftains as well as the overseers in charge of the royal storehouses, vineyards, olive and sycamore-fig trees, cattle, camels, donkeys and sheep. The use of overseers suggests that the economy during David's reign was mainly agricultural (Yeivin 1979b:165). With the exception of the tribes of Gad and Asher, which are missing from the list of tribal chieftains, and Zadok, who was put in charge of the House of Aaron, the tribal chieftains (twelve in total) were based on the traditional Israelite tribes of both Judah and Israel (Aharoni 1968a:265;

[24] Finkelstein and Silberman (2006:67) are of the opinion that Saul's dominion did not include Judah. They maintain that, according to the biblical record, his exploits into this region concerned only his pursuit of David.
[25] Yeivin (1979b:158) dates this list to circa 992 BC.
[26] This list has been dated to circa 977 BC (Yeivin 1979b:158).

Mazar 1992:371; Yeivin 1979b:164-165). According to Aharoni (1968a:267), the reason for this was centred on David's efforts to 'overcome the internal rivalry between Judah and Israel', which arose after the death of Saul when the northern kingdom chose to support Saul's son, Ish-Bosheth, and Judah chose David. In addition, the establishment of Jerusalem, which formerly belonged to the Jebusites, as a neutral capital and as the country's religious centre was intended to further assist in uniting the two kingdoms (Aharoni 1968a:267; Yeivin 1979b:153). Unfortunately, due to considerable internal conflict, first with Absalom, David's son, followed by a rebellion led by Sheba, son of Bicri, the northern kingdom preferred to keep their independence and so David governed the two regions separately (Aharoni 1968a:274).

The subjugated territories were administered in one of two ways: governors were appointed where garrisons were established, such as in Damascus, Zobah and Edom; or the subjected kings became vassals of David, such as in Geshur and Ammon (Yeivin 1979b:156-257; see 2.2.1.2).

David's organisational structure also included making preparations for the building of the temple, which continued throughout his reign (Mazar 1979:88-90). Building material had to be collected, a labour force had to be organised and plans and specifications had to be drawn up. A special treasury was established for this purpose to which spoils of war were contributed. In addition, towards the end of his reign when Solomon was already serving as co-regent, David appointed the Levites to carry out administrative duties in connection with the temple and other matters (Mazar 1979:88-90; Yeivin 1979b:151).

#### *2.2.3.3 Solomon*

With the exception of four new positions and the order of importance of Solomon's functionaries, Solomon's administrative organisation roughly followed that of his father (Mazar 1979:92; Yeivin 1979b:158-159; see 1 Ki 4:2-6). The commander-in-chief was relegated to fourth place in Solomon's list due to the circumstances of his rule wherein the number of military expeditions decreased and administrative functions increased in importance, particularly those of the high priest who is named first. The four additional officials appointed by Solomon were a second scribe, the official in charge of the twelve district governors who were appointed by Solomon to administer the northern kingdom, a personal advisor and the official in charge of the palace (1 Ki 4:5-6). The twelve northern

districts were heavily taxed by Solomon, each having to supply one month's provisions to Solomon and his household (Perego 1999:38; see 1 Ki 4:7). The daily provisions, according to the biblical narratives, included 30 measures[27] of flour, 60 measures of meal, 30 head of cattle, 100 sheep and goats as well as deer, gazelles, roebucks and fowl (1 Ki 4:22-23). No such arrangement appears to have been made with Judah (Perego 1999:38). According to Aharoni (1968a:280), the 'preferential treatment given to Judah strengthened the feeling of rebellion and separation on the part of the northern Israelite tribes'.

Solomon also renewed the treaty with Hiram, king of Tyre, with the goal of building the temple and his palace in mind (Mazar 1979:93). 2 Chronicles 2:3-10 provides a detailed list of the terms agreed upon. Hiram provided cedar and pine logs as well as woodcutters, stonecutters and an expert master-craftsman skilled in gold, silver, bronze, copper, iron and linen. In return, Solomon paid the Phoenician workers in wheat, barley, wine and olive oil. Solomon's payment also included the twenty Galilean towns given to Hiram (see 2.2.1.3), although Scripture relates that Hiram was not satisfied with what he had received. Together with Hiram's labourers were those who were conscripted by Solomon from among the 'aliens' (1 Ki 9:20-21; 2 Chr 2:17-18).[28]

According to Perego (1999:40), the weak points in Solomon's reign can be seen in the heavy taxation of the northern kingdom, the forced labour used for all his building projects (1 Ki 12:4) and possible financial problems as evidenced by the quality of the towns given to Hiram (see Aharoni 1968a:275). The terms of the treaty with Hiram wherein Solomon provided agricultural produce to Tyre were also a heavy burden to bear since agricultural production is dependent on the weather and is, furthermore, sensitive to the political climate (Elat 1979b:183). Moreover, Tyre could obtain agricultural surpluses from other neighbouring regions as well and, due to its coastal position, it took advantage of the opportunity in trading valuable products with lands that could be reached by ship. Consequently, Elat (1979b:183) suggests that Solomon's payments in the form of agricultural produce were no longer sufficient and Solomon was, therefore, forced to cede the twenty towns to Hiram. In addition,

[27] The New International Version uses the term 'cors' instead of 'measures'. One cor equals approximately 220 litres (Scott 1959:31).

[28] According to 1 Kings 5:13, the conscripted labour force included labourers from 'all Israel'. This statement is supported by Mazar (1979:96), who asserts that Solomon's ambitious building program would have required more manpower than the resident aliens could have provided. On the other hand, 1 Kings 9:22 specifically states that 'Solomon did not make slaves of any of the Israelites; they were his fighting men, his government officials, his officers, his captains, and the commanders of his chariots and charioteers'.

the rebellion by Edom and Aram as well as by Jeroboam I (1 Ki 11:14-40), who became the first king of the separated kingdom of Israel (1 Ki 12:20), further contributed to the complete division of the two kingdoms of Judah and Israel (Perego 1999:40).

## 2.3 THE DIVIDED MONARCHY (925-734 BC)

### 2.3.1 Historical background

After the death of Solomon, the northern and the southern kingdoms split into two autonomous territories, each with their own king (Table 2.1 & Figure 2.4) (Silver 1983:5-6).[29]

[29] A number of comprehensive studies have been conducted on the chronology of the kings of Judah and Israel, resulting in numerous different opinions. Those who favour an early date (939-937 BC) for the division between the two kingdoms include Curtis (1905:401), Hastings (1950:399) and Hughes (1990:189), while those who favour a later date (922-921 BC) include Albright (1942:28) and Lewy (1927:32). Among those who view 931/30 BC as the date of the split of the two kingdoms are Astour (1971:383), Galil (1996:14), McFall (1991:10) and Thiele (1965:52). The date of 931 BC is calculated retroactively from 853 BC, when Ahab took part in the Battle of Qarqar, or from 841 BC, when, as is commonly accepted, Jehu offered tribute to Shalmaneser III (Galil 1996:14). Other factors that have led to difficulties in calculating regnal years are that the New Year in Judah and Israel began on different dates with a six month gap between the two and the two regions also alternated between different systems of dating, namely postdating and antedating (Galil 1996:4). In the postdating system, a king's first year was reckoned from the first day of the first month of the year following his accession year. In contrast, the antedating system reckoned a king's first year from the day he ascended the throne (Thiele 1965:17). In addition, in some instances, years had been rounded upward by the early writers, in other instances, they were rounded downward and in some cases, they were not rounded off at all; the reason for this is uncertain (Galil 1996:6). Be that as it may, Table 2.1 serves only as a guideline since the exact dating of the reigns of the kings of Judah and Israel are not applicable to this study.

| Kings of Judah | Kings of Israel |
|---|---|
| Rehoboam (931/30-914 BC) | Jeroboam I (931/30-909 BC) |
| Abijam (914-911 BC) | |
| Asa (911-870 BC) | Nadab (909-908 BC) |
| | Baasha (908-885 BC) |
| | Elah (885-884 BC) |
| | Zimri (884 BC) |
| | [Tibni (884-880 BC)][30] |
| | Omri (884-873 BC) |
| Jehoshaphat (870-845 BC) | Ahab (873-852 BC) |
| | Ahaziah (852-851 BC) |
| Jehoram (*851*-843/2 BC)[31] | Joram (851-842/1 BC) |
| Ahaziah (843/2-842/1 BC) | |
| Athaliah (842/1-835 BC)[32] | Jehu (842/1-815/4 BC) |
| Joash (842/1-802/1 BC) | Jehoahaz (*819*-804/3 BC) |
| Amaziah (*805/4*-776/5 BC) | Jehoash (*805*-790 BC) |
| Uzziah/Azariah (*788/7*-736/5 BC)[33] | Jeroboam II (790-750/49 BC) |
| Jotham (*758/7*-742/1 BC) | Zechariah (750/49 BC) |
| | Shallum (749 BC) |
| Ahaz (*742/1*-726 BC) | Menahem (749-738 BC) |
| | Pekahiah (738-736 BC) |
| | Pekah (750/49-732/1 BC)[34] |
| Hezekiah (726-697/6 BC) | Hoshea (732/1-722 BC) |
| Manasseh (697/6-642/1 BC) | |
| Amon (642/1-640/39 BC) | |
| Josiah (640/39-609 BC) | |
| Jehoahaz (609 BC) | |
| Jehoiakim (609-598 BC) | |
| Jehoiachin (598-597 BC) | |
| Zedekiah (597-586 BC) | |

Table 2.1: Kings of Judah and Israel (Galil 1996:147)

[30] Tibni's crowning was not recognised by those who supported Omri (1 Ki 16:21). However, it is possible that he ruled parts of the northern kingdom at the beginning of Omri's reign until he was deposed by Omri (Galil 1996:21).

[31] Years in italics denote years as coregent.

[32] According to Shea (1985:11-12), Athaliah was 'an interloper' and should be regarded as 'queen regent' while Joash was still a minor and in hiding. Therefore, the number of years of Joash's reign should be counted from the death of his father.

[33] Uzziah's reign comprises four sub-periods: as coregent with his father (788/7-776/5 BC); as sole regent (776/5-758/7 BC); with his son, Jotham, as coregent (758/7-742/1 BC); and his last years in which his grandson, Ahaz, ruled (742/1-736/5 BC) (Galil 1996:60-61).

[34] Cook (1964:134) and Thiele (1965:124) are of the opinion that Pekah ruled independently in Gilead during the reigns of Menahem and Pekahiah. Galil (1996:65-66), however, posits that, since 2 Kings 15:25 states that Pekah was a captain of Pekahiah, he may only have been the official appointed over Gilead and, when he usurped the throne of the northern kingdom, he counted the years of his reign retroactively to the end of the reign of Jeroboam II.

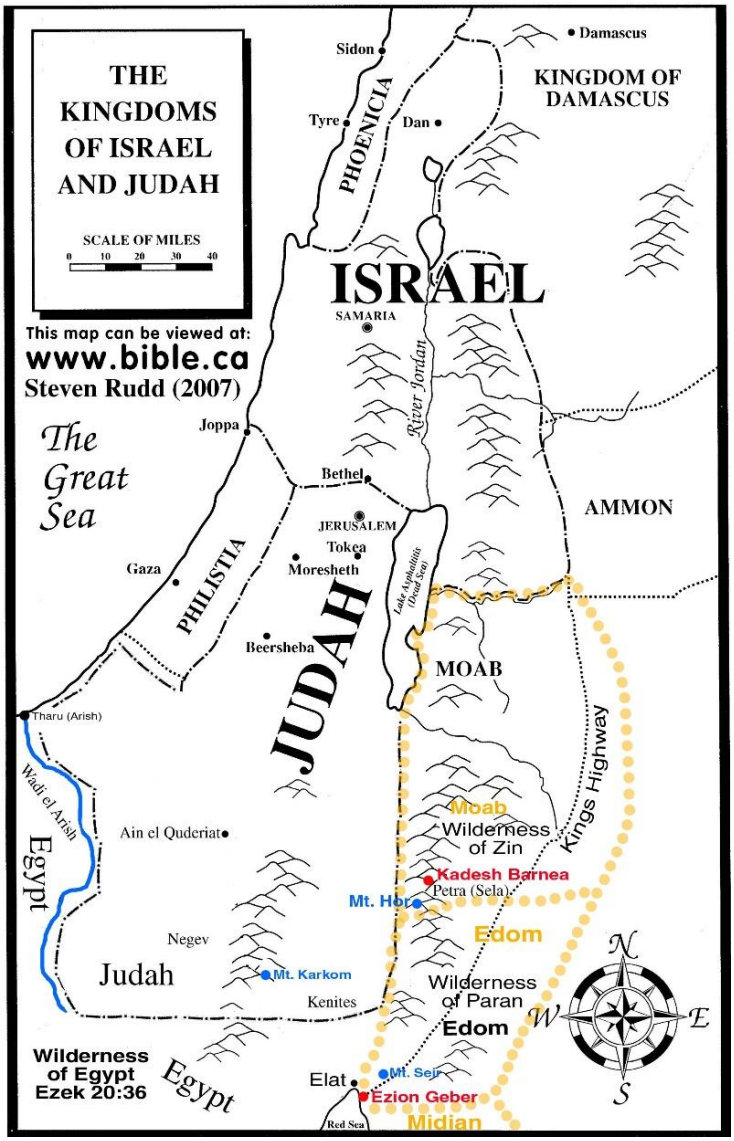



Figure 2.4: The divided kingdoms 900-722 BC
(Interactive Bible c2011:http://www.bible.ca/maps/maps-divided-kingdom.htm)

Apart from the refusal on the part of the northern kingdom to support the Davidic dynasty, there may have been additional reasons for the decision: the natural geography of the country made it difficult for a central authority to maintain communication lines throughout the region as well as protect the region from its enemies, both internal and external. Consequently, Rehoboam, successor to Solomon, may have felt justified in maintaining the high taxes exacted by his father and even in increasing them in order to protect and provide for his people. On the other hand, Jeroboam I, king of the northern kingdom, may have considered it cheaper to govern his own territory than to submit to the excessive amounts demanded by Rehoboam (Silver 1983:5-6).

During the reign of Rehoboam, Shishak, king of Egypt, attacked the northern kingdom as well as cities in the Negev (Mazar 1956:63; Perego 1999:44; 1 Ki 14:25-26; 2 Chr 12:2-4, 9).

Possible reasons for the invasion may be ascribed to Jeroboam I's refusal to accept Shishak's authority, even though he had promised to do so during his sojourn in Egypt, and to the necessity for Shishak to protect his rear from the nomadic tribes during his assault of Israel (Mazar 1956:63, 66). The Shishak stele (Figure 2.5), a relief carved after the Pharaoh's campaign into Palestine, contains a list of the places conquered by the Egyptians (Mazar 1956:59). Archaeological finds at some of the sites mentioned in the list point to destruction at the end of the early Iron Age (Mazar 1956:63-64). The list includes places such as Gezer, Megiddo, Beth-Shean, Rehob in the Beth-Shean Valley, Tell Jerishe, Tell Qasîle, Rubuti in the northern Shephelah and Tell Arad.

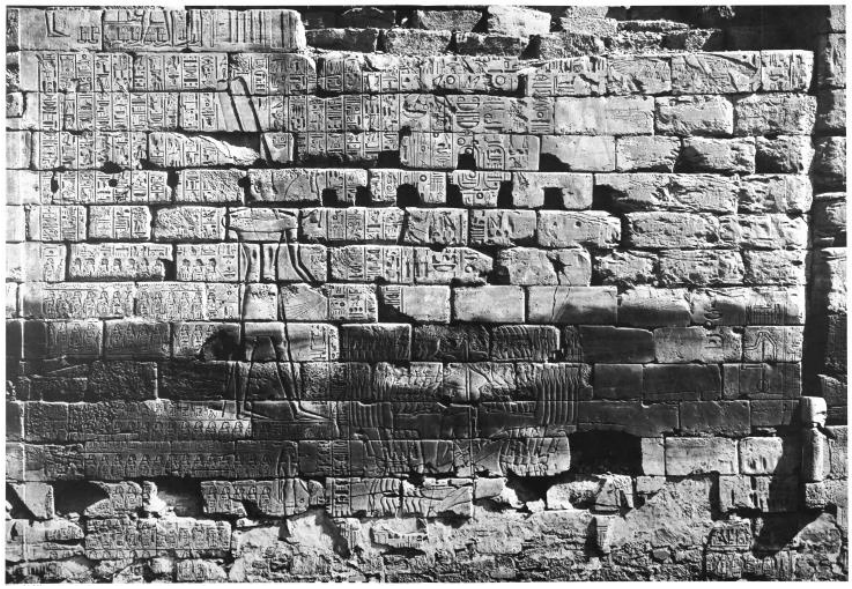


Figure 2.5: Shishak stele (Hughes et al 1954, Pl. 2)

After Jeroboam I's death, his son, Nadab, ascended the throne of the northern kingdom, but his reign was short-lived, approximately a year (Galil 1996:16-17). During his reign, Nadab besieged the Philistine city of Gibbethon, but was killed by Baasha, who usurped the throne and proceeded to kill 'all the house of Jeroboam' (1 Ki 15:27-29). In Judah, Rehoboam was succeeded by his son, Abijam (1 Ki 14:31), who was followed three years later by his son, Asa (1 Ki 15:8). During their reigns, Baasha and Asa continued to clash with each other, wherein Asa managed to conquer cities in Ephraim (2 Chr 15:8; 17:2). After entering into a treaty with the Arameans, Baasha succeeded in restoring territories held by Judah (Galil 1996:20). He proceeded to march on Jerusalem, forcing Asa to seek the help of Ben-Hadad I, king of Aram, who attacked Israel and took possession of some of its cities (1 Ki 15:20). According to Galil (1996:20), the Arameans assisted Judah out of self-interest since Baasha may have violated the terms of his agreement with Ben-Hadad I and was, consequently, forced to retreat from Ramah where he was encamped and protect his borders against the

Arameans. This allowed Judah to extend its northern border to Mizpah and Geba (1 Ki 15:22). Baasha was succeeded by his son, Elah, who renewed the Gibbethon siege, during the course of which he was murdered at his palace in Tirzah by Zimri, a captain in Elah's army (1 Ki 16:9, 15). When news of Elah's murder reached the army encamped at Gibbethon, they immediately crowned Omri, the army commander, as king of Israel. They then attacked Tirzah and Zimri took his own life (1 Ki 16:16-18). However, a faction supported Tibni, son of Ginath, as king, who had to be overthrown by Omri before his throne could be secured (Encyclopaedia Biblica 1903).

Omri is the first biblical king mentioned in extra-biblical sources, namely the Black Obelisk of Shalmaneser III and the Mesha Stele (Luckenbill 1968a:211; Pritchard 1969:320; Silver 1983:5-6).[35] Under his rule and that of his son, Ahab, as well as during the reigns of Jehoshaphat and his son, Jehoram, both kingdoms experienced a revival in military and economic importance, expanding the extent of their kingdoms into Transjordan (Silver 1983:6). After the death of Ahab, Mesha, king of Moab, rebelled against the tribute he had to pay to the northern kingdom, which comprised the wool of 100,000 lambs and 100,000 rams (2 Ki 3:4-5). The Mesha stele was erected at Dibon to celebrate his victory over Joram, king of Israel, who was supported by Jehoshaphat, king of Judah, as well as by the king of Edom (Perego 1999:44). The biblical account, however, accords victory to the alliance of Joram, Jehoshaphat and the king of Edom (2 Ki 3:6-27).

On his ascension to the throne of the northern kingdom, Jehu, one of Joram's commanders, killed Joram and the rest of Ahab's relatives and officials as well as Ahaziah, king of Judah, and his entourage (2 Ki 9:14-10:14). According to Astour (1971:388), this was to appease the Assyrians by wiping out everyone who had been involved in the anti-Assyrian alliance of Joram and Ahaziah. Thereby began a policy of co-operation with the Assyrians and enmity towards the region of Aram which lasted for the rest of Jehu's line (Astour 1971:388).

During the reign of Jehoahaz, Jehu's successor, Hazael, king of Aram, invaded the northern kingdom and took most of Jehoahaz's territory and military force, leaving him only with 'fifty horsemen, and ten chariots, and ten thousand footmen' to maintain order within his restricted territory (2 Ki 13:7; Yeivin 1979a:152). According to Maisler (1948:119-133), the Samaria

[35] Concerning the debate surrounding the identification of *ia-ú-a* ('Yaw') on the Black Obelisk as either Joram or Jehu, see McCarter (1974:5-7), Smith (1875:190) and Thiele (1976:19-23).

Ostraca (see 4.7.1.2[a]) should be attributed to the reign of Jehoahaz since they reflect the limited region of the northern kingdom during this period. However, other scholars have attributed the ostraca to other kings. After a campaign led by Adad-nirari III (810-782 BC), king of Assyria, against Damascus in 805 BC, Aram's hold on Samaria slackened, which allowed Jehoahaz to enlarge his territory slightly; this extended area is reflected in the Samaria Ostraca from later years (Yeivin 1979a:153). During his invasion of the northern kingdom, Hazael also threatened the region of Judah, but Joash, king of Judah, appeased him by handing over all the temple and palace treasures (2 Ki 12:18; Yeivin 1979a:156). During his reign, Joash also undertook the restoration of the temple and was later succeeded by his son, Amaziah (2 Ki 12:4-15, 27).

After the death of Jehoahaz, his son, Jehoash, became king (2 Ki 13:9) and in Judah, Amaziah ascended the throne a couple of years later (2 Ki 14:1). Under the kingship of Amaziah (Judah) and Jehoash (Israel), both regions set out to regain lost territory (Yeivin 1979a:157). Jehoash proceeded to reclaim the cities conquered by Hazael during his father's reign (2 Ki 13:25). Also during Jehoash's reign, Adad-nirari III led another campaign against the Arameans, after which Jehoash offered gifts to the Assyrian king, possibly with the view of retrieving the rest of his territory from the Arameans (Page 1968:149-150; Yeivin 1979a:157). These gifts were recorded as tribute on the Rimah stele of Adad-nirari III (Page 1968:150). The stele refers to '*Ia'asu* the Samaritan', which has been identified with Jehoash, king of Israel (Page 1968:143, 148-149). From Judah, Amaziah turned his attention to the region of Edom with the goal of taking possession of the metal mines in the Arabah and obtaining control of the trade routes extending from Southern Arabia (Yeivin 1979a:158-159). He requested military assistance from the northern kingdom for his campaign, but later decided to forego their services (2 Chr 25:6-24). While Amaziah was campaigning against the Edomites, the Israelites retaliated by attacking cities in Judah. On his return, Amaziah sought a reconciliation with Jehoash, but to no avail; Jehoash attacked Jerusalem and took not only the treasures from the temple and the king's palace, but hostages as well. This resulted in resentment against Amaziah on the part of the Judaean populace who crowned Amaziah's son, Azariah/Uzziah, king in his stead (2 Ki 19:21). Jehoash, king of Israel, was succeeded by his son, Jeroboam II, shortly before Azariah/Uzziah became king of Judah (Yeivin 1979a:161).

During his reign, Jeroboam II expanded the boundaries of the northern kingdom (2 Ki 14:25, 28) and undertook numerous building activities, evidence of which has been found at sites

such as Hazor, Megiddo and Samaria (Yeivin 1979a:162-163; see 2.3.2.2- 2.3.2.4). According to Yeivin (1979a:163), the amount of construction carried out by Jeroboam II required 'large investments of capital' which, in turn, demonstrates a thriving economy brought about by landlords who leased parcels of land to tenant-farmers who were exploited by their landlords. These landlords were most often absent, preferring to live in style in the cities. Meanwhile, Azariah/Uzziah, king of Judah, sought to increase the advantage obtained by his father over the Southern Arabian trade routes by attacking the Philistines in order to open roads to the Mediterranean coast that had been blocked by hostilities with the Philistines (Yeivin 1979a:164-165; see 2 Chr 26:6-7). Alas, the same agricultural situation in Israel also befell Judah, although, according to Yeivin (1979a:165-166), the Bible does imply that Azariah/Uzziah may have tried to remedy the situation (see 2 Chr 26:10). In order to protect his interests in the Arabah and Edom, Azariah/Uzziah erected forts and dug wells along the border of southern Judah, as attested by archaeological finds at sites in the Negev, each of which comprised 'a central fort surrounded by an open agricultural settlement. In addition, numerous open small villages of a few houses each on the perimeter of such central forts were discovered' (Yeivin 1979a:166). The erection of these forts not only secured Azariah/Uzziah's commercial interests, but also provided protection against invasion from the south (Aharoni 1958:35). Azariah/Uzziah and his son and successor, Jotham, continued to further expand the region of Judah. They subdued the Ammonites who then had to pay a tribute each year for three years (2 Chr 26:8; 27:5). According to Yeivin (1979a:170), the reason for the Ammonite conquest was to form a direct trade route from Edom, which then passed through Rabbath-ammon and Gilead on to Damascus.

In the northern kingdom of Israel, after the death of Jeroboam II, five successive kings ruled within the space of fifteen years (Ephʿal 1979a:180). Zechariah succeeded his father (2 Ki 15:8), but did not reign long before he was killed by Shallum, who, in turn, reigned only one month before he was murdered by Menahem (2 Ki 15:10-14). During Menahem's reign, Tiglath-pileser III attacked the northern kingdom, forcing Menahem to pay tribute to him (see 3.2.1.1). He was succeeded by his son, Pekahiah, who ruled less than two years and was killed by Pekah, who had ruled in Gilead in Transjordan until then (Yeivin 1979a:170, 173).

After Jotham's death, his son, Ahaz, became king of Judah (2 Ki 15:38). He had to contend with an attack by Rezin, king of Aram, and Pekah, king of Israel, perhaps due to his

unwillingness to form an anti-Assyrian alliance with them (see 3.2.1.1).[36] Furthermore, this resulted in the Arameans repossessing Elath, after which Ahaz requested the help of Tiglath-pileser III (2 Ki 16:7-9). The battle that followed resulted in the death of Rezin, while Pekah was killed in a rebellion led by Hoshea, who then assumed power (Ephʿal 1979a:186). During Hoshea's reign, Shalmaneser V attacked Samaria and took Hoshea prisoner (see 3.2.1.1). The Bible is silent on who governed Samaria after Hoshea's imprisonment, but Tadmor (1958:34, 37) surmises that, since a fragment of the Nimrud prisms[37] refers to 'Samarians' rather than to '[King of the] Samarians', the city was governed either by the city elders or by the army generals until it fell to Shalmaneser V.

Ahaz was succeeded by Hezekiah and the first decade of his reign was characterised by keeping a low profile; he did not take part in the struggles of the northern kingdom before its final capitulation or in a new uprising in which Samaria was involved (Reviv 1979:193; see 3.2.1.1). After the first decade, in spite of paying tribute to Assyria, Hezekiah attempted to maintain independent political and economic status. Signs of this may be reflected in the removal of foreign cults, the reorganisation and purification of religious practices throughout the regions of Judah, Benjamin, Ephraim and Manasseh (2 Ki 18:4; 2 Chr 29:19-31:20) and in the conquests carried out by Hezekiah in Philistia (2 Ki 18:8) (Reviv 1979:194-195). The distribution of the *lmlk* seal impressions, which have been attributed to Hezekiah's reign (see 3.2.1.4[a][iii]), attest to Hezekiah's administrative reorganisation of his kingdom (Reviv 1979:195). The ascension of Sennacherib to the throne of Assyria in 704 BC may have spurred the vassal kingdoms to rebel against the Assyrian yoke (Reviv 1979:196). Judaean ties with Babylon (2 Ki 20:12-13), Egypt and Ashkelon (Is 31:1; Sennacherib's annals of his third campaign in Luckenbill 1968b:118-121) were established and maintained with the objective of taking a stand against the Assyrians. Moreover, as recorded on the Oriental Institute Prism of Sennacherib, Hezekiah incited the inhabitants of Ekron to depose their king, Padi, and hand him over to Hezekiah, whereafter Hezekiah imprisoned him:

[36] Ephʿal (1979a:184) is of the opinion that the coalition of Aram and the northern kingdom of Israel against Judah during the reign of Ahaz was merely 'a continuation of the internal power struggle in Syro-Palestine that went on throughout most of the existence of the kingdoms of Aram, Israel, and Judah'. He bases his premise on 2 Kings 15:37 which states that Aram and Israel were already working together from the reign of Jotham, in other words, before the Assyrians arrived in Palestine to provide assistance to Ahaz.

[37] These fragments were found at Nimrud and recount the campaigns of Sargon II (Gadd 1954:173).

> (As for) the governors, the noble[s, and the peopl]e of the city Ekron who had thrown Padî, their [king] who was bound by treaty and oaths to Assyria, into iron fetters and who had handed him over to Hezekiah of the land Judah in a hostile manner, they became frightened on account of the villainous acts they had committed. They formed a confederation with the kings of Egypt (and) the archers, chariots, (and) horses of the king of the land Meluḫḫa, forces without number, and they came to their aid (Luckenbill 1968b:142; Oppenheim 1969:287; RINAP Project 2011).[38]

As a result of campaigns in other areas of his kingdom, Sennacherib was not able to immediately terminate these alliances, which gave Hezekiah time to prepare for battle against the Assyrians (Reviv 1979:196). According to the biblical narratives, this included building a tunnel to redirect Jerusalem's water supply and repairing the city's fortifications (see 2.3.2.6) (2 Ki 20:20; 2 Chr 32:4-5). Consequently, Hezekiah was prepared when Sennacherib arrived to attack Jerusalem in 701 BC.[39] Although he did not succeed in conquering the capital of Judah, Sennacherib still managed to, as his inscription on the Oriental Prism declares, trap Hezekiah 'like a bird in a cage' (Pritchard 1969:288). In order to appease the Assyrian king, Hezekiah paid him a large tribute which included gold, silver, precious stones, furniture, wood, his daughters, his concubines and musicians. The inscription also states that the towns of Judah that were conquered by Sennacherib were divided between Ashdod, Ekron, Gaza and, according to another version by Luckenbill (1968b:143), Ashkelon as well, thus leaving Hezekiah with a significantly smaller territory to govern.

Hezekiah was succeeded by his son, Manasseh, who, according to the biblical narratives (2 Ki 21:2), reintroduced foreign cults to Judah. For the extent of Manasseh's reign, Esarhaddon (680-669 BC) followed by Ashurbanipal (668-627 BC) were his contemporaries in Assyria (see 3.2.1.1). Esarhaddon's Prism A recounts a city, Kar-Ashshur-ahu-iddina ('Port of Esarhaddon'), which was built near Sidon by the 'kings of the country Hatti and of the seashore' (Luckenbill 1968b:211; Pritchard 1969:290-291; Tadmor 1966:98). By taking part in this construction, Manasseh demonstrated his loyalty to Assyria (Reviv 1979:199). Prism B relates the delivery of wood, stone and limestone that 22 kings from 'Hatti', including Manasseh, the seacoast and Cyprus were forced to deliver to Nineveh to be used in the construction of Esarhaddon's palace (Luckenbill 1968b:265-266; Pritchard 1969:291). Ashurbanipal's inscriptions also relate Manasseh's loyalty to Assyria when his army, along with those of the 22 kings mentioned previously, accompanied Ashurbanipal on his first expedition to Egypt (Luckenbill 1968b:293, 340-341; Pritchard 1969:294). The Bible, on the

[38] The brackets used in quotations throughout this study are exactly as they appear in the sources.
[39] For the debate on whether Sennacherib carried out one or two campaigns against Jerusalem, see Albright (1953:8-11), Bright (2000:298-309), Horn (1966:1-28), Oded (1977:446-451) and Rowley (1963:98-132).

other hand, narrates the capture and imprisonment of Manasseh, his return to Jerusalem, the fortification of the city and his religious reforms (2 Chr 33:11-16). Reviv (1979:200-201) believes that Manasseh was imprisoned after participating in a rebellion that took place when Ashurbanipal's attention was focused on a revolt organised by his brother, Šamaš-šum-ukin, in Babylon. Ashurbanipal, subsequently, allowed Manasseh to return to Jerusalem after extracting a declaration of allegiance from him and even allowed him to fortify Jerusalem, all with the objective of establishing an additional force with which to check the advance of Psamtik I of Egypt who was attempting to free himself of the Assyrian yoke. Manasseh's religious reforms appear to have formed part of the concessions granted to Judah by Assyria in exchange for its loyalty (Reviv 1979:201).

Amon, Manasseh's son, was the next Judaean king, but was killed within two years of ascending the throne by his servants who, in turn, were killed by 'the people of the land' (2 Ki 21:18-24). Malamat (1973:271) suggests the possibility that Amon was murdered at the instigation of Egypt, but that the *ʿam hāʾāreṣ* ('the people of the land'), in other words, the ordinary citizens, were an anti-Egyptian faction who initiated a counter-coup and appointed Josiah as king of Judah. In the Bible, Josiah is commended for his systematic cleansing of foreign cults in Judah as well as in the three Assyrian provinces of Samaria, Gilead and Galilee and concentrating worship of the God of Israel in Jerusalem (2 Ki 23:1-24; 2 Chr 34:6; Cross & Freedman 1953:57). Reviv (1979:203) suggests that these actions were carried out for the sake of 'religious and national revival' and to restore Judaean political independence, which, in turn, implies a weakening on the part of Assyria as evidenced by internal rivalry for the Assyrian throne towards the end of Ashurbanipal's reign (see Cross & Freedman 1953:57). It is uncertain what the extent of Josiah's kingdom was, but excavations at Megiddo, Arad, Meẓad Ḥashavyahu and En-Gedi have uncovered settlements that have been dated to Josiah's time, thereby indicating his efforts to extend and fortify his kingdom (Reviv 1979:203-204).

The end of the Assyrian Empire and the death of Josiah at Megiddo in 609 BC at the hands of Pharaoh Necho II resulted in turmoil, with Judah caught between Egypt and Babylon who competed for the prize of the Assyrian territories (Malamat 1975:123). After Josiah's death, his son, Jehoahaz, in spite of having an older brother, was appointed by the *ʿam hāʾāreṣ* ('the people of the land') as monarch since he followed his father's anti-Egyptian policies

(Malamat 1968:139-140).[40] After only three months on the throne, he was deposed and deported to Egypt by Necho, who appointed Jehoahaz's older brother, Jehoiakim, as king of Judah, possibly with the collaboration of Jehoiakim, who sought to claim his rightful place as firstborn (Malamat 1979a:207). Necho proceeded to impose a levy on Judah, but Jehoiakim exacted the money from 'the people of the land', keeping the temple and palace treasuries intact (2 Ki 23:35). At this stage, Egypt controlled 'the entire region west of the Euphrates', although only until such time as when Babylon succeeded in defeating the Egyptians encamped at Carchemish in 605 BC (Malamat 1979a:207) and following this up with the systematic conquest of Palestine from 604 BC (see 3.2.2.1). Also during this period, Jehoiakim became subject to the Babylonian king (Lipschits 2005:46; 2 Ki 24:1). Nebuchadnezzar's defeat against Egypt itself in 601 BC provided an opportunity for Jehoiakim to rebel against Babylonian oppression (Malamat 1979a:209-211). However, Babylonian garrisons stationed in the region as well as Syrians, Moabites and Ammonites were used by Nebuchadnezzar to repress this rebellion, resulting in the death of Jehoiakim who was then succeeded by his son, Jehoiachin. Jehoiachin had ruled for only three months when Nebuchadnezzar marched on Jerusalem and captured the city. Jehoiachin and his officials, officers, artisans, priests and prophets were summarily deported and Zedekiah, Jehoiakim's brother, was appointed king of Judah. Edom, Moab, Ammon, Tyre, Sidon and Egypt conspired with Zedekiah to rebel against Babylon, but it was eventually Judah who, in Zedekiah's ninth regnal year, had to 'stand up singlehanded to the awesome might of Babylonia' (Malamat 1979a:214-215, 218; see Jr 27:3). For one and a half years, Jerusalem managed to resist, but in the eleventh year of Zedekiah's reign, the city fell. Although Zedekiah attempted to flee, he was apprehended in the plain of Jericho, subjected to torture and exiled (Malamat 1979a:220; 2 Ki 25:4-7). Gedaliah, son of Ahikam, was appointed governor of Judah by Nebuchadnezzar, but was later assassinated by Ishmael, son of Nethaniah, thereby extinguishing the last hope for the recovery of an independent Judah (Malamat 1979a:221; Jr 40:5; 41:3).

### 2.3.2 Monumental architecture

Since the number of Iron Age sites that have been excavated are numerous, only a handful have been selected for discussion based on their importance during the monarchic period.

[40] For the role of the body of *ʿam hāʾāreṣ* who took the lead in times of crisis, see Talmon (1967:71-76).

#### *2.3.2.1 Tel Dan*

Excavations at Tel Dan revealed the *bamah* ('high place') that was used by the Israelites for worship (Yadin 1979:187). The *bamah* was built on the Canaanite remains of a Middle Bronze II structure (Biran 1974a:43). The first of three stages from the Israelite period, comprising a rectangular structure, has been attributed to the time of Jeroboam I based on tenth century BC pottery found in a burnt layer covering this phase; the second stage, dated to the mid-ninth century BC and, therefore, possibly attributable to Ahab, included an almost square building surrounded by a wide courtyard which was enclosed on two sides; the third stage incorporated monumental steps built inside the courtyard against the southern wall of the *bamah* during the early eighth century BC (Biran 1974a:43; 1974b:262). The monumental city wall and gate uncovered at the site have already been discussed above (see 2.2.2.2[d]).

#### *2.3.2.2 Hazor*

Pottery finds in Stratum VIII at Hazor have made it possible to ascribe this stratum to the time of Ahab (Yadin 1979:190). The previous stratum was destroyed by a conflagration which could be attributed to Ben-Hadad in circa 885 BC. In Stratum VIII, the appearance of the settlement changed drastically; this stratum expanded significantly and is characterised by public buildings, storehouses, underground water installations and improved fortifications in the form of a massive wall which replaced the previous casemate wall (Yadin 1979:190; Ben-Ami 2012:2). Among the public buildings is a large citadel erected on the edge of the mound, its walls forming part of the city wall, a feature of city fortifications during the monarchic period (Yadin 1979:192-193). These safety measures were, most likely, due to the Assyrian threat. An architectural feature attributable only to royal Israelite palaces is the use of proto-Aeolic capitals, a couple of which were found associated with the citadel (Aharoni 1961:103-104). Similar capitals were also found at Megiddo, Samaria and Ramat Raḥel. Although several changes were made in Stratum VII, they reflect an overall continuance of the general plan and buildings of the previous period (Ben-Ami 2012:2, 154, 235). The changes that were wrought include the erection of several new buildings. According to Yadin (1979:193), this stratum was destroyed at the end of the ninth century BC, possibly by the Arameans. However, apart from the damage suffered as a result of the earthquake in Stratum VI, Ben-Ami (2012:235, 473) posits that Hazor shows no signs of destruction until the last phase of Stratum V. Stratum VI has been attributed to the reign of Jeroboam II (first half of the eighth century BC) on the basis of the earthquake reported in Amos 1:1 that destroyed the settlement

(Yadin 1979:193). Some of the administrative buildings were replaced by new ones, while others retained their original plan or were enlarged or reorganised (Ben-Ami 2012:2, 286). Due to their size and superior construction, most of the buildings from this stratum appear to have been used for administrative purposes, although it is possible that some were used as residences as well by high-ranking officials. In the first phase of Stratum V (VB), attributed to Menahem, repairs and improvements were carried out after the earthquake and fortifications were strengthened to prepare for Tiglath-pileser III's pending attack (Yadin 1979:193-194). Unfortunately, this was to no avail since the second phase of this stratum (VA) was destroyed by him in a massive conflagration in 732 BC during the reign of Pekah. The administrative area of Stratum V decreased in size with the settlement reflecting mainly a domestic character (Ben-Ami 2012:306). The domestic buildings included stylish structures as well as more modest ones. The final stratum (IV) from the period of the Monarchy embodied only a poor settlement (Yadin 1979:194), most likely during the reign of Hoshea (see Table 2.1).

#### *2.3.2.3 Megiddo*

Stratum IVA at Megiddo has been attributed to the reign of Ahab (Yadin 1979:197). The stables, solid wall and four-room gate, originally attributed to Solomon, were constructed above Solomon's palace (Palace 6000) (see 2.2.2.3[b]) and ninth century BC potsherds, furthermore, indicate that these structures belong to that century (Yadin 1979:195-196). Other building activities, undertaken most likely by Ahab, include the excavation of the second, more sophisticated, water supply system found at the site (see 2.2.2.3[g]); a perpendicular shaft and tunnel led from the town to the spring, which was also protected by an outside wall (Yadin 1979:198-199). These preparations attest to the political situation at a time when the Arameans and Assyrians were gaining in strength. Stratum III has been attributed to the reign of Jeroboam II based on pottery finds and a seal belonging to Shemaʿ, an officer of the king (see 2.3.3.1[b]) (Albright 1943a:2, n. 1). The end of Stratum III came at the hands of Tiglath-pileser III when it was destroyed by him in his conquest of Palestine (see 3.2.1.1). The next stratum (Stratum II), with its massive walls and fortress, was rebuilt by the Assyrians and served as the seat of the Assyrian governors of Megiddo, one of whom was Ishtu-Adad-anînu who was governor in 679 BC (Albright 1943a:3, n. 1). The phases of the final stratum date to periods after the Monarchy (Yadin 1979:200).

*2.3.2.4 Samaria*

The site of Samaria provides some outstanding examples of Israelite monumental architecture (Crowfoot, Kenyon & Sukenik 1942:9; Yadin 1979:200-201). At the time that Omri purchased the hill from Shemer (1 Ki 16:24), there was a settlement located there since pottery from this level (Period 0) has been dated mainly to the tenth-early ninth centuries BC and two roughly-built walls were sealed by floors of Period I (Crowfoot et al 1942:94; Stager 1990:103; Wright 1959:76-77). Owing to approximately 100 known bottle-shaped cisterns used for wine and oil production that have been found at the site, supplying approximately 350,000 litres, Shemer's settlement should be regarded as a significant commercial enterprise, thereby providing a possible reason why Omri chose this site (Franklin 2004:193-194; Stager 1990:97).[41] The subsequent building phases at the site have been cautiously attributed by Crowfoot et al (1942:8), the excavators, as follows: Building Periods I-II to Omri-Ahab (Figure 2.6), Building Period III to Jehu and Building Periods IV-VI to the eighth century BC. On the other hand, Wright (1959:75-76) classifies the Omri-Ahab period as Building Period I, the Jehu period as Building Period II and assigns the destruction of Building Period II to the Arameans. Franklin (2004:200-201; 2008:46) differs slightly from Wright in her classification; she attributes Building Period I to the Omride dynasty (Omri and Ahab) and, at least, partly to the Jehu dynasty as well.

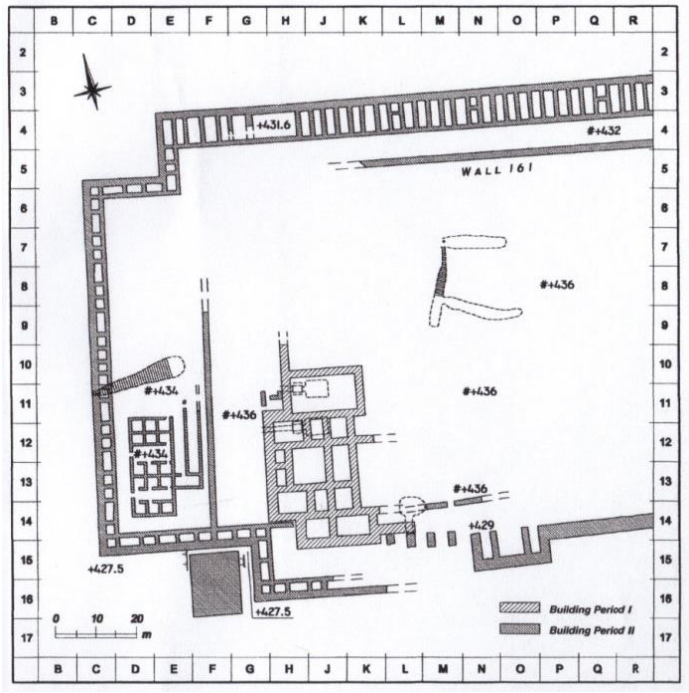



Figure 2.6: Plan of Samaria (Periods I and II) (Franklin 2004:199, Fig. 5)

[41] Wright (1959:77) ascribes only a small village at the site prior to the Omride period.

According to Crowfoot et al (1942:94-95, 97), Building Period I includes an enclosure wall, dubbed the 'inner walls', along the western, southern and northern sides of the hill which contain a courtyard along the southern side as well as the monumental building known as the 'Palace of Omri' (Franklin 2004:194; Wright 1959:73). Franklin (2004:197-198), however, has shown that the enclosure wall attributed by the excavators to Building Period I 'is not a single entity'; only the southern wall should be attributed to this period, while the other two walls (north and west) were built during Building Period II. The palace was constructed atop an artificially prepared rock scarp, approximately 4 m high, and is located in the south-western corner of the courtyard against the edge of the scarp (Franklin 2004:194-195). Also to be attributed to Building Period I is a building that Franklin (2004:196) terms 'a lost monumental building' situated west of the palace, but at a slightly lower elevation. However, due to the meagre remains, its purpose cannot be determined. If Building Period I is to be ascribed to the time of Ahab as well as Omri, the construction of the 'Ivory House' should also be attributed to this period (1 Ki 22:39). Numerous fragments of ivory, dated to circa 860 BC, were discovered throughout the site, the bulk of which were found in the area of the northern enclosure wall where the 'Ivory House' was built (Crowfoot & Crowfoot 1933:7, 22; 1938:2-3; Wright 1959:73). In Building Period II, an additional casemate wall was constructed on the steep slopes of the hill outside the original enclosure walls; the areas between these walls and the casemate wall as well as inside the casemates themselves were filled with soil to almost the height of the casemate wall, thereby extending the area of the summit (Crowfoot et al 1942:97-98, 100; Yadin 1979:202). According to the excavators, no buildings have been connected with this period. Franklin (2004:196; 2008:51), though, attributes an administrative structure, known as the 'Ostraca House' due to ostraca discovered in the floor's make-up (see 4.7.1.2), to Building Period II. The structure was built over the southern part of the 'lost monumental building'. In Building Period III, the 'inner (city) walls' were obliterated, destroyed either by conflict or by natural disaster since the wall built on top of them was inferior; the casemate wall continued in use (Crowfoot et al 1942:101). Conversely, Franklin (2004:198) contends that, although the southern wall went out of use during Building Period II, the other two walls continued in use until Building Period IV. During Building Period III, the palace and the 'Ivory House', which was also extended to the north, were completely rebuilt (Crowfoot et al 1942:101; Wright 1959:74). During Building Period IV, alterations were made to the 'Ivory House' and part of the casemate wall was

repaired (Crowfoot et al 1942:103; Wright 1959:74),[42] while during Building Period V, the 'Ivory House' was almost completely reconstructed (Crowfoot et al 1942:106; Wright 1959:74). This building was destroyed around the end of the eighth century BC, almost certainly as a result of Sargon's campaigns in 721 BC (Crowfoot et al 1942:108). A wall (Wall 573) and some debris lying up against the wall have been assigned to Building Period VI based on pottery fragments of water decanters common to Building Period VI found in the fill (Crowfoot et al 1942:108-109).[43]

#### *2.3.2.5 Tell en-Naṣbeh*

Massive fortifications in the form of an offset-inset wall (known as the 'Great Wall'), towers and two city gates from the period of the Monarchy were excavated at Tell en-Naṣbeh, possibly biblical Mizpah (Yadin 1979:205). Yadin (1979:207) dates the construction of the southern four-room gate (inner gate) to the ninth century BC during the reign of Asa and the northern two-room gate (outer gate) to the eighth century BC. Zorn (1997a:59), on the other hand, asserts that, due to the topography of the area, the inner gate could not have functioned independently of the outer gate and that both gates were probably constructed during the early ninth century BC by Asa, as the biblical narratives appear to indicate (1 Ki 15:22). Scholars also differ in their conclusions regarding the dating of the 'Great Wall'. Since McClellan (1984:54) and Katz (1998:131-132) date the construction of an earlier casemate wall to the eighth century BC (Phase B) based on the similarities of this phase with the eighth century BC phases at Tell Beersheba, Tell Beit Mirsim and Beth Shemesh (see Shiloh 1970:185), it follows that the offset-inset wall of Phase C post-dates this period. Na'aman (1994:224, n. 13), however, maintains that the wall was built during the sixth century BC by the Babylonians, while Zorn (1999:149) dates the construction of the 'Great Wall' to the same time as the two gates, namely, the early ninth century BC. Finkelstein (2012:19-21) provides yet a further possibility: since the manner in which excavations were carried out at the site provides no 'clear-cut stratigraphic-ceramic evidence', it is necessary to find parallels of contemporaneous Iron Age fortifications. These include Tel Dan, Hazor, Bethsaida, Megiddo, Tel Reḥov, Dor, Gezer, Jerusalem, Lachish, Beth-Shemesh, Beersheba and Arad, all of which have similar fortifications dating from the second half of the ninth century BC to the eighth

[42] Wright (1959:74) suggests that the casemate wall could have been repaired in Period III.
[43] Wright (1959:75) assigns these features to Period V.

century BC. Consequently, Finkelstein (2012:25) dates the construction of the 'Great Wall' to the reign of Joash (late ninth century BC).

#### *2.3.2.6 Jerusalem*

According to Uziel & Shai (2007:167, 170), the character of the settlement at Jerusalem prior to the eighth century BC was that of a 'royal-ritual site', in other words, it served as a royal estate and cult centre serving only the administrative needs of the Monarchy. However, during the eighth century BC, residential areas began to be added. At this time, Jerusalem encompassed the City of David, the Temple Mount and the Western Hill (Ussishkin 2003:105; 2009:473; 2015a; Uziel & Shai 2007:167). By the end of the eighth century BC, the size of Jerusalem had more than tripled in size (Broshi 1974:22-23). The change in status 'from an exclusively royal estate... to a city with both governmental and residential functions' may have been due to a number of reasons, for example: the destruction of Samaria which resulted in refugees from the northern kingdom coming to Judah as well as refugees from Judaean cities that were conquered by Sennacherib and ceded to the Philistines (Broshi 1974:21); the need to keep the 'royal-ritual' character separate was no longer important 'since dynastic rule had now been strongly established' (Uziel & Shai 2007:168); and/or cities that originated as royal centres expanded with the needs of a growing metropolis due to economic and trade development (Hudson 1999).

In the period between the erection of the massive fortifications of the Middle Bronze Age that have been uncovered on the eastern slope of the City of David[44] and those of the eighth century BC (see following paragraph), there are no signs of any new fortifications that can be assigned to this period (Ussishkin 2012:105-106). Ussishkin believes that the Middle Bronze Age fortifications fell into disuse during this period,[46] but that the remains were incorporated by the eighth century BC builders into their new walls (see King & Stager 2001:213). Moreover, based on an analysis of excavations conducted to date along the western side of the City of David, Ussishkin (2012:108-115) asserts that there is currently no evidence for a city

[44] These were excavated by Kenyon (1974:82-84, Pls. 19-20, 24), Reich (2011), Reich and Shukron (1999:77*-78*;[45] 2010:144-152), Shiloh (1984:12, 26, 52, Fig. 14) and Steiner (2001:10-23).

[45] Page numbers denoted with * throughout this study appear as they are numbered in the relevant journal articles.

[46] On the other hand, Cahill (2003:22), Geva (2006), Kenyon (1963:9-10; 1964:8; 1968:105-106), Mazar (2010:48) and Shiloh (1984:26, 28; 1985:303) all suggest that these walls probably continued in use throughout the Iron Age.

wall between the City of David and the Tyropoeon Valley. The Middle Bronze Age fortifications that, therefore, encompassed the City of David, have not yet been discovered on its western side (Ussishkin 2012:108-109, 115).

Eighth century BC city walls have been excavated on the eastern slope of the City of David by Kenyon (1974:130-131; Steiner 2001:89-92) and Shiloh (1984:8-10, 28) as well as in the area of the Citadel by Amiran and Eitan (1970:9-10, 15-16) and Geva (1979:84-91; 1983:56-58). Sections of an outer wall from the late eighth century BC that encompass the Siloam Channel were found by Reich and Shukron (2008:116-117; see Shanks 1999:27) south of the Gihon spring near the floor of the Kidron Valley. Houses were located in the area between the two walls. In addition, in the Jewish Quarter of Jerusalem on the Western Hill, a section of a massive city wall, 6.4-7.2 m thick and known as the 'Broad Wall', was excavated by Avigad (1970:130-131, 133; 1983:46-60). Based on stratigraphical and ceramic evidence, the wall has been dated to the time of either Hezekiah or Manasseh, although, based on 2 Chronicles 32:5, the excavator prefers to attribute the wall to Hezekiah. Ussishkin (2009:473) makes the assumption that the Temple Mount was also surrounded by fortifications and suggests the possibility that the plan of the complex on the Temple Mount followed that of the Omride complexes at Samaria and Jezreel.

A well-known feature of Jerusalem is the Gihon water system; this system includes the Gihon spring, Warren's Shaft, the Siloam Channel, the Siloam Tunnel and the Siloam Pool. According to the biblical records, Hezekiah channelled the water from the Gihon spring to the Siloam Pool in preparation for Sennacherib's attack (2 Ki 20:20; 2 Chr 32:2-4, 30; see Borowski 1995:152-153), but for this to be effective, the pool had to be situated within the city walls. Avigad (1970:133-134; 1972:195, Fig. 2), therefore, proposes that the section of the 'Broad Wall' that he excavated in the Jewish Quarter may possibly have continued in a southward direction, encompassing the Siloam Pool. Various scholars, however, have not reached consensus regarding the dating of the tunnel: Rogerson and Davies (1996:140-142) suggest a Hasmonean date; Sneh, Weinberger and Shalev (2010:57-58) propose that Manasseh built the tunnel; Cahill (1997:184), Shaheen (1977:110) and Frumkin, Shimron and Rosenbaum (2003:170-171) attribute the tunnel to Hezekiah; and Reich and Shukron (2007:153-161; 2011:153-154) advocate a date in the late ninth-early eighth centuries BC.[47]

[47] For a discussion on the dating of the tunnel, see Cornelius (2012).

On the other hand, it is generally accepted that the script of the Siloam Inscription that describes the manner of excavation of the tunnel dates to approximately the late eighth century BC (Cross 1962a:35; 2001:44; Hendel 1996:235-236; McCarter 1997:45-46).

Avi-Yonah (1971:168-169) ascertains that the extent of Jerusalem during the post-exilic period was much reduced as compared to the pre-exilic period. During the Babylonian period, the eastern slope of the City of David was abandoned and continued as such during the Persian period (Finkelstein 2008:506; Greenberg 2009:39, 41). Sections of walls found on the eastern slope by Kenyon (1974:183-187, Fig. 28) and Mazar (2009:74-75) cannot, according to Ussishkin (2012:117-118), be dated to the Persian period based on the Persian-period finds found in the fills beneath and against the walls since these indicate that the walls were built at a later date. In addition, excavations conducted on the Western Hill have yielded very few Persian Period remains (Avigad 1983:62; Ussishkin 2012:115-116).

The wall that, according to Nehemiah 3:1-32, was repaired by him is another complex topic. Various suggestions have been offered for an explanation of this wall: the wall described in these verses relates to the Hasmonean period; the wall encompassed only the City of David and the Temple Mount (the 'minimalist' view); or the wall encompassed the Western Hill as well (the 'maximalist' view) (Ussishkin 2012:118).[48] Ussishkin (2005; 2012:124-125) supports the 'maximalist' view, but this has been contested by Geva (2006) who explains that Nehemiah could not have repaired such a long wall (2,1 km) in only 52 days and proposes that part of the wall he repaired must have been the Middle Bronze Wall located on the western side of the City of David. Nonetheless, Ussishkin (2012:125) agrees with most scholars that, during the Persian period, the settlement was confined to the upper part of the City of David and the Temple Mount.

#### *2.3.2.7 Ramat Raḥel*

At Ramat Raḥel, two strata from the monarchic period were identified by the excavator, namely, Stratum Vb (late eighth-seventh centuries BC) and Stratum Va (end of seventh-early sixth centuries BC) (Aharoni 1965:15). Stratum IVb was attributed to the Persian period

[48] For in-depth discussions, refer to Avigad (1983:61-62), Avi-Yonah (1954:239-248), Finkelstein (2008:501-520), Knauf (2011:186-187), Simons (1952:437-458), Steiner (2011:307-315) and Stern (2001:434-436).

(fifth-third centuries BC). A section of a large building,[49] a tower on the west side of the hill, a terrace wall and the remains of a private dwelling were found in Stratum IVb (Aharoni 1965:15-16; Lipschits et al 2011:10, 12). Various pottery vessels and two storage jar handles with the impression *šbn'/šhr* ('[belonging] to Shebna [son of] Shahar') were found in the house together with other ceramic evidence, also from the eighth-seventh centuries BC, that was found mainly in the fills below the floors of the next stratum (Stratum Va). Moreover, the inordinate number of royal *lmlk* seal impressions that were found at the site, a third of which were also found beneath Stratum Va floors, attest to its occupation from the late eighth century BC as well as to the importance of the site as an administrative centre during this period (Aharoni 1965:16; Lipschits et al 2011:12, 15, 19; see 3.2.1.4[a][iii]). In addition, a number of proto-Aeolic capitals similar to those from Hazor, Megiddo and Samaria were found at the site, the first that were found in Judah (Aharoni 1956:141; 1961:103-104; 1962:xiv; 1965:19). Aharoni (1965:19) attributed these architectural features to Stratum Va. Lipschits et al (2011:20), however, state that, since these capitals were found in secondary use in Stratum Va, they should rather be attributed to the earlier stratum (Stratum Vb).

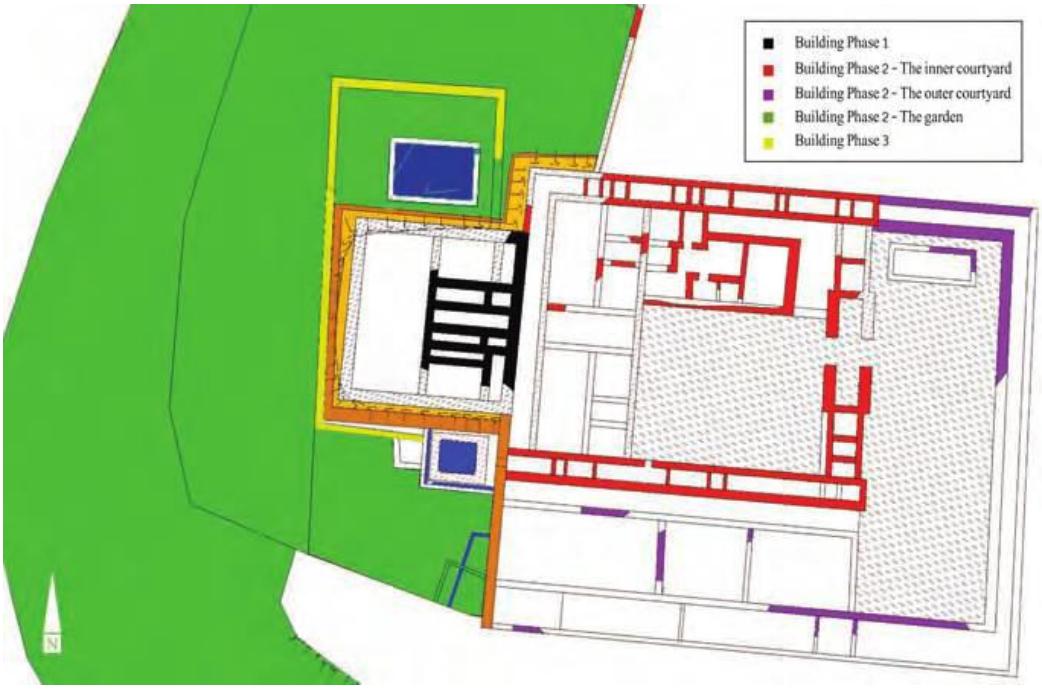



Figure 2.7: Plan of Ramat Raḥel depicting the different building phases (Lipschits et al 2011:11, Fig. 10)[50]

[49] Aharoni (1965:15) attributes this section to a casemate wall from Stratum Vb.
[50] Stratum Vb has been termed 'Building Phase I' and Stratum Va 'Building Phase 2' by Lipschits et al (2011:9), who renewed excavations at the site in 2004.

The significant changes wrought in Stratum Va resulted in severe damage to the structures of the previous stratum (Aharoni 1962:10; 1965:19; Lipschits et al 2011:21). A rectangular complex was added to the area east of the Stratum Vb tower. In addition, a royal garden was sunk into bedrock on the western side of the hill by excavating that area and using it as fill for the complex on the eastern side. According to Lipschits et al (2011:21-22), this is reflective of the 'grandeur and might of the state's investment, planning, and construction of the second-phase palace at Ramat Raḥel'. Two, perhaps three, plastered pools as well as two rock-cut roofed tunnels were excavated south of the tower (Lipschits et al 2011:23). Another pool, a tunnel and a large underground plastered water reservoir were found north of the tower. These were most likely used as part of the irrigation system for the garden (Lipschits et al 2011:25). The palace complex with an inner courtyard and an eastern courtyard was fortified by a casemate wall on its northern and southern sides and by a thick wall on the eastern side, the foundations of which were sunk into a rock-cut trench (Aharoni 1956:138; 1962:xiv, 14, 38; Lipschits et al 2011:30). Due to the precisely-sized blocks of the inner casemate wall that are very similar to those used for the original enclosure walls at Samaria and that reflect high-quality workmanship, Aharoni (1956:138-140; 1962:xiv, 38-39) suggests that the same building technique was used at both sites. In addition, sections of walls, also laid in bedrock, were found to the south of the southern casemate wall, leading Lipschits et al (2011:31) to conclude that the southern casemate wall formed part of the palace and not part of the outer enclosure wall. Some of the sections of the outer wall have been attributed to the earlier stratum and some to the second stratum.

The newest date that Aharoni (1962:60) has attributed to the construction of the citadel is the second half of the seventh century BC. He bases his conclusion on what he terms 'seventh century' evidence, which includes both types of *lmlk* stamps (see 3.2.1.4[a][iii]), that was found in the fills beneath the courtyard and the surrounding buildings. Aharoni (1962:40), however, contradicts himself earlier in his report when he states that the ceramic evidence found in the fills dates approximately to the eighth-seventh centuries BC. He (1962:51) explains further that, since the script of the *lmlk* stamps is very similar to that of the Siloam inscription, these impressions should be dated to the reign of Hezekiah and the early part of Manasseh's reign. Generally, the latest material found in fills below structures is used to date the construction of structures. If the two-winged type impression is to be dated to the late seventh century BC (see 3.2.1.4[a][iii]), Aharoni may be correct in dating the citadel to the seventh century BC. This concurs with the opinion of Lipschits et al (2011:33-34) who assert that the absence of rosette stamp impressions, which came into use during the late seventh

century BC (see 3.2.1.4[a][iv]), also indicates that the construction of Stratum Va could not have begun later than 630 BC. In contrast, since the complex at Ramat Raḥel resembles the ninth century BC one at Samaria as well as those at other sites so closely, Yadin (1979:211) posits that the date of its construction should rather be based on these parallels, in other words, to the ninth century BC. A layer of ash that covered the floors of the casemate wall and the courtyard in several places indicates that Stratum Va was destroyed by a conflagration at the end of the Iron Age (Aharoni 1956:143; 1961:107-108; 1962:5, 14, 49). During their excavations, Lipschits et al (2011:34), however, ascertained that the destruction layer was beneath the floors, not on top of them, and that the palace was not destroyed at the end of the Iron Age. Based on ceramic finds and abundant seal impressions of the *yhwd* type (see 3.2.3.3[b][ii]), an important administrative settlement continued to exist during the Persian and Hellenistic periods (Aharoni 1956:143; 1961:107-108; 1962:5, 14, 49; Lipschits et al 2011:34). During the Persian period (Stratum IV), a large new building was added to the north-western side of the Stratum Va palace complex, utilising part of the garden area. This building was dismantled to its foundations during the next building phase (Lipschits et al 2011:35-36). Remains of other buildings from this period have been found in other areas of the site. In the southern part of the garden, a destruction layer with ceramic evidence from the late Persian period indicates that this building was destroyed at that time (fourth century BC). Based on all the evidence, Lipschits et al (2011:36) state that the site of Ramat Raḥel was established as a Judaean administrative centre during Assyrian hegemony in Palestine and continued to serve as such during the Persian period.

#### *2.3.2.8 Lachish*

At Lachish (currently identified with Tell ed-Duweir), Levels V-II represent the period of the Monarchy (Yadin 1979:214). The debate regarding the destruction of Level III has raged on for a number of decades. Based on homogeneous pottery from the two levels, the destruction of Levels III and II was dated by Starkey (1937a:176; 1937b:235-236) to 597 BC and 587 BC respectively.[51] Tufnell (1950:77; 1953:55; 1959:103), on the other hand, maintains that the pottery from the two strata differ in character more than originally thought and consequently,

[51] Other scholars who agree with Starkey include Albright (1958:24), Buchanan (1954:335-336), Cross (1969:20, n. 4), Kenyon (1957a:206-207), Lance (1971:321, 329), Lapp (1960:17) and Wright (1955a:189; 1955b:100-101).

she dates the destruction of Level III to the campaign of Sennacherib in 701 BC.[52] Although Buchanan (1954:336) also states that some pottery types (such as perfume flasks, of which only one was found in Level II, and another type of storage jar, of which only two were found in Level II) were found in Level III, but not in Level II, he does not agree with Tufnell's destruction date for Level III. Storage jars with *lmlk* seal impressions (see 3.2.1.4[a][iii]) were found mostly in Level III (Lance 1971:329; Lipschits, Sergi & Koch 2010:17; Ussishkin 1974:274; 1978:76; 2011:223). Since these include the four-winged and the two-winged impressions, Lance (1971:322) asserts that, if Level III was destroyed by Sennacherib, the date of the whole *lmlk* series should be attributed to the late eighth century BC. On the other hand, since the two-winged impressions have been dated to the late seventh century BC to the reign of Josiah by Lapp (1960:17) and Cross (1969:20) based on slight palaeographical differences with the four-winged type, the Level III destruction should be moved to 597 BC as suggested by Starkey (1937b:235-236). These scholars, however, have also determined that there are palaeographical similarities between the two types of *lmlk* impressions, so much so that they should not be dated more than a generation apart. Consequently, the entire series should either be dated to the late eighth century BC or a century later. Alternatively, Na'aman (1979:73, 83) maintains that the palaeographical differences between the two types of impressions are geographical, not chronological, with the four-winged type being more prevalent in the Shephelah region and the two-winged type in northern Judah. Furthermore, the distribution of the impressions corresponds with the borders of Hezekiah's kingdom, while Josiah's kingdom extends beyond these boundaries (Na'aman 1979:75-77). Perhaps to further cement a destruction date for Level III in 701 BC, Rainey (1975:53-59) demonstrates that Babylonian and biblical sources make no mention of any city other than Jerusalem that was attacked by Nebuchadnezzar in 597 BC. This may also be confirmed by the fact that the Level III city bears a remarkable similarity to Sennacherib's reliefs depicting his conquest of Lachish (Barnett 1958:162-163; see Aharoni 1968a:342; Rainey 1975:48).[53]

Following Level VI is a poor habitation level that came into existence during Level V (dated to Iron IIA based on hand-burnished pottery with red slip; see 2.4.2) after the site had been

[52] Scholars who agree with Tufnell include Aharoni (1968a:341-342), Aharoni & Aharoni (1976:87), Aharoni & Amiran (1958:182, n. 42), Barnett (1958:162); Rainey (1975:47-60) and Ussishkin (1978:68, 71, 93; 1990:53; 1996:14, 46; 2015b).

[53] James (2007:215-216), in his review of *The renewed excavations at Lachish (1973-1994) by Ussishkin (2004)*, maintains that there is no definitive evidence for the 701 BC destruction date and suggests that Lachish IV could just as easily be the site depicted on Sennacherib's reliefs; he, however, does not rule out a 701 BC date, nor does he advocate the 597 BC date as an alternative.

deserted for a long period following its destruction at the end of the Late Bronze Age (Ussishkin 1978:26; 1983:116, 169-170). This small settlement was followed in Level IV by the construction of 'the largest, most massive and most impressive building of the Iron Age known in the Land of Israel' (Ussishkin 1978:27). Inner and outer foundation walls were erected for the palace-fort of this period (Palace B) and the space between them was filled with soil forming two podiums, Podia A and B (Figure 2.8) (Ussishkin 1978:28; 1996:35; 2004:771).[54] On Podium A, the palace comprised an open court in the centre with three rooms on the eastern and western sides and at least two long rectangular rooms forming a border along the northern and western sides (Ussishkin 1978:30; 2004:777). The foundations walls of Podium B were thicker and laid at a higher level than those of Podium A (Ussishkin 1978:32-34; 2004:785-786, 791). On Podium B, the palace was divided into long, narrow rooms with a wall, oriented east-west, dividing the building into two sections. On the southern and western sides, the foundations were strengthened with a huge, sloping ramp covered with a thick layer of plaster. In Level III, both existing podiums were enlarged and a massive foundation wall was added along the entire eastern side adjoined by a lime-plastered courtyard; Palace C was erected on this enlarged podium (Ussishkin 1978:35-36; 2004:807, 810, 812). Some of the interior walls of the earlier palace were dismantled and new walls were added. Part of the wall between Podia A and B was also dismantled since this area was covered with lime-plastered flooring. The courtyard was enclosed by a stone wall on its eastern and northern sides (Ussishkin 1983:151; 2004:828). Based on a thick layer of ash and burnt debris found against the eastern and southern walls of the palace, Palace C was destroyed by a huge conflagration (Ussishkin 1978:38; 2004:812).

[54] Ussishkin (1996:35; 2004:771) revised his former conclusions, which are still generally accepted, that Palace A was constructed on Podium A during Level V and Palace B on Podium B during Level IV. He explains that, if his revised conclusions are correct, then Palace A never existed.

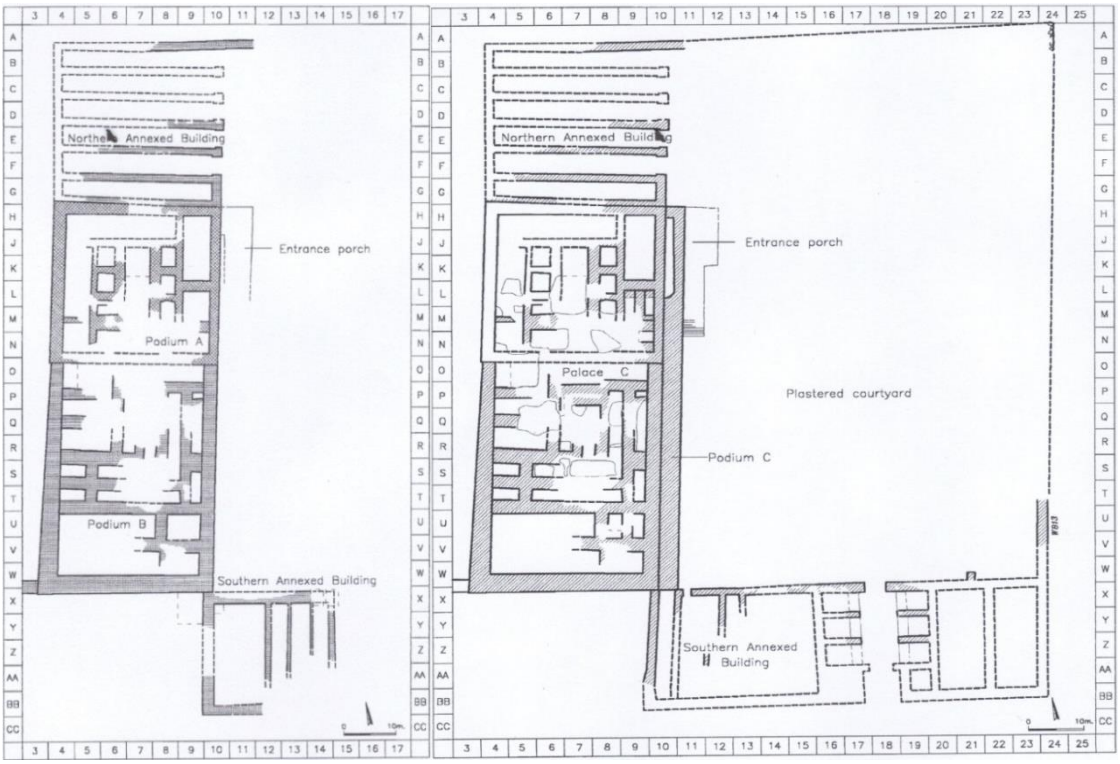



Figure 2.8: Lachish: Palaces B and C – schematic plans (Ussishkin 1996:34, Fig. 27)

A building on the northern side of the whole complex comprises three long narrow rooms that could be storerooms, stables or chariot houses and has been attributed by Ussishkin (1978:38; 1983:152; 2004:800, 802) to Palace B since its facade is in line with that of Palace B. A second additional building, known as the 'government storehouse', was erected at the south-eastern corner of the complex (Ussishkin 1978:38-41; 1983:147, 151; 1996:36; 2004:802, 806-807, 815). This building was also erected on a podium and is similar in character to Palace B. It comprises two units of three rectangular rooms, with possibly another two units of rooms on the eastern side since, although no further remains of this building have been found and only meagre remains of the superimposed building were discovered, the width of the easternmost wall is similar to that of the wall separating the first two units and is narrower in width than the existing external walls. A building (Building 1034) erected above the 'government storehouse' and attributed to the period of Palace C follows the plan of the earlier building closely. Ussishkin (1996:37) posits that the earlier building was used as stables and the later building and the courtyard as housing for a chariot unit. A gateway, similar in plan and size to the inner city gate, was excavated approximately in the centre of this building providing access to the palace courtyard (Ussishkin 1983:147; 1996:36-37; 2004:817). A roadway led from the inner city gate to this gateway (Ussishkin 2004:828). In the opinion of Ussishkin (1978:41; 2004:831), the 'government storehouse' is similar to, particularly, the southern stable compound at Megiddo. Both have similar plans, were

constructed on levelled ground and opened onto courtyards (if the assumption with regard to the 'government storehouse' is correct).

After the destruction of Level III, the site remained abandoned for approximately half a century before Level II was rebuilt (Ussishkin 2011:231). However, the area where Palace C was situated was not rebuilt until it was cleared for the construction of the Residency in Level I (Ussishkin 1978:28; 2004:774, 840). In addition, the area west of the palace, between it and the inner city wall, also appears to have remained mostly deserted during this period (Ussishkin 1978:54). A row of rooms was excavated along the eastern wall of Podium C in Level II (Ussishkin 2004:770). Above these rooms, the eastern wall of the Residency was found (Ussishkin 2004:842-843). Level II was destroyed by the Babylonians in 587 BC after which it was deserted until the return of the exiles (Tufnell 1953:57-58).

The post-exilic period is represented by Level I in which a spacious building, termed the 'Residency', was erected on the ruins of Palace C (Ussishkin 1978:41-42). Its length was not as long as Podium C so that the northern end of Podium A, which was used by the Level I builders as a source of building material, and the southern end of Podium B extended beyond the Residency (Ussishkin 2004:768, 841). However, due to its size, it probably served as a public building, a palace or a residence (Stern 2001:448). Its plan comprised courts, huge columns, reception halls and rooms with an outside platform or terrace at the southern end, while the rest of the city was sparsely built with only a few houses (Tufnell 1953:58-59, 131). Other structures include a temple (the 'Solar Shrine') and a city-gate complex (Stern 2001:448).

At the beginning of Level IV, an inner city wall made of bricks was constructed along the upper periphery of the mound and an enclosure wall extended from the south-western corner of the palace complex to this city wall, possibly to close off this area (Area S) from the rest of the city (Figure 2.9) (Ussishkin 1978:50; 1983:131). At the juncture of the enclosure wall and the brick wall, a massive tower was discovered. A second huge wall (W33) runs northwards from the enclosure wall, parallel to the western wall of Palace B, and may have served as a retaining wall for the sloping ramp of the palace (Ussishkin 1978:47). Later in Level IV, a building was erected in the corner between the brick wall and the enclosure wall on the southern side with these two walls serving as the northern and western external walls of the structure (Ussishkin 1978:51). The building comprised a number of units divided by narrow walls.

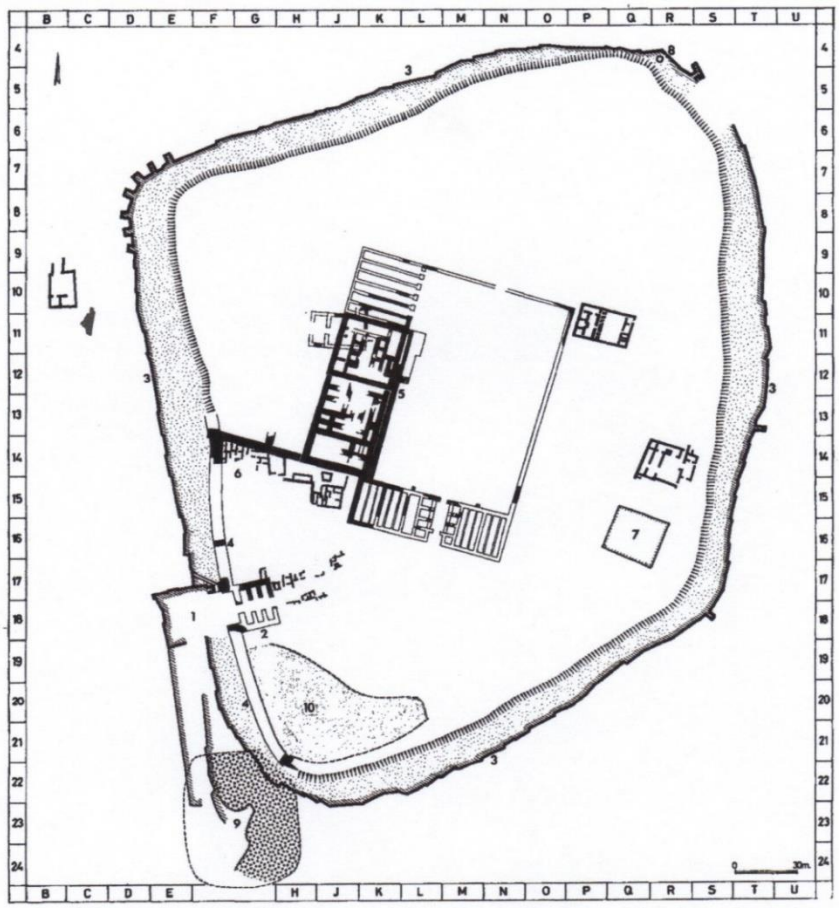


Figure 2.9: Plan of Lachish – (1) bastion/outer gate, (2) Level IV-III inner gate,
(3) outer revetment wall, (4) inner brick city wall, (5) Judaean palace-fort, (6) Area S,
(7) Great Shaft, (8) the well, (9) the siege ramp, (10) the counter-ramp (Ussishkin 1983:103, Fig. 2)

During Level III, the height of the section of the enclosure wall between the palace and wall W33 was increased and the section between wall W33 and the brick wall was replaced by a massive stone wall (Ussishkin 1978:52). All these fortifications probably made Lachish the most fortified stronghold of the period in Judah (Figure 2.10) (Ussishkin 1983:171).

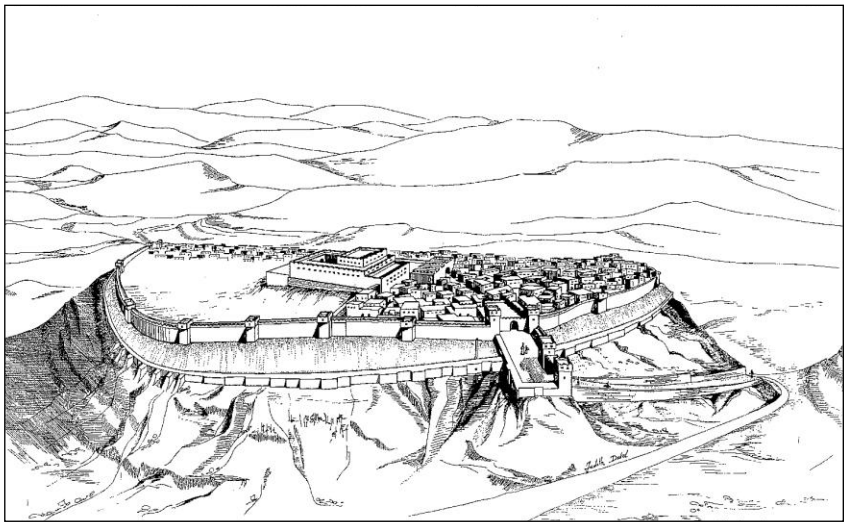


Figure 2.10: The city of Lachish at the time of Level III (Ussishkin 1983:172, Fig. 30)

During Level II, a stone city wall was constructed along a slightly different orientation to the earlier brick wall, but still utilising the brick foundations of the earlier wall (Ussishkin 1978:53-54). Some kind of dwelling was constructed on the ruins of the lower Level III house, but the rest of the area between the city wall and the ruined palace was uninhabited. In addition, the enclosure wall that had been destroyed at the end of Level III also lay in ruins during this period. The Level I city wall was built on the ruins of the Level II wall with the same orientation (Ussishkin 1978:54).

During Level IV, a massive outer revetment wall, 3.5 m thick and 2.6 m high, was built as a retaining wall for a Middle Bronze Age glacis surrounding the whole settlement (Ussishkin 1978:43; 1983:131, 142, 171). A roadway supported by two retaining walls either side led from the south-western corner of the settlement up to a massive tower, termed the 'bastion', which was first constructed in Level IV as part of the gate complex; it contained the outer gate and was connected to the outer city wall, while the inner gate was connected to the inner city wall (Ussishkin 1978:55, 59; 1996:38). During Levels IV-III, the inner gate was of the six-chambered type and was flanked by two massive towers, of which the northern one was connected to the brick city wall and was extended during Level III (Ussishkin 1978:58).

During Level III, the gate complex included outer gate courtyards leading to the outer gatehouse and an inner gate courtyard (Ussishkin 1996:44). A massive tower on the left side of the outer gatehouse was also added during this period. As with the gate complex at Tel Dan, the outer courtyards housed various cultic installations. The gatehouse complex was destroyed at the end of Level III in a violent conflagration (Ussishkin 1996:46). At the south-western corner of the settlement, a tower with a protected balcony was built against the outer revetment wall to reinforce that section from where combatants could defend the city; the inner city wall passed behind this tower (Ussishkin 1996:14). Ussishkin (1983:142; 1996:14) suggests it is possible that, at this point, the inner wall joined the outer revetment wall to provide an approximately 15 m wide defensive structure. Furthermore, he (1978:71) believes that the siege ramp that was excavated at Lachish should be identified with the one portrayed in Sennacherib's reliefs. To counteract this ramp, the Level III inhabitants dumped huge amounts of soil against the inner face of the city wall to strengthen it against attack (Ussishkin 1983:143).

During Level II, the city wall extended from the inner city gate and followed the line of the top of the counter-ramp to approximately the centre point of the ramp at the south-western

corner, at which point it disappears; its line was therefore inside the line of the previous inner city wall (Ussishkin 1983:144, Fig. 21, 146). In addition, the roadway and its retaining walls were extended by 30 m as a result of the Level III siege ramp which had enlarged the south-western corner and the gate complex was built on a smaller scale on the ruins of the Level III complex (Ussishkin 1978:65; 1983:134-135; 1996:38). The outer two piers were overlaid by the inner gate and city wall of that period which also cut into the towers (Ussishkin 1978:58). The complex had a central courtyard surrounded by casemate walls and protruding towers at each corner and, as such, may also have served as a public building, providing a possible reason why the Lachish Letters (see 4.7.2.1[i]) were kept in one of the its rooms (Ussishkin 1983:136). During Level I, the city wall was completely reconstructed on the ruins of the Level II wall (Ussishkin 1978:67; 1983:146).

*2.3.2.9 Arad*

Strata X-VI at Arad have been attributed to the Divided Monarchy and Stratum V to the Persian period (Herzog et al 1984:8, 12, 19, 22, 26, 29). During Stratum X (late tenth-ninth centuries BC), a new fortress was built following the destruction of the previous one (Herzog et al 1984:8).[55] During this period, a massive solid wall replaced the Stratum XI casemate wall; however, where there were any remaining casemates, these were filled in. A new gate, with two massive towers on each side, was also constructed, but it was now located in the centre of the eastern wall. In addition, an earthen rampart, supported by a revetment wall, was built against the solid wall (Herzog et al 1984:10-11). A courtyard was located in the centre of the fortress, a storehouse in the north-eastern corner, workshops to the west of the courtyard and residential quarters south of the courtyard, while the temple in the north-western corner was rebuilt and extended to the north. Herzog et al (1984:12) have attributed the destruction of Stratum X to the second half of the ninth century BC, while Aharoni (1981:129) suggests circa 800 BC for the destruction of this stratum.

The outline of the Stratum IX fortress followed that of the previous fortress, while some changes were made to the structures within the walls (Herzog et al 1984:12-13). A new building was erected between the storehouse and the temple and the plan of the temple was

[55] Mazar and Netzer (1986:90) propose the following chronological phases at Arad: Strata X-VIII – eighth century BC; and Strata VII-VI – end of Iron Age until the Babylonian destruction. Aharoni (in Aharoni & Rainey 1985:73) attributes Stratum X to the late ninth-early eighth centuries BC.

changed slightly. The workshops and residential quarters remained in the same areas as previously. The destruction of this stratum occurred, most likely, circa 735/734 BC at the hands of the Edomites and the Philistines who took advantage of the invasion of Galilee and Damascus by Tiglath-pileser III during the reign of Ahaz (Aharoni 1981:129; Herzog et al 1984:19).

A new fortress was erected during Stratum VIII (late eighth century BC), probably by Hezekiah in preparation for his rebellion against Assyria (Herzog et al 1984:22). In addition, two new buildings were built between the storehouse and the temple, perhaps to serve as storerooms for the temple, and some features of the living quarters were changed slightly (Herzog et al 1984:19). In the gate area, the thickness of the southern tower was doubled. The destruction of Stratum VIII may be attributed, once again, to the Edomites, but this time with the cooperation of the Assyrians. An ostracon (No. 40) that was found in Stratum VIII in a room in the centre of the citadel may attest to the situation regarding Edom at the time (Aharoni 1981:71, 129). It is a letter that appears to have been sent by the commander of a southern fortress, possibly Ramat-Negev located on the border of Edom (Aharoni 1981:143, 146),[56] to Arad and is written on a dark grey fragment of a jug; consequently, the black ink is difficult to read. Judging by the opening, the addressee, Malkiyahu, is the superior of the authors of the letter, Gemaryahu and Neḥemyahu, and could have been one of the senior administrators, possibly even the commander, at Arad during this period. Lines 13-15 read as follows: 'The King of Judah should know [that w]e cannot send the [..., and th]is is the evil that Edo[m has done]'. Aharoni (1981:74) surmises that the ostracon may refer to Hezekiah and that the 'evil' concerned Edom's capitulation to Sennacherib.

Instead of completely dismantling the destroyed segments of the wall of the previous stratum, a new Stratum VII (seventh century BC) inner wall was built 2 m from the former wall (Herzog et al 1984:22). Parts of this new wall have been excavated along the northern, eastern and southern sides. Furthermore, a new projecting tower was erected in the centre of the western wall. At the southern end of the fortress, the new inner wall resulted in the division of the living quarters into two sections; in the section between the new inner wall and the old

[56] Ramat-Negev, which means 'high place', has been identified by Aharoni (1981:146-147) with Ḥorvat ʿUza, where an Iron Age fortress, similar in plan to the Stratum VI fortress at Arad, was built on top of a mountain. The site is situated very close to Arad and controlled the main road from Edom, referred to as 'the way of Edom' (2 Ki 3:20). Beit-Arieh and Cresson (1991:128), on the other hand, identify the place with the site of Tel ʿIra (Khirbet el-Gharra) and Ḥorvat ʿUza (Khirbet Ghazza) with Kinah. Aharoni (1970:21) identifies Kinah with Ḥorvat Tov.

solid wall, some of the walls between the rooms were removed, resulting in elongated rooms. One of these rooms yielded three seals (see 2.3.3.2) and three ostraca (see 4.7.2.1[f]) belonging to Eliashib, son of Eshiyahu, possibly the commander of the fortress (Aharoni 1981:119). The temple was dismantled and covered with a layer of earth, possibly attributable to the reforms by Josiah, and a residential unit was erected above the temple (Herzog et al 1984:22-23). Arad Ostracon Number 88, attributed to Stratum VII on the basis of its script, could possibly have been sent by Jehoahoaz, who was replaced by his brother, Jehoiakim, to the commander at Arad, informing him that he (Jehoahaz) was now king of Judah and requesting the commander to prepare for battle against Pharaoh Necho (see 2.3.1) (Aharoni 1981:103-104). However, Herzog et al (1984:26) posit that Stratum VII was not destroyed at this time (609 BC) by Pharaoh Necho, but attribute its destruction to the 'bands of the Chaldees, and bands of the Syrians, and bands of the Moabites, and bands of the children of Ammon' after Jehoiakim rebelled against the Babylonians (see 2 Ki 24:2).

The last Iron Age stratum, Stratum VI, has been attributed to the late seventh-early sixth centuries BC by Aharoni (1981:129-130) and to the early sixth century BC by Herzog et al (1984:26-27). A new casemate wall was erected on the ruins of the previous solid wall and three towers were built, one each at the north-western and south-western corners and one midway along the western wall.[57] A new gate was constructed in the centre of the northern wall. Apart from the southern area that continued as a residential area, now containing newly-erected living quarters, the inner area of the fortress was mostly unoccupied. Additional letters from this period addressed to Eliashib were found on the southern side of the fortress (see 4.7.2.1[f]). The destruction of this stratum has been attributed by Herzog et al (1984:29) to the Edomites who invaded the Negev at the same time that the Babylonians conquered Judah; Aharoni (1981:130) posits the date as 595 BC.

The Hellenistic period (Stratum IV) left no building remains in Stratum V; consequently, based on pottery finds and Aramaic inscriptions, the Stratum V date has been attributed to the mid-fourth century BC (Persian period) (Herzog et al 1984:29). The contents of the Aramaic ostraca (see 4.7.4.2[h]) found in ash pits from this period, including the names mentioned therein, indicate that Arad served as a way station for caravanserai and as a military surveillance point during this period.

[57] Some scholars (Mazar & Netzer 1986:87-88; Yadin 1979:219) have attributed the casemate wall to Stratum IV (Hellenistic period).

*2.3.2.10 Beersheba*

The Stratum V solid wall (see 2.2.2.2[d]) continued to be used in Stratum IV (late tenth-early ninth centuries BC), while in Stratum III (ninth-eighth centuries BC), a casemate wall was constructed and this wall continued in use in Stratum II (eighth century BC) (Aharoni 1974b:34, 36; Yadin 1979:223). Also attributed to Strata III-II is a second four-room gate that mostly followed the plan of the previous gate, with the exception that the outer gate went out of use from this time (Aharoni 1974b:37; 1975:147). Based on similarities of the pottery with that of Lachish III, Stratum II was destroyed at the end of the eighth century BC by Sennacherib (Aharoni 1974b:42; 1975:156, 166). After this, an unfortified settlement existed on part of the site until the end of the Iron Age (Stratum I) (Aharoni 1975:166). During the late Persian period, a fortress was erected in the central part of the tell (Aharoni 1974b:42).

*2.3.2.11 Tell el-Kheleifeh/Ezion-geber/Elath*

During Stratum II at Tell el-Kheleifeh, the Stratum I courtyard was extended, resulting in the fort being located in the north-western corner of the site (Glueck 1965:82-83; Yadin 1979:224). The fort was further fortified by an offset-inset wall, with the Stratum I northern and western walls being replaced by the new wall which was strengthened by a glacis. All these fortifications were, in turn, surrounded by a dry moat and another wall. Towers were also erected at each corner of the offset-inset wall (Glueck 1965:84). A four-room gate with a fortified tower was located in the southern wall (Glueck 1965:84; Yadin 1979:224). This gate has been attributed to the ninth century BC based on its similarity with the gates at Tel Dan, Megiddo and Beersheba. Glueck (1965:84) believes these building activities should be attributed to Jehoshaphat. This stratum may have been destroyed by the Edomites during their rebellion against Joram, son of Jehoshaphat. They, however, did not have the means to rebuild the site, resulting in its abandonment for a long period (Glueck 1965:84-85; Yadin 1979:224). Stratum III was probably rebuilt by Azariah/Uzziah (Glueck 1965:85; 2 Ki 14:22; 2 Chr 26:1-2). Towards the end of the eighth century BC, after their conflict with Ahaz, the Edomites rebuilt a substantial settlement in Stratum IV, which lasted until approximately the end of the sixth century BC when it was destroyed by the Babylonians (Glueck 1965:86-87). Stratum V represents the Persian period, a time of extensive trade relations with Arabia and Greece as evidenced by Aramaic ostraca (see 4.7.4.2[e]) and fragments of black-glazed Greek pottery. The site was abandoned at the end of the fifth century BC or the beginning of the fourth century BC.

### 2.3.3 Administrative organisation

In 2 Chronicles 11:13-14 we read that Jeroboam I, king of Israel, dismissed the Levites that David had employed in his administration and appointed his own priests. According to Yeivin (1979b:152), the reason was probably due to the Levites' loyalty to David's line. Unfortunately, the biblical narratives do not, as with David and Solomon (see 2.2.3.2-2.2.3.3), provide lists of officials under the various kings. Only here and there do names and functions appear (Yeivin 1979a:160). After Joram, king of Israel, was assassinated by Jeru, Jeru sent letters to the officials of Jezreel in Samaria, which included the palace administrator, the city governor, the elders and the guardians of Ahab's children (2 Ki 10:1, 5). In another instance, during the reign of Jehoiakim, king of Judah, a number of officials were gathered together in a room in the palace; these included two scribes and 'all the other officers', one of whom, according to Yeivin (1979a:160; see Jr 36:10, 12), may have been the commander-in-chief. Accordingly, a few examples of the available evidence for the names of officials employed by the royal administration, mainly during the Divided Monarchy, will be discussed.

#### *2.3.3.1 Seals, seal impressions and bullae*

(a) Uninscribed (tenth-ninth centuries BC)

Eighteen stamp seals, made mostly from limestone, and two seal impressions on jar handles (Figure 2.11) were discovered at Tel Reḥov in the Beth-Shean Valley (Keel & Mazar 2009:57*). They bear local Palestinian fertility and religious motifs and have been dated to the late Iron Age I and Iron Age II: one seal dates to the eleventh century BC; four to the early to mid-tenth century BC; and the other fifteen, which include the two impressions, to the late tenth-ninth centuries BC (Keel & Mazar 2009:62*). The purpose of the seals is uncertain, but they may have been used as talismans and, by virtue of the two impressions, for marking vessels as well. Another six impressions – four from the late tenth-ninth centuries BC, one a surface find and the last one found out of context at Beth-Shean – were impressed on the handles of jars known as the 'hippo' type, a large storage jar common to the tenth-ninth centuries BC at Tel Reḥov (Keel & Mazar 2009:63*-64*). Three different seals were used to make these impressions. Keel and Mazar (2009:65*-66*) believe that these seals were used by local workshops and the use of the same seal may indicate 'some kind of administrative system', a possible forerunner of the *lmlk* (see 3.2.1.4[a][iii]) and rosette stamp seal systems

(see 3.2.1.4[a][iv]). Furthermore, these uninscribed seals provide a *terminus post quem*, circa late ninth century BC, for the introduction of inscribed seals in Palestine (Keel & Mazar 2009:66*).


Figure 2.11: Photographs of seal impressions; nos. 5 and 19 are photos of impressions on jar handles (Keel & Mazar 2009:58*, Fig. 1)

Another group of uninscribed seals, scarabs and bullae (Figure 2.12) were found in the fill of the floor of an eighth century BC house built in the 'rock-cut pool' near the Gihon Spring in Jerusalem (Reich, Shukron & Lernau 2007:153-154). 'Approximately ten seals and scarabs ... and fragments of over 170 clay bullae bearing a seal impression or part of an impression … [and] several hundred unimpressed, broken clay lumps' have been attributed to the late ninth-early eighth centuries BC (Reich et al 2007:156). Many of the artefacts bear imprints of the papyrus, woven linen, straw or wood that was used as packing material as well as various motifs, some of them Phoenician, and Egyptian writing signs that were also found on the Samaria Ostraca. Reich et al (2007:162) propose that these remains point to an administrative centre in this area with the broken bullae indicating 'incoming mail' and the seals and scarabs indicating 'outgoing mail'. Confirmation of this may come from a small bone plaque with fifteen drilled holes possibly used as a type of primitive calendar; this device is also attested at Lachish, Aroer and Tell el-Farʿah (South) in Iron II contexts. In the ninth century BC, Jehoram, king of Judah, married Athaliah, daughter of Ahab (2 Ki 8:18). Consequently, Reich et al (2007:162-163) suggest the possibility of ties maintained between Israel, Judah and Phoenicia that would also have included exchanging correspondence and commodities. These finds, therefore, provide possible information regarding the early stages of the development of bureaucracy that was fully realised during the eighth-seventh centuries BC (Reich et al 2007:163).

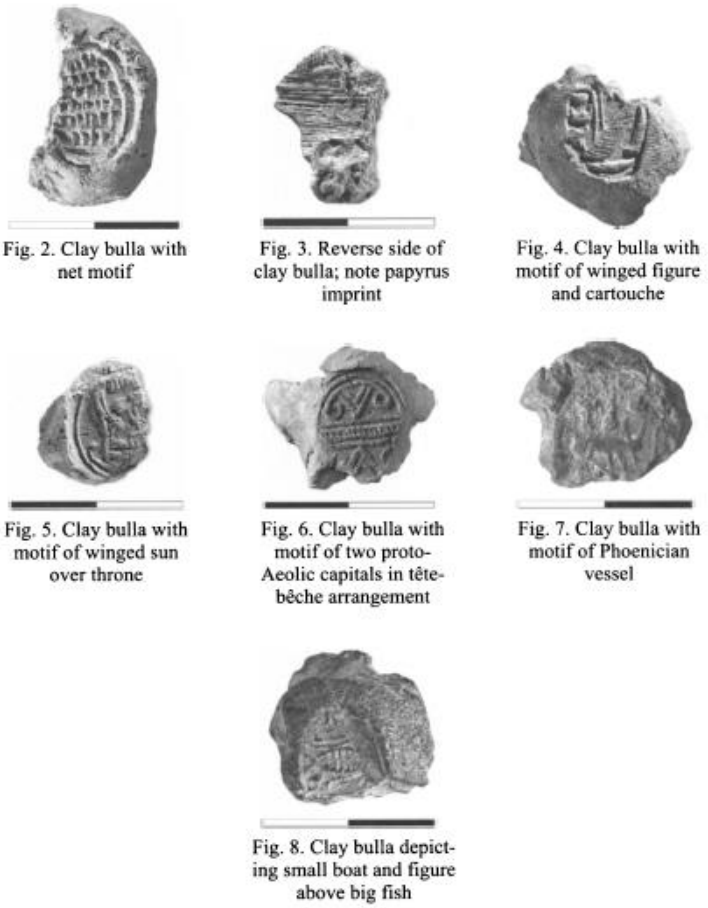


Fig. 2. Clay bulla with net motif

Fig. 3. Reverse side of clay bulla; note papyrus imprint

Fig. 4. Clay bulla with motif of winged figure and cartouche

Fig. 5. Clay bulla with motif of winged sun over throne

Fig. 6. Clay bulla with motif of two proto-Aeolic capitals in tête-bêche arrangement

Fig. 7. Clay bulla with motif of Phoenician vessel

Fig. 8. Clay bulla depicting small boat and figure above big fish

Figure 2.12: Fragments of bullae found near the Gihon Spring in Jerusalem (Reich et al 2007:157)

(b) Inscribed (eighth-sixth centuries BC)

A number of finds provide an indication of the development of bureaucracy in Palestine during the eighth and seventh centuries BC, as can be seen in the introduction of inscribed seals. Paradoxically, an inscribed seal that has been dated by Yeivin (1960:205, 209) to the tenth or, at the latest, the mid-ninth century BC, was found at Megiddo (see 2.3.2.3). The seal bears the inscription '(belonging) to Shemaʿ (the) servant (of) Jeroboam'. The seal has been generally dated to the time of Jeroboam II but, based on palaeographical considerations, Yeivin (1960:212) attributes it to the reign of Jeroboam I.

Two seals mentioning Azariah/Uzziah have been found: the one is inscribed 'belonging to Shebhanyo the servant of Uzzyo' and the other 'belonging to Abhyo the servant of Uzzyo' (Levy 1869:40-41; Yeivin 1979a:169). If, as the Bible (2 Ki 14:22) claims, Azariah rebuilt Elath, then Stratum III (eighth century BC) should be attributed to him (Yeivin 1979a:167). At the site of Tell el-Kheleifeh (presently identified with Ezion-geber/Elath), a seal signet ring inscribed with *lytm* ('belonging to Jotham') and the picture of a ram as well as a second

symbol below the inscription was found in Stratum III (Glueck 1940a:13; 1965:86). The second symbol has been identified by Glueck as the figure of a man, albeit a headless one, and by Avigad (1961:21) as a bellows. Consequently, Avigad proposes that the seal may have belonged to someone in charge of mining at the site.[58] It has also been suggested that the seal could have belonged to Jotham, son of Azariah/Uzziah, in his capacity as crown-prince (2 Ki 15:5 uses the phrase 'over the house') or to a governor of Elath who was named Jotham (Avigad 1961:21; Glueck 1965:86). Albright (in Glueck 1940a:15, n. 9) maintains that if the seal belonged to Jotham in his capacity as crown-prince, the phrase 'son of the king' would most likely have been added, but since there is no such addition, it could refer to his position as king of Judah. The seal has been dated by Albright (in Glueck 1940a:15, n. 9) to 750-650 BC. A seal dating to the third quarter of the eighth century BC bears the inscription '[belonging] to ʾAshna [the] servant [of king] Ahaz' (Yeivin 1960:207).

Fifty-three complete and fragmentary Hebrew bullae were found in Shiloh's Area G in the City of David in Stratum 10 (second half of seventh-early sixth centuries BC) in a building that has been termed the 'House of Bullae' (Shoham 2000:29-30, 32). The 'House of Bullae' is located on the lower of two terraces at the base of the 'Stepped Stone Structure' (Shiloh 1986:18). The reverse side of these bullae still bear the imprint of the papyri or string that was used to tie the papyri. Many of the names on the bullae appear in the Bible, for example, Bilgai the priest (Neh 10:8), Shaphan the scribe (2 Ki 22:3, 8-10, 12), Elishama the priest (2 Chr 17:8), Elishama the scribe (Jr 36:12, 20) and Meshullam the scribe (2 Ki 22:3) (Shoham 2000:32-33, 36, 38). On one of the impressions, Gemariah, son of Shaphan, is mentioned (Shiloh 1986:33-34). His name also appears on an ostracon from Samaria (No. 50) (see 4.7.1.2[b]) and on the Arad Ostraca (Nos. 31 and 40) (see 2.3.2.9; 4.7.2.1[f]) as well as in the Lachish Letters (see 4.7.2.1[i]). In Jeremiah 36:10-12, 25 he is referred to as an official and a scribe. Shiloh (1986:34) maintains that the location of his room at the gate of the temple implies that he must have been someone important. In the 'Large Stone Structure' at Jerusalem (see 2.3.2.6), another seal impression from the late Iron Age with the inscription 'belonging to Yehuchal ben [the son of] Shelemiyahu ben [the son of] Shovi' was found (Figure 2.13) (Mazar, E 2006). Yehuchal is mentioned in Scripture as an official of Zedekiah (Jr 37:3; 38:1) and is also known from another seal impression from the same period at Lachish (Aharoni 1968b:166) as well as from a seal from Tell eṣ-Ṣafi (Diringer, cited by

[58] This suggestion was, however, made prior to Glueck's (1965:73) reappraisal of his original classification of the excavated building at the site as a smelter.

Aharoni 1968b:166) and from one of the Arad Ostraca (Aharoni 1981:42). Other seal impressions bearing the names of royal officials include two from Lachish that bear the inscriptions '[belonging to] Shebanyahu [servant/son] of the king' and 'Gedalyahu [Gedaliah] steward of the king's house'; another one from Beth-Zur reads 'Ge'alyahu son of the king' (Aharoni 1968b:167-168).

Figure 2.13: Seal impression of Yehuchal from the 'Large Stone Structure' at Jerusalem (Mazar, E 2006)

*2.3.3.2 Inscriptions*

Of the more than 200 ostraca that were discovered at Arad, slightly more than half date to the time of the Monarchy (tenth-sixth centuries BC) (see 4.7.1.1; 4.7.2.1[f]) and the rest to circa 400 BC (see 4.7.4.2[h]) (Aharoni 1968c:9-10). One ostracon has been dated to the tenth century BC. On a number of the ostraca that have been dated to the late seventh-early sixth centuries BC, the name Eliashib is mentioned (Aharoni 1966a:2; 1968c:13). One of these ostraca (No. 18) may shed some light on the occupation of Eliashib; the reference to the 'House of Yahweh' may suggest that Eliashib was connected to the temple in Jerusalem (the Arad temple had been destroyed prior to this) and that he was responsible for distributing rations to travellers connected with the Jerusalem Temple (Aharoni 1966a:5-7; 1981:36). Furthermore, the three seals belonging to Eliashib (Inscriptions Nos. 105-107) that were found also attest to his position as one of authority even though they do not bear his title and the room in which they were found together with ostraca addressed to him suggest that it served as his storehouse and archive (Aharoni 1981:119). Aharoni (1981:120) asserts that Eliashib was the commander of the Arad fortress from the late seventh-early sixth centuries BC. Eliashib is also mentioned in the Bible (1 Chr 24:12) as one of the governors of the temple and he may, therefore, have served in this capacity at Arad (Aharoni 1966a:7).

*2.3.3.3 Weights*

A stone weight of unknown provenance may possibly date to the ninth or eighth century BC (Avigad 1968:181, 187). It bears the inscription '[belonging] to Shemaʿ', a common name that also appears on the seal found at Megiddo (see 2.3.3.1[b]) (Avigad 1968:183).

Numerous stone weights from the late seventh-early sixth centuries BC were found by Kenyon in the City of David, of which one is a 15-*sheqel* weight and another a 24-*sheqel* weight (Scott 1965:128; see 3.2.1.4[b][i]). Other weights from this period were also found at Lachish; they include four weights of 4 *sheqels* each, two weights of 8 *sheqels* each and one 1-*sheqel* weight (Aharoni 1968b:165). The 1-*sheqel* weight bears an inscription '[belonging] to [Na]dab-/yahu', probably the owner of the weight.

A number of weights (flat-topped, dome-shaped and made from limestone), marked with the *sheqel* sign (𐤔) (see 3.2.1.4[b][i]) and dating from the Persian period, have been found at Nebi Rubin, Beth-Zur, Gerar/Tell Jemmeh, Gezer, Lachish, the Ophel, Tell Zakarîyeh, Gibeon and Meẓad Ḥashavyahu (Duncan 1931:216-220; Glueck 1959:35-36; Naveh 1962:27, 31-32). The weight from Nebi Rubin also bears the name 'belonging to Berekay' inscribed in retrograde, a name frequently found in the Bible in the form of Berekiah: in 1 Chronicles 3:20, one of the descendants of Jehoiachin; in Nehemiah 3:4, 30, one of the repairers of the wall of Jerusalem; and in Zechariah 1:1, 7, the father of the prophet, Zechariah. These possibilities would fit in with the date of the weight (Glueck 1959:38). This weight could possibly also have served as a seal due to the name inscribed on it.

## 2.4 ORGANISED INDUSTRIAL PRODUCTION AND TRADE

A number of passages in the biblical narratives refer to commercial activities (see 2 Ki 4:7; 7:1; Neh 13:15-16; Pr 31:24), primarily in agricultural produce on which the economy of Palestine was based (Elat 1979b:173). However, the manufacturing of finished goods such as fabrics, tools, weapons, pottery, jewellery, spices and ornaments also occupied an important place in the economy. In most cases, these products were made by specialised craftsmen whose skills were usually passed down from generation to generation as can be seen in the biblical record where families were identified by their particular craft (see 1 Chr 4:23; Neh 3:8). The Bible also refers to the chief means of payment, namely silver (see 1 Sm 9:8; 2 Sm

18:12; 24:24; 1 Ki 20:39; 2 Ki 6:25; 7:1), and the use of weights and measures, albeit in the context of deception, is also mentioned (see Pr 16:11; 20:23; Mi 6:11).

David's control of the two international trade routes, the *Via Maris* and the King's Highway (see 2.2.1.2), held significant advantages for Hiram, king of Tyre, since these routes provided unlimited access to the lucrative trading opportunities offered by the South Arabian Peninsula whose caravans brought incense, spices and precious metals to Phoenicia as well as to Palestine (Mazar 1979:91). The Phoenicia-Israel alliance was also to the advantage of Israel, who benefited from Phoenicia's cultural advancement and their maritime expansion to Cyprus and North Africa. Consequently, the alliance brought stability to the region, promoted peaceful international trade relations with Egypt and Syria and led to the development of commerce and various industries such as architecture, art, metallurgy, carpentry, ivory-carving, weaving and dyeing of textiles (Mazar 1979:91).

The biblical narratives also make references to international trade relations between Israel and Phoenicia, Arabia and Egypt during Solomon's reign (1 Ki 5:8-9; 9:28; 10:10, 13, 22, 28; 2 Chr 9:14). In addition, this period is characterised by, *inter alia*, improved techniques in pottery-making, pottery imports from Phoenicia and Cyprus, the use of storehouses for the collection of agricultural produce and the construction of additional forts along the Negev trade routes (Aharoni 1968a:273).

Archaeological evidence of spinning, weaving, dyeing, pottery-making and metalworking in Palestine indicates that these crafts were carried out in a domestic as well as a royal context (Stern 1979:237). The Bible refers to a number of trades carried out, in many cases, by the members of a family who most likely lived in the same town or area, usually in close proximity to the required raw materials. Examples are 'the house of them that wrought fine linen' (1 Chr 4:21) and 'families of the scribes' (1 Chr 2:55). Other trades mentioned include potters (1 Chr 4:23), goldsmiths and merchants (Neh 3:32). Some of these were under the direct control of the king, as seen in 1 Chronicles 4:23: 'there they dwelt with the king for his work'. A Hebrew ostracon found at Lachish contains a list of personal names to which a certain commodity was distributed, including 'to the house of Achzi[b]', possibly a royal

workshop (Aharoni 1968b:169).[59] The king and the temple also employed cooks in the kitchens (1 Sm 8:13; 9:19-24). A ninth century BC bowl inscribed with 'belonging to the cooks' and a store jar with a mid-ninth century BC inscription, 'belonging to the cupbearer', were found at Tel Dan and 'Ein Gev respectively (Avigad 1966:210-211; Mazar et al 1964:28; see Stern 1979:240).

Possible evidence for the use of residential houses for small industrial and commercial enterprises has been found at a number of sites (Beebe 1968:55). Dye vats and loom weights attesting to dyeing and weaving industries were uncovered in houses at Debir; an open hearth and underground water system found in a house at Shechem may have been used to bake lime or fire pottery; and houses at Jericho that have more than the normal number of saddle querns could point to a corn-grinding business, while narrow booths attached to exterior house walls on which clay jars with carbonised grain were found could indicate commercial shops (Beebe 1968:55).

### 2.4.1 Textiles

Very few spindles (narrow rods with pointed ends) have been uncovered in excavations (Stern 1979:242). Those that have been found are made of bone. On the other hand, stone, bone, ivory and clay whorls (weights attached to one end of the spindles) from the Iron Age have been found in large amounts. At Megiddo, nine ivory whorls were found in a cloth bag in the destruction layer of Stratum VI (eleventh century BC) (Yadin 1970:78). Numerous spinning bowls that were in use in Palestine from the Late Bronze Age until the seventh century BC and that attest to the prevalence of cloth-making have also been uncovered at various sites (Dothan 1963:104). At Tell Qasîle, spinning bowls pertaining to the period under discussion were found: three from circa 1050-985 BC and two from circa eighth century BC to 733-732 BC (Figure 2.14) (Dothan 1963:99; Maisler 1950-51b:128, 135). From Tell Jerishe comes a complete spinning bowl and a fragmentary bowl dating to circa 1050-985 BC (Dothan 1963:100). One spinning bowl, circa 1000-950 BC, was found at Beth-Shemesh and another,

[59] For a discussion on the phrase in Micah 1:14, 'the houses of Achzib', refer to Demsky (1966:211-215). Demsky believes that the site was a 'royal industrial plant' and that the term 'houses' refers to workshops or factories.

dating to the seventh century BC, at Tell Jemmeh (Figure 2.15) (Dothan 1963:100; Grant 1932:27, 43, Pl. XXXI:28).[60]

Figure 2.14: Spinning bowl from Tell Qasîle (Dothan 1963, Pl. 14A)

Figure 2.15: Spinning bowl from Tell Jemmeh (Dothan 1963, Pl. 14C)

A tenth century BC weaving workshop found at Tel Amal near Beth-Shean contained cooking pots, jugs, storage jars, stone tools, stone weights and charred remains of looms (Stern 1979:244-245). At Tell es-Saʿidiyeh (biblical Zarethan), spindle whorls and 72 loom weights were found on the floor of a building dating to the tenth century BC (Pritchard 1964a:6). In a Late Iron Age weaver's workshop at Lachish, a charred post from a weighted loom that stood on a raised, cobbled platform was found together with loom weights and a vat used for dyeing (Starkey 1936:189). A seal impression which reads 'For [or belonging to] Hilkiah the son of Maas' was also among the finds and may have belonged to the weaver (Starkey 1936:188; Stern 1979:244).

Various species of dye-producing snails were used in ancient times to produce the varying shades of what is known as 'Tyrian purple' (Jensen 1963:105). Mounds of crushed snail shells belonging to species such as *murex brandaris, murex trunculus, helix ianthina* and *purpura lapillus* were found along the Mediterranean coastal regions, including Tyre and Sidon.[61] Finds from tenth century BC dye plants excavated at Tel Amal include dye tools and materials such as stone mortars, resin and cooking pots (Stern 1979:247). Eighth-seventh century BC dye plants have been found at Beth-Shemesh,[62] Tell Beit Mirsim,[63] Tell en-

[60] Petrie (1928:22, Pl. LXI:98m) originally classified the artefact as a lid.
[61] It took approximately 12,000 *murex* to make 1.5 g of crude purple dye (Jensen 1963:109). Koren's experiments (2014) determined that 10,000 snails were required to dye 1 kg of wool.
[62] Vats for dyeing are rather scarce at Beth Shemesh (Grant & Wright 1939:13, 75). Four vats from Stratum IIb (950-eighth century BC) were found, one of which continued in use until the end of Stratum IIc (eighth century-586 BC).
[63] Only a portion of Tell Beit Mirsim, where six or seven dye plants were uncovered, was excavated by Albright (1943a:56). Albright believes that anywhere between 20 and 40 dye plants may have been used at the site. On the other hand, Eitam (1979:150-152) maintains the installations are olive oil presses.

Naṣbeh[64] and Bethel[65], indicating that these sites specialised in the manufacturing of dyed textiles (Albright 1943a:55-56; Grant & Wright 1939:13, 75; Kelso 1968:37; McCown 1947:280-281; Stern 1979:245-246).

### 2.4.2 Ceramics

New pottery shapes made their appearance from the time of the United Monarchy (Mazar 1992:507-508). This pottery is characterised by red slip and a rough regular burnish that was applied by hand. During the Divided Monarchy, the separate kingdoms of Israel and Judah each developed their own traditions. In the northern kingdom, burnished red slip was applied to pottery, while in Judah, pottery forms mostly show continuity between the tenth and the end of the eighth centuries BC (Mazar 1992:508). Also during the eighth and seventh centuries BC, there is a general similarity between the shapes and production technique throughout Judah, during which time the pottery is characterised by a wheel-burnished orange-red slip. A certain distinction can, however, be made between ceramic forms before and after the destruction of Lachish and other sites by Sennacherib in 701 BC. Some eighth century BC types disappear or become rare from the seventh century BC, while some seventh century BC forms do not appear earlier (Aharoni & Aharoni 1976:87).

Potters' workshops have been found in several excavations (Stern 1979:251). At Lachish, a workshop dating to the Late Bronze-Early Iron Ages included pits, depressions, potter's tools, potter's wheels, a small mortar for crushing ochre for painting, shells, smooth pebbles, worn potsherds for burnishing, a mould for figurines, unfired pots and raw material. Wheels made from basalt have also been found at Megiddo and Tell el-'Ajjul (Stern 1979:251). A late tenth-early ninth century BC kiln was found at Tell en-Naṣbeh (Zorn 1998:199, 202).[66]

The late eighth-early seventh century BC *lmlk* jars and those bearing stamps of rosettes and concentric circles suggest specialised pottery production, probably conducted under the auspices of a central authority (Stern 1979:251; see 3.2.1.4[a][iii]-[iv]).

---

[64] Four or five dye vats were found at Tell en-Naṣbeh (McCown 1947:280-281). Remains of vats found in two rooms, dating to the post-exilic period, were reused in the walls.
[65] Only one stone dye vat was found at the site (Kelso 1968:37).
[66] Zorn (1998:199) refers to the site as Tell al-Nasbah. Furthermore, he (1998:202) appears to use the late chronology advocated by Finkelstein since he refers to the late tenth-early ninth centuries BC as Iron II.

### 2.4.3 Metalworking

Copper and iron deposits were found in the Arabah and Sinai regions as well as in Transjordan, but gold, silver and lead were imported during biblical times (Silver 1983:18; Stern 1979:252). In Palestine, copper was extracted from mines such as the one located at Naḥal Timnaʿ in the Wadi Arabah and smelted there into ingots before being transported to inland sites where tools, weapons, household goods and jewellery were made. Crucibles and furnaces for casting copper and iron as well as metal objects have been found at Tell Deir ʻAlla in the Succoth Valley, at Tel Zeror and Tell Qasîle in the Sharon and at Beth-Shemesh, Tell el-Ḥesi and Tell Jemmeh in the Shephelah (Kochavi 1968a:128; 1968b:131; Maisler 1950-51a:68, 75; Wright 1939:459; see Stern 1979:253). At Tell Qasîle, two smelting furnaces that were found in the eleventh century BC stratum continued in use during the tenth century BC (Maisler 1950-51a:68, 75). Two clay crucibles containing smelted copper were found near these furnaces. Four iron furnaces and numerous iron objects (weapons, jewellery and agricultural implements) were found at Tell Jemmeh. The earliest furnace dates to the tenth century BC, the next two to the late tenth-early ninth centuries BC and the latest to the eighth century BC (Wright 1939:460-461).[67] At Beth-Shemesh, late eleventh-early tenth century BC jewellery, ornaments and agricultural implements made from iron and bronze were found as well as iron implements dating to the period from the tenth to the early sixth centuries BC (Wright 1939:461-462). Bronze and iron tools and implements (knife blades, knives, needles, jewellery, hoes, sickles, spear fragments and lance points) dating from the eleventh to the sixth centuries BC were also found at Tell el-Ḥesi (Bliss 1894:105-106, 138). In addition to numerous metal artefacts (tools, agricultural implements and weapons) that were found at Hazor in the tenth century BC stratum, waste products found there point to the industrial production of bronze and iron objects during that period (Gadot 2012:541).

Gold was an important commodity during the Iron Age (Elat 1979a:539-540). Since the decline of Egypt during the twelfth and eleventh centuries BC, Palestine formed commercial ties with Arabia and Nubia (east Africa) to obtain gold. Ezion-geber, located on the Gulf of Aqabah near Elath in Edom (see Figure 2.2), was the point from where Solomon's ships

[67] Petrie (1928:14, Pl. 6:KE) dates the oldest of the furnaces to 1195 BC, the next two to 1100 BC and the last one to 870 BC. Wright (1939:460) maintains that 'Petrie's relative chronology is correct, but his absolute dates cannot be accepted'.

sailed to Ophir[68] to bring back gold (1 Ki 9:26-28). The Bible also refers to a voyage arranged by Jehoshaphat, king of Judah, for the purpose of bringing back gold from Ophir, an undertaking which ultimately ended in failure (1 Ki 22:48). An inscription on an eighth century BC ostracon from Tell Qasîle mentions the delivery of 30 *sheqels* of gold from Ophir, either to or for Beth Horon, thereby indicating that gold was imported to Palestine (Maisler 1950-51c:208-210).[69] Unfortunately, despite the numerous references to vast treasures of gold and silver given as tribute to Assyria and Babylonia, only small pieces of jewellery made from these metals have been found in Palestine (Mazar 1992:510).

### 2.4.4 Agriculture

1 Kings 5:11, 2 Chronicles 2:10, Ezekiel 27:17 and Hosea 12:1 specifically mention the export of wine, oil, wheat, barley and perfume to Phoenicia and Egypt.

#### *2.4.4.1 Perfume*

The site of En-Gedi was settled only from the end of the seventh-beginning of the sixth centuries BC (Stratum V) and during the Persian period (Mazar 1963:101-102; Mazar & Dunayevsky 1964:123; Yadin 1979:224-225). It comprised a number of terraces located along its slopes and was surrounded by a rampart. Stratum V has been attributed to the reign of Josiah and served as a royal estate for the production of perfume and oils as evidenced by the remains of workshops and installations such as ovens as well as pottery remains found under a layer of ash in the courtyards of the houses on the slopes. This stratum was completely destroyed at the time of the Babylonian invasion, after which it remained abandoned until approximately the second half of the fifth century BC when a new settlement was established during the Persian period (Stratum IV) (Mazar 1963:104; Mazar & Dunayevsky 1967:134, 138). Installations such as a silo and an oven may indicate industrial use during this period although this is uncertain (Mazar 1963:104; Mazar & Dunayevsky 1964:125; 1967:136).

---

[68] There are different opinions as to where Ophir is located: in South Arabia (Kennedy 1898:255), an island in the Red Sea (see Lipinski 2004:191), in India (Stavig 1999:86), in Malaya or Sumatara (Tibbetts 1956:186), in East Africa (Van Beek 1962:605-606) or in Southern Africa (Le Roux 2008:7-13).

[69] Based on the spelling, Beth Horon refers to the city located on the border between the northern kingdom and Judah which was fortified by Solomon (2 Chr 8:5), although it could also refer to the temple of the Canaanite god, Horon (Maisler 1950-51c:210).

Arad, located along the main road to Edom and South Arabia, was commercially significant during the monarchic period (Aharoni & Amiran 1964:43-44). This site also yielded evidence of commercial activities; these include weights and the remains of pottery and industrial installations, possibly connected to perfume-making (Aharoni & Amiran 1964:51).

#### *2.4.4.2 Wine production*

There is biblical evidence that wine production fell under the auspices of a central authority. 1 Chronicles 27:27 and 2 Chronicles 26:10 mention officials appointed in charge of wine production by David and Azariah/Uzziah respectively.

Numerous winepresses from the Early Bronze Age to the Byzantine period have been found throughout Palestine (Broshi 2001:147). A late eleventh century BC winepress was found at Mizpah (Zorn 1997b). In a survey conducted in the Jezreel Valley between Megiddo and Jenin, 117 winepresses dating from the Bronze Age to the Byzantine period were found at various sites (Ahlström 1978:19, 46). At ancient Jaffa, round or elliptical pits which have been identified as collecting vats for wine were discovered in Stratum IX (Fantalkin 2005:17). These pits were dug in the natural calcareous sandstone and then lined with a thick chalky plaster mixed with crushed shells. Although the ceramic assemblage uncovered in the pits dates to the ninth century BC, Fantalkin (2005:18) mentions the possibility that the installations could have been constructed earlier, during the tenth century BC. Similar installations were also uncovered at Tell Qasîle and Tel Michal, leading Fantalkin (2005:18-19, 21) to posit that wine production flourished as an industry in the central coastal plain during the tenth-ninth centuries BC. At Beit Ṣafafa in the Rephaim Valley in Jerusalem, a large winepress, in use from the eighth-sixth centuries BC and with a capacity of 20,000 litres, was excavated (Feig 2003:197-201, 224). A similar system was also found in the French Hill neighbourhood in Jerusalem; the winepress at the site was incorporated into a farmhouse structure which comprised a vineyard, winery and cellar and, based on pottery finds, was originally built during the eighth century BC and probably continued in use until the end of the Iron Age (Mazor 2006:153*). Five winepresses were found at Tell en-Naṣbeh: the date of one cannot be determined since artefacts found near the winepress date from the Early Bronze Age to the Persian Period; the second winepress has been dated to the early tenth century BC; the third to the second half of the ninth century BC; the fourth to after the ninth century BC; and the last to the mid-eighth century BC (McCown 1947:2, 257; Walsh & Zorn 1998:156-159). A late seventh century BC winery with winepresses, vats and basins was

discovered at Ashkelon which, together with other contemporaneous winepresses excavated near Ashdod, led Stager (1996) to propose that coastal Philistia was a significant wine production centre during the Iron II period. The existence of a Persian-period wine industry at Mozah may be indicated by a stamp, found in the vicinity of Jerusalem, which ostensibly served as the trademark of a wine merchant (Sukenik, cited by Avigad 1958:119).

A wine production centre has also been excavated at Gibeon (Pritchard 1960:26; 1964b:24). Numerous jars, jar handles and clay stoppers corresponding to the size of the jar mouths were found in a large pool-stairwell that was originally dug during the early Iron Age (Pritchard 1960:24; Wright 1963:210-211). The pool-stairwell is circular in shape, has steps cut around the east side and at the bottom and continues into a tunnel with more steps that follow the circular shape before finally opening into a cave into which water accumulates. In addition, 63 large bell-shaped vats, some plastered and some not, were found in two industrial areas in the north-eastern section of the mound (Pritchard 1964b:1). These vats were large chambers that were excavated in the rock and had a narrow neck across which a stone slab could be slid, thus ensuring a constant cool temperature (Figure 2.16) (Stern 1979:256). In Area 8, located northwest of the pool, four inscribed jar handles, similar to those from the pool, were also found, thereby establishing a link between the wine jars from the pool and this area (Pritchard 1960:27-28). In a second industrial area to the south of the pool (Area 17), more bell-shaped vats were found. The height of the vats made provision for two tiers of jars and were such that a person standing on the floor of the vat could pass a jar up to another person standing above. Some of the vats in this area contained profuse fragments of four-handled storage jars whose use has been dated to the end of Iron Age II (Pritchard 1960:28; 1964b:19).[70] According to Pritchard (1964b:25), the vats, particularly those that were not plastered, could not have been used to store cereals since the porous limestone walls could not have prevented moisture from seeping through; neither could they have contained a liquid such as water, oil or wine. The only other possibility is that jars were filled with wine or oil and then stored in the vats. Unfortunately, tests conducted on scrapings from the jars did not reveal any traces of either wine or oil (Pritchard 1960:27). The probability that wine was stored in the jars can be inferred from a number of reasons: the inscribed jar handles were, most likely, labels for wine; the capacity of the vats (approximately 5,700 litres each) suggests that this was too

[70] Based on epigraphical evidence, Cross (1962a:23) dates the jars to the sixth century BC, while Wright (1963:211, n. 1), based on the debris which filled the pool-stairwell, ascribes them to the second half of the sixth century BC.

large for a quantity of oil that could be produced in a village the size of Gibeon; and the presence of smaller cuttings in the rock surface in Area 8 indicate that they may have served as winepresses (Pritchard 1964b:25). Pottery, which includes the four-handled storage jars, found in 52 of the vats dates mainly to the Iron II period (eighth-sixth centuries BC) (Pritchard 1964b:13, 23). Taking all the information into consideration, Pritchard (1960:28) concludes that a large wine production and export industry was carried out at Gibeon towards the end of Iron II (see 3.2.2.3[a]).

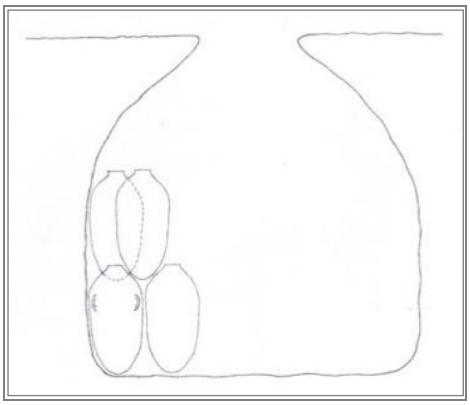


Figure 2.16: Section of wine cellar with jars at Gibeon (Pritchard 1964b, Fig. 53)

*2.4.4.3 Oil*

During biblical times, olive oil was used for cooking and anointing, for cosmetic and medicinal purposes, as a base for perfumes and in lamps (Silver 1983:16-17). The abundant remains of olives found at Lachish possibly attest to a thriving olive oil industry from the ninth-eighth centuries BC. A Hebrew inscription found on an eighth century BC ostracon from Tell Qasîle concerns the shipment of 'thousand and one hundred oil' by Ḥiyahu and is, most likely, an invoice for oil sent by an Israelite official at Tell Qasîle to a seaport in Egypt or Phoenicia (see 4.7.1.4) (Maisler 1950-51c:266). According to Maisler (1950-51c:267), the inscription together with the one concerning the import of gold from Ophir (see 2.4.3) testifies to the importance of the site as an import and export centre during the Iron II period, while the name Ḥiyahu proves that the site was Israelite. More than 100 olive oil factories were found along the outer industrial belt of Ekron in Philistia (Stager 1996). Stager is of the opinion that the importance of Ekron as an oil production centre arose during the last half of the seventh century BC when Assyrian might was waning and Egypt was once again increasing in power and proving to be a lucrative consumer of olive oil. Another 40 open-air rock-cut installations that have been identified as olive presses have been found at various sites in the Samaria hills and have been dated by Eitam (1979:146, 153) to the ninth and eighth centuries BC.

#### *2.4.4.4 Horses*

1 Kings 10:28[71] refers to the importing of horses by Solomon from Egypt[72] and from Kue[73] and Ezekiel 27:14 mentions Phoenician trade in horses with Togarmah in Anatolia. First millennium BC documents and inscriptions attest to a horse breeding centre in Cappadocia, from where they were exported to Mesopotamia and even taken as tribute by Tiglath-pileser III (Levine 1972:18-19; Weidner 1952:157-159). Phoenician royal inscriptions from Karatepe in Cilicia indicate that Phoenicia established trade connections with Cappadocia in central Anatolia via the Cilician coast (Elat 1979a:540-541). The inscriptions were written by 'ZTWD who ruled over the plain of Adana during the last part of the ninth century BC, a period when the Phoenician language was used in the region (Barnett et al 1948:58; Gordon 1948:41; 1949:108). Elat (1979a:541) posits that the use of the Phoenician script for royal inscriptions 'was preceded by several generations of intensive commercial and cultural relations between Cilicia ... and the Phoenicians'.

#### *2.4.4.5 Other commodities*

International trade was also conducted in ivories (Elat 1979a:541). What is referred to as the Samaria ivories were found in the area of the palace built by Omri and his successors at Samaria. These ivories were manufactured on a large scale during the Iron Age (ninth-eighth centuries BC) and reflect Mesopotamian and Egyptian influence (Suter 2011:219). The ivories were either imported as finished products or they were made from imported materials (Crowfoot & Crowfoot 1938:55). Similar ivories have been found at Nimrud and Khorsabad as well as at other sites in Palestine (Suter 2011:220; Winter 1981:118). Egyptian alabaster jugs, one of which bears the name of Pharaoh Osorkon II (874-856 BC), were also found at Samaria (Reisner, Fisher & Lyon 1924:247).

[71] New International Version (1990:386). The King James Version used throughout this study does not mention Kue.
[72] The New International Version (1990:386) mentions an alternative place name to Egypt in a footnote, namely Muzur, a region in Cilicia.
[73] Kue was the Assyrian name for Cilicia (Barnett, Leveen & Moss 1948:58).

## 2.5 OTHER SIGNS OF STATEHOOD

### 2.5.1 Taxation, tithing and tribute

Any centralised administration requires resources to carry out its obligations to its subjects as well as provide for its own needs. The Israelite Monarchy was no different. However, as the prophet Samuel warned, the burden of providing these resources would naturally fall on the inhabitants (1 Sm 8:11-17). Consequently, taxation, tithing and corvée were the order of the day and the king had the right to use any resources, whether belonging to the temple or to the crown, in any way he chose (Röthlin 2009:106-107).

A differentiation between taxation, tithing and tribute is required here. Taxation is a means by which a government imposes certain charges on its citizens to finance its expenditure (Business Dictionary 2015). This usually takes the form of a percentage that is levied on a person's income and is paid over to the government on a regular basis. Prior to the advent of coinage, payments of tax were made with produce or livestock (1 Sm 8:15, 17) or in the form of forced labour (corvée) (1 Sm 8:17; 1 Ki 5:13). Tithes were also compulsory contributions in the form of produce, livestock or the equivalent in precious metals and, in ancient Israel, comprised 10% of the annual production (Lv 27:32; Nm 18:21; Dt 14:22, 28). Taxes, however, were paid to the crown and tithes to the temple (Stevens 2006:6-7). Unfortunately, it is not always easy to differentiate between the two since the crown and the temple were often viewed as one institution (Jose & Moore 1998:64). Voluntary contributions, on the other hand, were referred to as 'gifts' or 'offerings'. According to Stevens (2006:7), tribute was also a voluntary, 'occasional contribution to the political authority, typically offered by a lesser political authority to avert military action'.

During the period when Israel was still a tribal confederacy and no Monarchy existed, taxation took the form of different tithes which were administered by the Levites (MacArthur 2015). During this period, therefore, taxing and tithing were synonymous. As mentioned above, one of these tithes, known as the Levites tithe, comprised 10% of the annual production (Lv 27:30; Neh 10:38). This tithe replaced the initial 20% levied by Joseph in Egypt (Jose & Moore 1998:65). Ten percent of the Levites tithe was to be given by the Levites as their own tithe offering (Nm 18:26-30) and the rest was to be used by them as payment for their services (Nm 18:31). In Deuteronomy 12:10-18, a second tithe, the festival tithe, is mentioned. Once they took possession of Canaan, this tithe was to be taken by the

Israelites to Jerusalem to be eaten there together with their families, servants and the priests at the sanctuary. If they lived too far from Jerusalem, they were allowed to eat the tithe in their own towns (Dt 12:21). Yet a third tithe, known as the poor tithe, is found in Deuteronomy 14:28-29, according to which the Israelites were required to store another 10% at the end of every three years and which was to be used to feed the 'Levite, and the stranger, and the fatherless, and the widow'.[74]

When the Israelites demanded a king (1 Sm 8:6), Samuel informed them of the fate that awaited them if they insisted on having a king (1 Sm 8:11-17):

> [11]And he said, This will be the manner of the king that shall reign over you: He will take your sons, and appoint them for himself, for his chariots, and to be his horsemen; and some shall run before his chariots. [12]And he will appoint him captains over thousands, and captains over fifties; and will set them to ear his ground, and to reap his harvest, and to make his instruments of war, and instruments of his chariots. [13]And he will take your daughters to be confectionaries, and to be cooks, and to be bakers. [14]And he will take your fields, and your vineyards, and your oliveyards, even the best of them, and give them to his servants. [15]And he will take the tenth of your seed, and of your vineyards, and give to his officers, and to his servants. [16]And he will take your menservants, and your maidservants, and your goodliest young men, and your asses, and put them to his work. [17]He will take the tenth of your sheep: and ye shall be his servants.

This seemed to be realised particularly during the reign of Solomon, who taxed the northern kingdom of Israel heavily for the monthly support of the royal palace (1 Ki 4:7) and also conscripted labour for his numerous buildings projects (see 2.2.3.3). It is uncertain, however, whether this tax was in addition to the 10% tax mentioned in 1 Samuel 8:11-17 and whether the tax in 1 Samuel 8 was over and above the traditional tithes mentioned in Leviticus and Deuteronomy (Powis Smith 1914:120). Nonetheless, those who did not pay were punished with whips (1 Ki 12:14; 2 Chr 10:14). Solomon's son, Rehoboam, was even harsher, increasing tax and doling out severe punishment in the form of scorpions, a 'type of whip with sharp prickles that ripped the flesh' (Adams 2001:29). This was one of the main reasons for the split of the kingdom (see 2.3.1). Rehoboam attempted to exact the taxes from the northern kingdom, but his chief tax collector was stoned to death (1 Ki 12:18; 2 Chr 10:18).

With the advent of the Assyrians, the northern kingdom was forced to pay tribute; the Black Obelisk shows the king of Israel, either Joram or Jehu (see n. 35), bowing before the Assyrian king, Shalmaneser III, and paying him tribute of silver, gold, bowls and cups made of gold, maces, royal utensils and rods of wood (Smith 1875:114). Tiglath-pileser III also exacted

[74] For the practical problems in the application of these tithes, see Powis Smith (1914).

tribute in the form of 1,000 talents of silver from Menahem, king of Israel (2 Ki 15:19). The tribute paid by Menahem is also substantiated by one of the Assyrian king's annalistic records (see 3.2.1.1). In order to avert military action, Menahem obtained the silver in the form of an additional tax levied on wealthy citizens to the amount of 50 *sheqels* each (2 Ki 15:20). The northern kingdom subsequently rebelled during the reign of Pekah, following which Tiglath-pileser III took most of the northern kingdom captive and made Hoshea king. It was at this time, circa 734 BC, that Ahaz, king of Judah, requested Tiglath-pileser's assistance and was obliged to pay gold and silver for it, which he took from the temple and from his own treasures (2 Ki 16:7-9; see 3.2.1.1). Hoshea also rebelled against the tribute he had to pay and this led to the end of the northern kingdom of Israel. Its stand against unjust taxation did not, unfortunately, prevail (Adams 2001:31).

Although Judah, at first, submitted to the Assyrian yoke and paid its tribute, it also eventually rebelled (Adams 2001:31). The initial tribute Hezekiah had to pay to Sennacherib in 701 BC amounted to 30 talents of gold, 800 talents of silver, gems, jewels, couches and chairs of ivory, elephant hides, maple, boxwood and other kinds of valuable treasures (Luckenbill 1968b:121). 2 Kings 18:14-16 records the tribute as follows:

> [14]And Hezekiah king of Judah sent to the king of Assyria to Lachish, saying, I have offended; return from me: that which thou puttest on me will I bear. And the king of Assyria appointed unto Hezekiah king of Judah three hundred talents of silver and thirty talents of gold. [15]And Hezekiah gave him all the silver that was found in the house of the LORD, and in the treasures of the king's house. [16]At that time did Hezekiah cut off the gold from the doors of the temple of the LORD, and from the pillars which Hezekiah king of Judah had overlaid, and gave it to the king of Assyria.

The difference between the Assyrian and the biblical records regarding the amount of silver may be due to an understatement on the part of the biblical author and an exaggeration on the part of the Assyrian scribe (Röthlin 2009:79). On the other hand, Schoors (1998:85) asserts the biblical record mentions only the amount taken from the temple, while Mayer (2003:182) maintains it refers to the amount taken from the royal treasuries (see Röthlin 2009:79). Although Sennacherib also imposed an annual tax on Judah (Luckenbill 1968b:143), his annals do not record the amount of the tax.

A special assessments tax was levied by Josiah for the repair of the temple (Jose & Moore 1998:75; 2 Chr 24:5). During his religious reforms, Hezekiah ordered the collection of the tithes for the priests and the Levites (2 Chr 31:4-6). Whether this was a reinstatement of the traditional Levitical and Deuteronomic tithes is, however, uncertain. Nevertheless, the centralisation of the cult in Jerusalem may have been carried out with one main objective in

mind, namely to garner support and funds for a revolt against Assyria with the ultimate aim of restoring the Davidic Monarchy (Borowski 1995:153; Miller & Hayes 1986:357). By demanding that all tithes and offerings were brought to Jerusalem, Hezekiah ensured that the economy, including that of the temple, was now under the direct control of the royal administration. Furthermore, the invitation extended to the northern kingdom to participate in the festivals and the distribution of supplies to the priests helped to ensure their support for the rebellion (Borowski 1995:153; Miller & Hayes 1986:357).

When Pharaoh Necho appointed Jehoiakim as king of Judah, he also exacted tribute of 100 talents of silver and one talent of gold (Malamat 1979a:207; see 2.3.1). In order to pay the tribute, Jehoiakim 'taxed the land' without touching the palace and temple treasures (2 Ki 23:35). Jose & Moore (1998:66) emphasise that this tax differed from the normal income tax. Normal income tax was levied on the yield from property whereas this form of tax comprised a property tax which was based on the value of property. When the Babylonians subsequently conquered Egypt, Jehoiakim had to pay tribute to Nebuchanezzar (Adams 2001:32). However, when the opportunity arose, he rebelled and was later replaced by Zedekiah, who initially paid homage and tribute to the Babylonian king. He also, however, later tried to shake off the Babylonian yoke without success and Jerusalem was annihilated (Adams 2001:32).

Although the biblical narratives portray Cyrus, king of Persia, as a compassionate ruler, according to Adams (2001:32), he was an 'astute tax man' who realised the opportunity for adding another source of income to his royal coffers by allowing the Jews to return to their homeland. In this way, he could ensure the receipt of tribute and taxes from a newly-established nation where none existed. According to Ezra 4:13, three types of taxes were paid to the Assyrian empire: a tribute tax (*middâa* or *mindâ*) paid in silver or in kind to the king; a poll tax (*bĕlô*) based on a person's capacity to work; and a land tax (*hălāk*) based on property ownership (Stevens 2006:111). Nehemiah (Neh 10:32) also instituted a poll tax of $^{1}/_{3}$ *sheqel* to maintain temple worship (Jose & Moore 1998:76).

### 2.5.2 Corvée and military service

Two words, *mas* or *mas ôbéd* and *nôśē' sabbāl*, were used to differentiate between corvée and levy respectively in the biblical narratives (1 Ki 11:28) (Rainey 1970:191). During David's regime, Adoniram was in charge of corvée (see 2.2.3.2). As stated in 2 Chronicles 2:17, David

took a census of all the foreigners in Israel, most likely for the purposes of corvée, military service and taxation (King & Stager 2001:240; Mendelsohn 1962:33; Rainey 1970:199). According to Rainey, it is possible that David also used conscripted labour for the building of his palace (see 1 Chr 14:1). Under Solomon, this same Adoniram still appears to be in charge of corvée, which was also used by Solomon for his building projects (1 Ki 4:6; 5:13-14; 9:15, 20-22). According to 1 Kings 5:13-14, the *mas*-labourers (corvée), who worked in the mountains of Lebanon to provide lumber, most likely fell under the supervision of Adoniram, while the *nôśē' sabbāl* labourers ('burden bearers') and the *ḥôṣēb* ('quarriers') were, possibly, the levy that was placed under Jeroboam (1 Ki 5:15; 11:28), the same person who later rebelled against Solomon. Rainey (1970:202) suggests that, even though both types of labour were compulsory, the *nôśē' sabbāl* labourers probably enjoyed a better status that those under the corvée, which was viewed as an unwanted and even hated obligation. This appears to be substantiated by Mendelsohn (1962:35), who suggests that it was only the lower classes who were subjected to corvée, but that, under special circumstances, all classes could be subjected to forced labour. Rainey (1970:202), furthermore, posits that the action on the part of Rehoboam in sending Adoniram to force the rebel forces to acquiesce may have given the impression that he intended to 'reduce the entire population to the corvée status', leading to the unsurprising stoning of Adoniram.

Other direct references to conscripted labour can be found in 1 Kings 15:22 when Asa rebuilt Geba in Benjamin, in Nehemiah 2:17-3:32 when Nehemiah requested assistance in rebuilding the walls of Jerusalem and in Jeremiah 22:12-13 when Shallum, son of Josiah, built his palace (see Mendelsohn 1962:33). Mendelsohn (1962:33), furthermore, explains that Judaean and Israelite kings used corvée labour not only for building activities, but for other purposes as well (1 Chr 27:25-31; 2 Chr 26:10; 32:27-29).

Saul formed the first organised army of the Israelite Monarchy, comprised mainly of militia – non-professional fighters who were called upon when necessary (King & Stager 2001:240; 1 Sm 15:4). During David's reign, however, a standing army was established, comprised of the militia as well as Israelite and foreign mercenaries (see 2 Sm 16:18). David also engaged a standing bodyguard of 600 men (1 Sm 23:13). Armies were also maintained by almost all the subsequent kings of Israel and Judah as attested throughout the Books of Kings and Chronicles. Archaeological discoveries also confirm the existence of military forces maintained by the Judaean kings. Some of the Arad Ostraca from the late seventh-early sixth centuries BC were addressed to Eliashib, the army commander at Arad (see 4.7.2.1[f]), and

the Lachish Letters, written during the early sixth century BC, comprise correspondence between Ya'ush, the commander at Lachish, and a military officer stationed at a garrison a short distance away (see 4.7.2.1[i]).

### 2.5.3 The Temple

Temples were places of worship as well as places where economic and social interaction took place (Chiera 1938:80). Since the establishment of the Monarchy and the development of urbanisation, the responsibilities of the priests became more specialised, requiring organised methods of receiving and distributing the offerings for the various purposes they were intended for (Stevens 2006:12). The discussion below covers not only the temple constructed by Solomon in Jerusalem, but also the other temples prior to that, which were established by the various monarchic kings.

#### *2.5.3.1 Temple personnel*

The temple personnel comprised various categories, namely priests, gatekeepers (gate accountants), scribes (storehouse accountants), craftsmen and administrators (Stevens 2006:65). The responsibilities of the priests entailed receiving, preparing and presenting offerings, mixing spices for incense, keeping the lamps filled and identifying and removing ritual uncleanness. The duties of the gatekeepers included guarding the entrances to the temple to preserve the sanctity of the temple by keeping unclean individuals out, preventing damage or theft of the items in the temple and keeping those inside safe, as in the case of the young Josiah (Stevens 2006:72; 2 Chr 23:3-7). Other duties included collecting the offerings from the people and depositing them in a chest standing beside the altar (2 Ki 12:9). Stevens (2006:74-75) also believes that, as in Mesopotamia, the Israelite gatekeepers were, possibly, also responsible for assessing the value of the offerings brought by individuals and crediting these to their accounts, thereby fulfilling a role as gate accountants as well. The duties of the scribes also comprised counting, tallying, verifying and recording, but whereas the gatekeepers were responsible for receipts at the temple gates, the scribes were responsible for the receipts at the temple storehouses. Craftsmen comprising balers, millers, oil-pressers, vintners, perfumers, weavers, dyers, carvers and smiths were required for the preparation of sacrificial offerings and for the manufacture and repair of cultic utensils (Stevens 2006:78-79). Dual administrative duties can, perhaps, be observed in the scribes and the high priests who were instructed by the king to count the money deposited in the chest beside the altar

(2 Ki 12:4-16; 22:3-4). According to Stevens (2006:79), this implies that they were not only in the employ of the temple, but also agents for the king (see 1 Ki 12:10; 2 Ki 22:3-4).

#### *2.5.3.2 Temple income*

Naturally, the appointment of temple personnel necessitated a source of income so that the personnel could be paid and the expenses of running and maintaining the temple could be covered. The main sources of income for the Israelite temples were tithes, taxes, gifts and trade (Stevens 2006:93, 98, 113, 118). As discussed above (see 2.5.1), the concepts of tithes and taxes are difficult to segregate. In addition to the various tithes and taxes discussed previously, the Israelites were also required to pay a *sheqel* tax for the temple: half a *sheqel* during the time of Moses (Ex 30:13) and $^{1}/_{3}$ *sheqel* per year for the temple in Jerusalem (Neh 10:32-33). In addition, although not strictly tax, each family took turns supplying wood for the altar (Neh 10:34). Furthermore, after the centralisation of the cult in Jerusalem by Hezekiah (see 2.5.1), the duties of the temple, most probably, included collecting taxes on behalf of the state (Stevens 2006:113). This duty, possibly, also fell to the administrators of the Second Temple during the Persian period.

Gifts from the crown to the temple were usually intended for the building or rebuilding of the temple and the various kings, Israelite and foreign, were generous in their contributions (Stevens 2006:113; see 1 Ki 15:5; 2 Chr 15:18; 29:3; 30:24; 31:3; Ezr 6:8; 7:15; Neh 7:70). Voluntary offerings from the people were also, according to their means, generous (1 Chr 29:7-8; 2 Chr 32:23).

Possible indications that the Jerusalem Temple was involved in trade may be seen in the biblical verses concerned with the rebuilding of the walls around Jerusalem (Stevens 2006:120). Nehemiah 3:31 refers to the 'house of the temple servants and the traders'. However, this is too inconsequential to establish with certainty.

#### *2.5.3.3 Temple expenditure*

The major cost for the temple was, naturally, the wages for its personnel (Stevens 2006:121). Other disbursements may have included the taxes that were collected on behalf of the state. Temple personnel were also not always exempt from paying taxes (Stevens 2006:112). Ezra 7:24 mentions only the three specific taxes payable under the Persian regime (see 2.5.1) from

which the temple personnel were exempted, which led Stevens (2006:124) to assume that this was not a general exemption for temple personnel. Based on this verse, Jose & Moore (1998:76), on the other hand, maintain that temple personnel were fully exempt. The temple was also responsible for reallocating the provisions for the royal household brought to the temple by the people (Stevens 2006:125). In addition, since the king had the authority to appropriate whatever resources he needed, including those of the temple (see 2.5.1), this occasionally came about. Both Asa and Hezekiah took the temple treasures to appease their enemies (1 Ki 15:18-19; 2 Ki 18:14-16). Foreign powers also plundered the temple treasures as in the case of Shishak (1 Ki 14:26), Jehoash of Israel (2 Ki 14:1) and Nebuchadnezzar (2 Ki 25:13-17) (Stevens 2006:129). Lastly, temple funds were to be used for those in need (Dt 14:28) (Stevens 2006:131).

## 2.6 CONCLUSION

When considering two of Finkelstein's (1999:39) requirements for statehood, namely monumental architecture and organised production (the emergence of writing will be discussed in Chapter Four), the evidence from the beginning of the tenth century BC until the post-exilic period demonstrates that, from the beginning of Iron II, the region of Palestine conformed to these requirements. Numerous sites throughout Palestine during the period under review yield evidence of construction activities undertaken by a central authority. Furthermore, the evidence for organised production and control of commercial and trading activities reflects the connection with a state administration and this is confirmed by the written references to state officials on seals and ostraca which, in turn, point to the emergence of writing as a prerequisite for the political and economic growth of a state. In addition, the levying of taxes, the use of corvée, the establishment of a military force and the role of the temple in the monarchic structure all point to further elements of statehood. These elements, in turn, led to the necessity for keeping account of economic transactions, mainly for the purpose of control as has been suggested by Glautier (1983:57) and as will be demonstrated in Chapter Five (see 5.2.2).

# CHAPTER THREE

# THE HISTORICAL BACKGROUND AND SOCIO-ECONOMIC ENVIRONMENT IN PALESTINE DURING THE ASSYRIAN, BABYLONIAN AND PERSIAN PERIODS (734-332 BC)

## 3.1 INTRODUCTION

In Palestine, the hegemony of the Assyrians (734-627 BC), followed by that of the Babylonians (626-539 BC) and Persians (539-332 BC), resulted in significant changes in the administration of the region. Each of the three empires left their unique imprint on the socio-economic background of Palestine as seen in the archaeological record. According to Aharoni (1968a:3), the history of a nation is determined by its geographical as well as its geopolitical setting. Palestine is bordered by the Mediterranean Sea to the west, the desert to the south and mountain ranges to the north and east. Its neighbours during ancient times were the two mighty empires of Egypt and Mesopotamia, both of whom regarded Palestine as a thoroughfare. Consequently, Palestine provided an attractive 'land bridge between the great world powers surrounding it', who desired to conquer the region in order to obtain control of the trade routes passing through it (Aharoni 1968a:6).

## 3.2 THE CONQUEST OF PALESTINE DURING THE ASSYRIAN, BABYLONIAN AND PERSIAN PERIODS

The map in Figure 3.1 shows the extent of three of the great Mesopotamian empires that conquered the region of Palestine during the first millennium BC. During the Assyrian period, the region was shared between eight cultures: Aramaeans, Phoenicians, Israelites, Judahites, Philistines, Ammonites, Moabites and Edomites (Stern 2001:xvi). As a result of the Babylonian conquest, the region was plundered of everything that was able to be transported to Babylon and mainly only two areas, Benjamin and Ammon, remained. The Persians, on the other hand, allowed the region to be resettled; during this period, two regional cultures existed, that of the coastal area and that of the interior (Stern 2001:xvi).

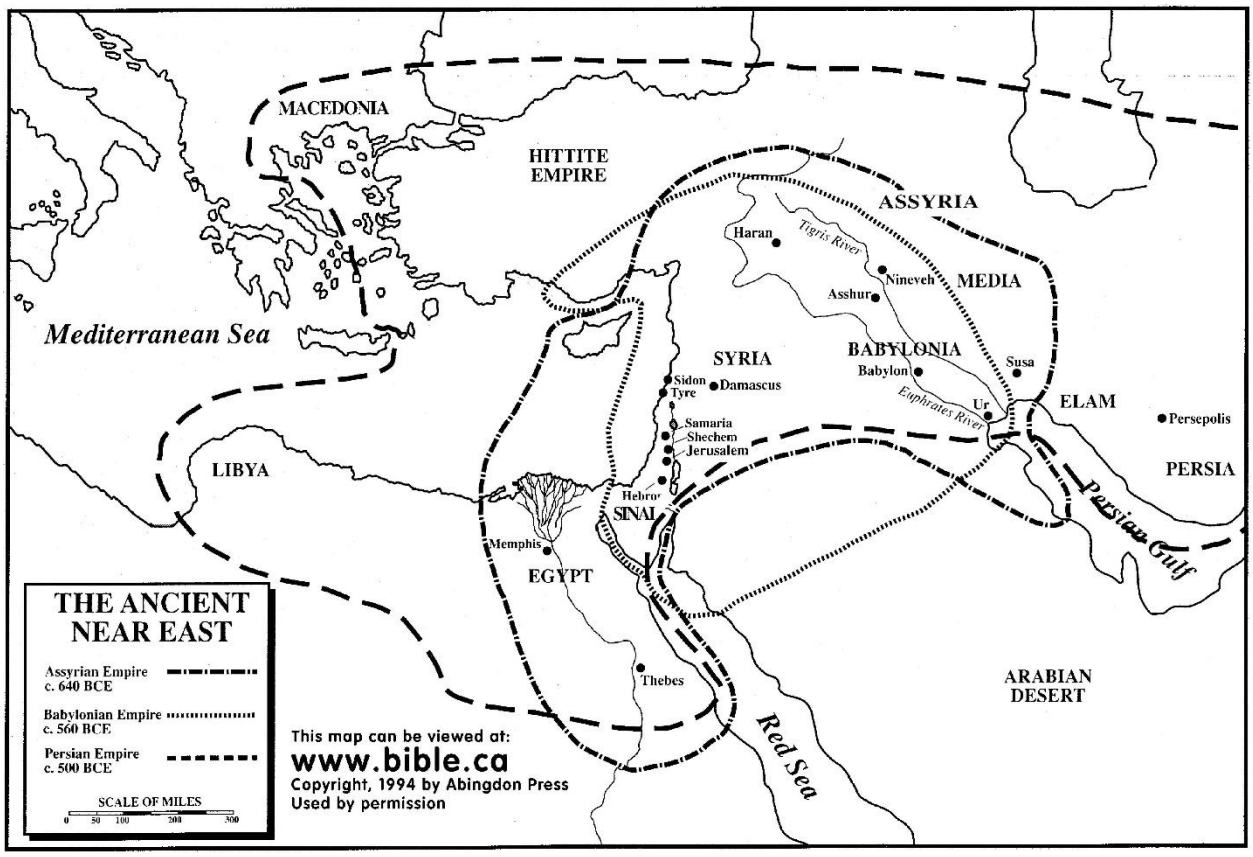



Figure 3.1: Successive world kingdoms: Persia, Babylon, Assyria 640-500 BC
(Interactive Bible c2011:http://www.bible.ca/maps/maps-near-east-500BC.jpg)

### 3.2.1 The Assyrian period (734-627 BC)

#### *3.2.1.1 Historical background of the Assyrian conquest of Palestine*

After the reign of Ashurnirari V came to an end in 745 BC, Tiglath-pileser III (744-727 BC) introduced a new period of Assyrian conquest and is, according to Goodspeed (1897:407), the first Assyrian king to earn the title of king of Babylon. He reigned in Babylon under the name of Pulu, a name that appears in 2 Kings 15:19. Assyria wanted to extend their empire to the west where valuable timber and mineral resources were to be found (Bright 2000:270). In addition, Palestine provided a gateway to Egypt, Asia Minor and the countries of the Mediterranean (Blakely & Hardin 2002:41; Bright 2000:270; Miller & Hayes 1986:319).

The commencement of the Assyrian conquest of Palestine during 734-732 BC by Tiglath-pileser III is recorded in a number of sources (Dubovský 2006:154). These include the biblical narratives as well as Assyrian annals and inscriptions. Tiglath-pileser's campaigns have been divided by Dubovský (2006:158) into three chronological phases: the coast (Philistia); Transjordan; and the central region (Damascus, the northern kingdom of Israel and Galilee).

The campaign against Philistia is mentioned only in Assyrian inscriptions, which recount the capture of Tyre and Gaza by Tiglath-pileser III. The second phase, which was directed against Damascus and Transjordan, is recorded in Assyrian annals and inscriptions (Dubovský 2006:160). These sources indicate that Tiglath-pileser III first fought against Damascus but could not capture it, although he destroyed the surrounding areas and proceeded to capture several cities in southern Syria/northern Transjordan. Gilead was also captured during this phase. The third phase can be reconstructed from the Assyrian annals and the biblical narratives (Dubovský 2006:161): Tiglath-pileser III first captured Galilee, followed by Gezer, then Ashkelon and finally Damascus (Annals 18 & 24: Tadmor & Yamada 2011:60-63; 2 Ki 15:29).

According to the biblical account, the sins of Menahem, king of Israel, led to the invasion of the northern kingdom by Tiglath-pileser III, who then forced Menahem to pay tribute to him (Luckenbill 1968a:276; Oppenheim 1969:283; Tadmor & Yamada 2011:46, 70, 77, 87; 2 Ki 15:19-20). Two of Tiglath-pileser III's annalistic records refer to tribute received in the form of gold, silver, lead, iron, elephant hides, ivory, woollen and linen garments, horses, mules, cattle, sheep and camels from Rezin of Damascus, Menahem of Samaria, Hiram of Tyre and many others (Tadmor & Yamada 2011:70, 77-78). These fragments have been dated to 738 BC by Tadmor (1961:256-258) and Tadmor and Yamada (2011:69, 76) based on the reference to exiles being sent to Ulluba which was conquered in 739 BC.[75] Rezin, king of Aram (Damascus) formed an anti-Assyrian coalition with Pekah, then king of Israel and successor to Pekahiah, son of Menahem (2 Ki 16:5-6). Together they marched against Ahaz, king of Judah, who had no interest in a coalition against the Assyrians. In 2 Kings 16:7-9, we read that Ahaz, king of Judah, requested the assistance of Tiglath-pileser III in his battles against Damascus and Israel:

> Ahaz sent messengers to say to Tiglath-pileser king of Assyria, 'I am your servant and vassal. Come up and save me out of the hand of the king of Aram and of the king of Israel, who are attacking me'. And Ahaz took silver and gold ... and sent it as a gift to the king of Assyria. The king of Assyria complied by attacking Damascus and capturing it.

A building inscription mentions Tiglath-pileser III receiving tributes of gold, silver, tin, iron, linen garments and 'all kinds of costly objects' from Sanipu of Bit-Ammon, Salamanu of

[75] This date has been questioned by Thiele (1965:98-115), who suggests 743 BC as the year for Menahem's tribute.

Moab, Mitinti of Ashkelon, Jehoahaz of Judah,[76] Kaush-malaku of Edom and Hanno of Gaza (Oppenheim 1969:282; Tadmor & Yamada 2011:122-123). Rezin and Pekah were both killed during the Assyrian attack and Pekah was replaced by Hoshea, who was initially pro-Assyrian (Luckenbill 1968a:293; Oppenheim 1969:284; Perego 1999:48; Tadmor & Yamada 2011:106, 132). Consequently, Damascus became as Assyrian province, while Israel and Judah were made vassal states (Bright 2000:276; Goodspeed 1897:408). The following two passages from the inscriptions of Tiglath-pileser III recount the third phase of his campaign (RINAP Project 2011):

> [The land Bīt-Ḫumria] (Israel), all [of whose] cities I [utterly devastated i]n former campaigns of mine, whose [...] (and) livestock I carried off, and (whose capital) Samaria I isola[ted] — (now) [they overthrew Peqa]h, their king (Tiglath-pileser III 44, 17').

> (As for) the land Bīt-Ḫumria (Israel), I brought [to] Assyria [..., its "au]xiliary [army" ...] (and) all of its people, [...]. [I/they] killed Peqah, their king, and I placed Hoshea [as king o]ver them. I received from them ten talents of gold, ... talents of silver, [together with] their [proper]ty, and [I brou]ght them [to Assyria] (Tiglath-pileser III 42, 15'b-17'b).

Tiglath-pileser III thus succeeded in bringing a vast region under his control, thereby assuring that the routes between Assyria and the Mediterranean were controlled and maintained on behalf of Assyrian interests.

Shalmaneser V (726-722 BC), successor to Tiglath-pileser, attacked Hoshea at Samaria, the capital of Israel, after he heard that Hoshea had rebelled by allying himself with Egypt and by refusing to continue paying tribute (Perego 1999:50). 2 Kings 17:3-6 recounts the conquest of the northern Israelite kingdom by Shalmaneser:

> Shalmaneser king of Assyria came up to attack Hoshea, who had been Shalmaneser's vassal and had paid him tribute. But the king of Assyria discovered that Hoshea was a traitor, for he had sent envoys to So king of Egypt, and he no longer paid tribute to the king of Assyria, ... Therefore Shalmaneser seized him and put him in prison. The king of Assyria invaded the entire land, marched against Samaria and laid siege to it for three years. In the ninth year of Hoshea, the king of Assyria captured Samaria and deported the Israelites to Assyria.

The wording of the above verses suggests that Hoshea was taken captive towards the beginning of the siege (Ephʿal 1979a:187; Tadmor 1958:37). A passage in the Babylonian Chronicle (col. I, 27-28) is the only extant record of any military campaigns undertaken by

[76] Yeivin (1979a:175) explains that Jehoahaz was Ahaz's official name; his name was changed to Ahaz by later biblical editors who were reluctant to allow an immoral king to bear a name that contained an association with the name of the God of Israel.

Shalmaneser V (Ephʿal 1979a:187). This inscription reads as follows: 'On the 25th of Tebet Shalmaneser ascended the throne in Assyria. He destroyed Samaria' (Tadmor 1958:39).[77]

Shalmaneser was succeeded by Sargon II (721-705 BC), who first had to contend with domestic crises before he could turn his attention to a new uprising involving Samaria, Hamath, Arvad, Gaza, Damascus and Arpad (Ephʿal 1979a:187; Tadmor 1958:37). Sargon reported in his annals that he deported 27,290 inhabitants from Samaria and replaced them with 'people out of all lands, prisoners of mine', thereby reorganising the vassal state of Israel as an Assyrian province (Cogan 1974:100; Goodspeed 1897:408; Luckenbill 1968b:26; Oppenheim 1969:284-285). This agrees with 2 Kings 17:24 where we read that he 'brought people from Babylon, Cuthah, Avva, Hamath and Sepharvaim and settled them in the towns of Samaria to replace the Israelites'.

From an Assyrian perspective, the invasion of the Israelite kingdom was part of a deliberate military offensive aimed at achieving the previously mentioned goal of obtaining political and economic supremacy over the international trade routes that ran across the Syrian Desert to the harbours of the Mediterranean (Radner 2012). The deportation of the inhabitants of the conquered areas to Assyria and the settlement of new inhabitants from Assyria to replace the deportees also formed part of Assyrian policy. According to Na'aman (2005:233), the reasons for the deportations were to populate Assyrian settlements and to weaken the infrastructure of the conquered region. Concerning the Assyrian approach towards deportees from conquered regions, Sargon's Cylinder Inscription (lines 72-74) reads as follows:

> People of the four regions of the world, of foreign and divergent speech, dwellers of mountain and lowland ... all that I carried off at Aššur, my lord's, command by the might of my scepter – I unified them [made them of one mouth], and settled them therein [in Dūr Šarrukīn, i.e. modern Khorsabad, the new capital built by Sargon]. I commissioned natives of Assyria, masters of practical knowledge, as overseers and officials to teach them correct behaviour [and] to serve the gods and the king (Ephʿal 1979b:283-284; Luckenbill 1968b:65-66).

In 720 BC, Sargon succeeded in defeating a coalition of states, which included Philistia, and in 712 BC, he repressed another revolt instigated by the city of Ashdod (Cogan 1974:66; Goodspeed 1897:408-409). Texts taken from stone slabs and wall inscriptions in Khorsabad refer to Azuri, king of Ashdod, who was consequently removed from his post and replaced by Ahimiti, his younger brother (Luckenbill 1968b:31; Oppenheim 1969:284, 286). According to

[77] For a discussion of the interpretation of *Šamara'in/Šabara'in* as Samaria, see Tadmor (1958:39-40).

Goodspeed (1897:408-409), Sargon is reputed to have been the greatest of all the Assyrian rulers since Assyria experienced its most prosperous period under his sovereignty. He firmly established the policies of deportation and Assyrian administration and was responsible for some magnificent examples of Assyrian architecture and art.

On the accession of Sennacherib (704-681 BC), the son of Sargon, to the Assyrian throne, Hezekiah, king of Judah, was approached by the king of Babylon who wanted to organise a coalition against the Assyrians (Goodspeed 1897:410; see 2 Ki 20:12). When Sennacherib heard this, he immediately attacked the Babylonians and defeated them, following this up with campaigns against Phoenicia, Philistia and eventually Judah, all of whom were subdued and their inhabitants deported. According to Sennacherib's annals, he conquered Lachish and 46 other towns in Judah, which included Tel Batash/Timnah, Tell Beit Mirsim, Tel Halif, Tel Sheva and Arad where destruction layers from the Assyrian period have been uncovered (Luckenbill 1968b:120; Oppenheim 1969:288; Stern 2001:10; 2 Ki 18:13). These settlements were then annexed to Philistia and Hezekiah was left with a significantly smaller region under his control (Cogan 1974:66-67; Oppenheim 1969:288). Lines 49-50 on the Rassam Cylinder[78] recount Sennacherib's campaign as follows:

> [As for] Hezekiah, the Judaean [who had not submitted to my yoke],[79] I surrounded and conquered 46 of his strongly fortified walled cities and countless small towns in their vicinity by stamping down siege ramps, bringing up battering rams... (Gallagher 1999:129).

Jerusalem itself, however, survived the onslaught, but had to pay tribute to Sennacherib (Goodspeed 1897:410; Luckenbill 1968b:120-121, 154; Oppenheim 1969:288). 2 Kings 19:35 reports that 'that night the angel of the Lord went out and put to death a hundred and eighty-five thousand men in the Assyrian camp'. Apart from the biblical narrative, there is no specific mention in the Assyrian annals of the reason for Sennacherib's withdrawal (Goodspeed 1897:410).

Sennacherib was succeeded by his son, Esarhaddon (680-669 BC), who rebuilt Babylon and made it the centre of his empire (Goodspeed 1897:410). He became involved in repressing rebellions initiated by the western regions, mainly Sidon. Later, at the instigation of Egypt,

---

[78] The Rassam Cylinder, dated to 700 BC, recounts Sennacherib's first three campaigns in Palestine while the Taylor (691 BC) and Chicago (689 BC) Prisms provide a more detailed account of the third campaign (against Judah) in 701 BC (Cogan 2000:302; see Röthlin 2009:33).

[79] The phrases in brackets only appear in Cylinder C (697 BC), another source of information for Sennacherib's third campaign, and later inscriptions (Gallagher 1999:9-10, 129).

Tyre also rebelled and Esarhaddon responded by subduing Tyre and advancing against the Egyptians and driving their ruler to Ethiopia (Goodspeed 1897:412; Luckenbill 1968b:219-220; Oppenheim 1969:290).

Esarhaddon's son, Ashurbanipal (668-627 BC), instituted campaigns against the Egyptians who had attempted to return to Egypt after the death of Esarhaddon (Goodspeed 1897:412; Luckenbill 1968b:292-293; Oppenheim 1969:294). He moved the centre of his empire back to Nineveh, leaving his brother, Shamash-shumukin, as king in Babylon, who, together with the Chaldeans and the western regions, later rebelled against Ashurbanipal (Luckenbill 1968b:300-301; Oppenheim 1969:298). Ashurbanipal, however, succeeded in suppressing the revolt. 2 Chronicles 33:11 recounts the plight of Manasseh, king of Judah, who had possibly taken part in this revolt: '...the army commanders of the king of Assyria, who took Manasseh prisoner, put a hook in his nose, bound him with bronze shackles and took him to Babylon' (Goodspeed 1897:413). This incident, however, does not appear in the Assyrian annals, which only mention Manasseh as a loyal vassal (Cogan 1974:67-68).

During the reigns of Esarhaddon (680-669 BC) and Ashurbanipal (668-627 BC), the nomadic tribes were also subdued in order to obtain control over the spice and incense trade (Stern 2001:12). With the aim of strengthening their position, the Assyrians then directed their attention on erecting settlements and fortresses along the Via Maris (Stern 2001:3). The death of Ashurbanipal in 627 BC led to conflict within the royal family, which, in turn, eventually resulted in the end of the Assyrian Empire after approximately 80-90 years in Palestine (Stern 2001:4).

#### *3.2.1.2 Assyrian impositions on conquered territories*

During Assyrian hegemony in Palestine, the region was divided into four administrative units: the Assyrian provinces that were under direct Assyrian rule; the independent vassal territories; the Phoenician and Philistine harbour towns; and the nomadic tribes who lived in the surrounding deserts (Stern 2001:10-11).

(a) Provinces

According to Forrer (cited by Stern 2001:11), six Assyrian provinces were established in Palestine over the period of Assyrian hegemony, three in northern Transjordan (Gilead,

Hauran[80] and Karnaim) and three in western Palestine (Megiddo, Dor and Samaria).[81] This form of administration involved deposing an existing local ruler who was then replaced by an Assyrian governor with the title of *peḥa* who had the support of a small army division to assist him (Bedford 2001:7; Stern 2001:10-11). The provinces were further divided into districts, each governed by an official (*rab alani*), and the cities within each district were each ruled by a city governor (*ḥazannu*). The inhabitants of conquered regions were then deported and replaced with Assyrian captives from other conquered lands. The new inhabitants sent to Palestine to replace the deportees formed part of the various Assyrian administrative features, such as the political, military and cultural arms of the Assyrian government. These new inhabitants, as attested by Sargon's annals, were regarded 'as if they were Assyrian' and were 'trained in proper conduct' and taught to 'revere god and king' (Cogan 1974:50-51; see 3.2.1.1: lines 72-74 on Sargon's Cylinder Inscription). Sargon achieved this by imposing 'the yoke of Ashur, my lord, upon them.... I imposed feudal duties and corvée upon them'. The areas that fell under direct Assyrian rule were thus required to pay various kinds of taxes as well as supply soldiers and civil workers (Bedford 2001:7, 10; Cogan 1974:50-51).

(b) Vassal states

These states were also conquered regions, but were usually ruled by a pro-Assyrian local ruler, albeit with an Assyrian governor and army in the region to maintain control (Cogan 1974:55-56). In order to ensure obedience, these rulers were required to make tribute payments in person to the Assyrian court as well as provide soldiers when requested to do so. The tribute payments could also include gifts dedicated to the Assyrian gods to ensure the goodwill of the Assyrian monarch (Cogan 1974:55-56; Miller & Hayes 1986:320).

When a local ruler proved to be rebellious, he was replaced by one who would, hopefully, be more trustworthy (Miller & Hayes 1986:320; see Röthlin 2009:50). If this change in leadership did not proceed according to Assyrian requirements, an Assyrian governor was then appointed and the region was made, or incorporated into, an Assyrian province. One advantage of maintaining continuous obedience to an Assyrian monarch was the promise of immediate support when the necessity arose (Saggs 1973:161).

[80] Ephʿal (1979b:285) claims that Assyrian sources make no mention of Hauran at all.
[81] During the reign of Tiglath-pileser III, only Megiddo and Dor were Assyrian provinces, while Samaria was an independent vassal state (Na'aman 2005:223). It was only during the reign of Sargon II (in 720 BC) that Samaria was annexed to Assyria.

(c) The Phoenician and Philistine harbour towns

Although some of the Phoenician towns fell under the province of Dor, the coastal areas were virtually autonomous trading centres that were allowed to continue with their own administrative, religious and social activities with minimal interference from Assyria as long as they voluntarily submitted to Assyrian authority and agreed to pay annual tribute to the Assyrian monarch (Miller & Hayes 1986:320; Stern 2001:12, 104).[82] Inspectors, however, were appointed in order to maintain control over the trading activities at these ports to ensure that the Assyrian Empire benefited from the coastal trade with Egypt, the North African coast, Greece and the west (Stern 2001:12-13). As the gateway between Egypt and Palestine, Philistia was continually caught between Assyria and Egypt, but learnt to adapt to whatever the situation demanded (Stern 2001:104). During the latter part of the Assyrian period, from circa 640 BC, the Egyptians managed to subdue and replace the Assyrians in the region (Stern 2001:107).

(d) The nomadic tribes

Assyrian domination over the Southern Arabian desert areas followed the same pattern as the coastal areas since the lucrative incense and spice trade was an important consideration to the Assyrians in their quest to control international trade routes (Stern 2001:12-13).

### *3.2.1.3 The Assyrian transformation of Palestine*

The formation of Assyrian provinces in Palestine necessitated the establishment of administration centres and, consequently, numerous palaces, storehouses, public buildings, silos and water systems were erected (Stern 2001:18-21). Houses were also provided for the new inhabitants who were brought in to replace the deportees. The larger centres were located in the provincial capitals (Megiddo, Dor and Samaria), while smaller centres have been found at Tell Keisan in Phoenicia, Tel Dothan in Samaria and Ayelet ha-Shaḥar in Megiddo.

[82] Na'aman (2005:227) suggests that Ashdod became an Assyrian province after it was conquered by Sargon in 712 BC and was governed by both a local king and an Assyrian governor, essentially a characteristic of vassal states. However, he (1979:71-72, n. 7) previously asserted that, since Sargon was killed shortly after Ashdod was annexed to Assyria, thereby curtailing his plans to annex the whole of Philistia, and his son, Sennacherib, followed a different policy, 'the existence of an Assyrian governor side by side with a local king in Ashdod was the result of an historical accident and not representative of any particular model of government current at the time in the Assyrian Empire'.

According to Stern (2001:19), the enormous scope of the building activities carried out by the Assyrians in Palestine was formerly unknown in the region. Elements such as house plans, elevated podiums, horn-shaped stone thresholds and vaulted openings were typically Assyrian. Military campaigns also required fortresses to be built along the main roads and the facilitation of international trade required new settlements to be established near international trade routes and new harbour towns to be erected. Kur Essarhadon, a new harbour town erected near Sidon, was ruled by an Assyrian governor whose duty was to collect revenues from the city itself as well as from nearby Tyre and Sidon (Stern 2001:21). With the exception of two of the three provincial capitals (Megiddo and Dor), the towns in the Assyrian provinces were not fortified. Although no fortifications have as yet been uncovered at Samaria, Stern (2001:19-20) is of the opinion that the city walls and gates were either repaired or maintained by the Assyrians since the walls from the Israelite period continued in use until the Roman period.

Although excavations at the capital, Megiddo, clearly show Assyrian ingenuity concerning town planning, the province of Megiddo was mainly deserted during the Assyrian period (Stern 2001:46). In contrast, the province of Samaria shows evidence of major rebuilding projects carried out by the Assyrians (Stern 2001:50), while Judah was left to its own resources concerning the rebuilding of its destroyed towns (Stern 2001:130-131). As a result, Judah struggled to recover (Na'aman 2005:233). Only the Beersheba Valley, where new sites were established and the developed area doubled in size compared to the eighth century BC, managed to flourish during the seventh century BC.

#### *3.2.1.4 The development of bureaucracy*

(a) Sealings

Sealings from the Assyrian period in Palestine attest to a bureaucratic network of administrators who dealt with various aspects of the Assyrian administration (Stern 2001:169). The majority of seals and seal impressions have been found in Judah, many more than in the other Israelite states, and date mainly to the seventh and early sixth centuries BC (Stern 2001:179). Many of the seals bear either the titles of officials or the occupations of the owners of the seals. The first group bearing titles of officials can be further divided into two sub-groups: the first sub-group comprises inscriptions which include the king and those belonging to the family of the king and the second sub-group comprises servants of the king

as well as servants of other individuals. Examples of the first sub-group can be seen in inscriptions such as 'belonging to the king', 'the son of the king' or 'daughter of the king' (Mazar 1992:519; Stern 2001:179). Two examples come from Tell Beit Mirsim: *l-ʿz[yhw]* ('belonging to Uzz[iah]') or *l-ʿz[ryhw]* ('belonging to Az[ariah]') and *l-Ḥ[zq][yhw]* ('belonging to Heze[kiah]') (Albright 1943a:73). Inscriptions bearing the title 'son of the king' include biological sons, for example, 'Manasseh the son of the king' as well as others who were not biological sons, such as Neriyahu, Gaddiyahu or Yareyahu (Stern 2001:179-180). These were most likely the titles of administrators who belonged to the royal family. Examples of the second sub-group include 'Shebanyahu servant of Uzziyahu', 'Yehozarah son of Hilqiyahu servant of Hizqiyahu' or merely 'servant of the king' (Mazar 1992:519; Stern 2001:180). There are even seals inscribed with 'woman servant'. Other seals with titles of servants include examples such as 'Adoniyahu who is over the house' or 'Pelayahu who is over the corvée' as well as seals relating to military occupations, for example, 'to the commander', 'the commander of the city' which appears on a seal that depicts bows and arrows being handed to the officer (Figure 3.2), 'the army commander or officer Kanyahu' who is mentioned in the Lachish Letters (see 4.7.2.1[i]), or 'the standard bearer' (Mazar 1992:519; Stern 2001:180-181). There are also seals depicting titles from lower down the hierarchy, for example, 'the treasurer' which appears in the Arad Ostraca, 'belonging to Azaryahu the porter of the prison' and 'Netibyahu steward of Mattan' who was most likely the steward of a private individual (Mazar 1992:519; Stern 2001:181-182).

Figure 3.2: Seal of Judaean official: 'commander of the city' (Stern 2001:181)

The second main group of seals includes those that designate the occupation of an individual. The most common occupation mentioned is that of the scribe, for example, bullae belonging to 'Berechyahu son of Neriyahu', Jeremiah's scribe, have been found in Judah (Mazar 1992:519; Stern 2001:182). Other occupations that are mentioned are those of priests, for

example, 'Hanan the son of Hilqiyahu the priest'[83] as well as healers, guides, upholsterers, laundrymen, wine sellers and quarriers.

(i) Stamp and cylinder seals

Stamp and cylinder seals have been found in major Assyrian centres in Palestine, such as Tell Keisan and Beth-Shean in Galilee, Dor and Caesarea in the province of Dor, Samaria and Shechem in the province of Samaria, the city of Megiddo as well as Gezer, Tel Sheva and Arad in Judah (Ornan, Ortiz & Wolff 2013:6-7, 10; Stern 2001:17-18). These seals usually depict Assyrian cult scenes and the image of the Assyrian goddess, Ishtar. Although some are imitations of the Assyrian types, most of them are made of agate or carnelian, stones not native to Palestine, thereby indicating that they were imported from Assyria. Phoenician seal inscriptions also usually belonged to royalty, state officials, scribes and priests, for example, 'belonging to the king of Sarepta', '*'ebed* ('servant') of 'Azarba'al' and 'man of god' (Stern 2001:90-91). Seals from Philistia also bore similar inscriptions, such as a seal from Tell Jemmeh which is inscribed '[belonging] to 'bdʾliʾab son of Shib'a servant of Mitinti son of Ṣidqa' (Stern 2001:117). This seal belonged to the 'servant of the king' of Ashkelon, Mitinti II, who paid tribute to Esarhaddon and Ashurbanipal in 677 BC and 667 BC, as mentioned in the Assyrian annals (Stern 2001:117). The following inscription mentioning Mitinti, king of Ashkelon, as well as a number of other kings from the region of Syria-Palestine, including Manasseh, king of Judah, appears on a prism found at Nineveh (RINAP Project 2011):

> I summoned the kings of Ḫatti and Across the River [Syria-Palestine]: Baʾalu, king of Tyre, Manasseh, king of Judah, Qaʾuš-gabri, king of Edom, Muṣurī, king of Moab, Ṣil-Bēl, king of Gaza, Mitinti, king of Ashkelon, Ikausu, king of Ekron, Milki-ašapa, king of Byblos, Mattan-Baʾal, king of Arvad, Abī-Baʾal, king of Samsimurruna, Būdi-il, king of Bīt-Ammon, Aḫī-Milki, king of Ashdod — twelve kings from the shore of the sea... (Esarhaddon 1, v 54-v 63).
>
> I sent orders to all of them for large beams, tall columns, [and] very long planks of cedar [and] cypress, grown on Mount Sirāra and Mount Lebanon, which from early days grew thick and tall, [and] they had bull colossi [made of] *pendû*-stone, *lamassu*-statues, zebus, paving stones, slabs of marble, *pendû*-stone, breccia, colored marble, brownish limestone, [and] *girimḫilibû*-stone, [everything that was] needed for my palace, dragged with much trouble [and] effort from the midst of the mountains, the place of their origin, to Nineveh, my capital city (Esarhaddon 1, v 73b-vi 1).

[83] Judah followed a tradition of paponomy where names were repeated every other generation as in the case of Hilqiyahu, the son of Hanan, the son of Hilqiyahu – the latter might be the high priest during the reign of Josiah, king of Judah (Stern 2001:183).

(ii) Bullae

Whereas bullae were used in the archaic period to seal strings of tokens, during the first millennium BC they were used to seal papyri as well as containers of various commodities (Aharoni 1968b:165; Avigad 1990:262). Among those used to seal papyri are a bulla inscribed with *lmlk* ('to the king'; see 3.2.1.4[a][iii]), which was found at Ashdod and bears a motif of a soldier leading a captive (Stern 2001:117), and bullae belonging to the Assyrian royal administration, which have been found at the city of Samaria, Lachish and the City of David in Jerusalem and bear impressions of royal emblems as well as the names and titles of officials and administrators (Stern 2001:15, 171, 175). Examples of bullae used to seal goods include one with a seal impression, which is inscribed 'In the 26th/year/Eltolad/to the king', which most probably sealed goods that were delivered by the town of Eltolad to the king as a city tax (Avigad 1990:263-264; see Jos 15:30; 1 Chr. 4:28), and a second bulla inscribed 'in the 13th year/the first crop of Lachish/to the king', which was stamped on a clay stopper (Figure 3.3) (Stern 2001:175). Both of these bullae are thought to originate from the 26th (613 BC) and 13th (626 BC) years of King Josiah's reign respectively (Stern 2001:175).

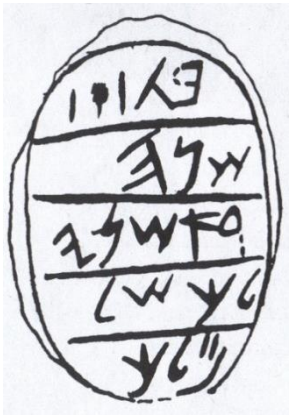


Figure 3.3: Judaean bulla: 'In the 13th year, the first crop of Lachish, to the king' (Stern 2001:175, Fig. I.76)

(iii) The *lmlk* seal impressions

Judaean royal storage jars bearing the impression *lmlk* ('[belonging] to the king') on the jar handles were, with the exception of a small number, confined to the province of Judah during the late eighth-early seventh centuries BC (Mommsen, Perlman & Yellin 1984:89; Na'aman 1979:75-77; Röthlin 2009:174). In total, 2,251 have been uncovered, of which 1,526 were discovered in documented excavations (Grena 2002). Sites where these artefacts have been found in controlled excavations include Lachish (415 items), Jerusalem (294), Ramat Raḥel

(224), Gibeon/el-Jib (92), Tell en-Naṣbeh (88), Beth-Shemesh (71), Gezer (37), Azekah/Tell Zakariyah (18), Timnah/Tel Batash (15), Gibeah/Tell el-Ful (14), Hebron (13), Arad (9), Tell Beit Mirsim (4), Beersheba (2), Jericho (2) and Qumran (2) (Albright 1943a:74; Mommsen et al 1984:89; Röthlin 2009:174).[84]

There are two groups comprising three classes of *lmlk* impressions: the first group includes Classes 1 and 2 which are in the shape of a four-winged scarab with the word *lmlk* as well as the name of one of four towns, namely *ḥbrn* (Hebron), *socoh* (Sochoh), *zf* (Ziph) or *mmsht* (Figure 3.4); and the second group (Class 3) displays a double-winged sun disk with identical inscriptions (Figure 3.5) (Aharoni 1968a:341, 346; Diringer 1949:73, 76; Mazar 1992:455-457; Stern 2001:174). These icons are regarded as official emblems of the Judaean kingdom (Stern 2001:213). Both emblems have their origin in Egyptian symbolism (Lapp 1960:11; Sayce 1893:240-241; Ussishkin 2011:222).[85]

Figure 3.4: *lmlk* jar handle impression – four-winged scarab with *lmlk* at the top and *mmsht* at the bottom (Grena 2002: http://www.lmlk.com/research/lmlk_gg21.htm)

Figure 3.5: *lmlk* jar handle impression – double-winged sun disk with *lmlk* at the top and *ḥbrn* at the bottom (Grena 2002: http://www.lmlk.com/research/lmlk_gg22.htm)

Hebron and Ziph are located in the Hebron Hills; Sochoh is not to be confused with the town south of Hebron, but is most likely located in the Shephelah; and *mmsht* has not yet been identified, although it has been suggested that it may have been an abbreviation for the word 'government' or the name of an administrative centre (Mazar 1992:457). Personal seal impressions have also been found on the *lmlk* jars, which could possibly indicate that the owners of these impressions could have been officials employed by the royal administration

[84] These numbers were transcribed on 30 September 2014 from Grena's website that was updated on 2 August 2012.

[85] Aharoni (1968a:346), on the other hand, suggests that the double-winged sun disk closely represents the royal insignia of Assyria, thereby indicating that the change could have taken place as a result of Assyrian domination.

to oversee the production and distribution of the jars or they could be the seals of the royal potters who produced the jars or of royal potteries (Diringer 1949:82; Mazar 1992:457; Stern 1979:251). Other possibilities are that the four geographical names were royal estates whose products, such as wine, were stored in the jars and the legend *lmlk* indicated a royal standardisation system or that the four towns were administrative centres and the jars were used as a standard measure to collect taxes (Aharoni 1968a:341; Albright 1943a:75; Cross 1969:21-22). The names of the four towns impressed on the jars may therefore reflect the administrative divisions of Judah mentioned in Joshua 15:21-62. Each is surrounded by three of the twelve former districts most likely established during the reign of Jehoshaphat: the Negev district and the two southernmost districts of the hill country (Ziph); the three Shephelah districts of the western foothills (Sochoh); the three central districts of the hill country (Hebron); and the remaining districts of Jerusalem, Benjamin and the Judaean wilderness (*Mmsht*) (Aharoni 1968a:297, 345). On the other hand, Yadin (1961a:9) differs in the identification of Ziph and *mmsht*: he places Ziph in the Judaean wilderness and *mmsht* in the Negev, although he acknowledges that he also has been unable to identify *mmsht* with a particular site. Yet another possibility is that the four names represent key cities within four military defensive zones, each comprising a number of walled towns, and that the jars were used to store provisions in times of siege (Yadin 1961a:7-8, 11). Furthermore, the twelve administrative districts were grouped in such a manner that each district fell within only one defensive zone (Yadin 1961a:9, 11).

The *lmlk* jars are well fired and have a capacity of between 39 and 52 litres (Ussishkin 1978:77, 80; 1983:162-163). This variation in capacity led Ussishkin to determine that the royal stamps on the jars could not have been meant as a guarantee of quantity. The large number and the relative uniformity of the jars suggest that the jars were produced on an organised scale (Röthlin 2009:105). Chemical analysis of 118 *lmlk* handles indicates a degree of uniformity in composition, which, in turn, implies that the jars were made in a single location (Mommsen et al 1984:112-113). Unfortunately, other than ascertaining that the jars were produced in the Shephelah region, a specific location has not, as yet, been identified. According to Mommsen et al (1984:112-113), the scarab shape, the sun disk impression and the four place names impressed on the jars appear to be unrelated to the place of manufacture.

The date of the *lmlk* jars has been the subject of much debate (Mazar 1992:457-458; Stern 2001:174-175). Most scholars agree that they belong to the time of the Judaean Monarchy, but differ as to the exact dating. According to Albright (1943a:74), the four-winged group

dates to the reigns of Hezekiah and Manasseh, while the two-winged group dates to the time of Josiah. Aharoni (1962:51; 1968a:340-346) believes that, based on the similarity of the script with the Siloam inscription, the four-winged group should be attributed to Hezekiah's reign prior to Sennacherib's campaign and the two-winged group to after that campaign, either still during the time of Hezekiah or early in Manasseh's reign. Diringer (1949:85-86) assigns the four-winged group to the late eighth (Class 1) and early seventh (Class 2) centuries BC and the two-winged group (Class 3) to the end of the seventh century BC. However, he later revised his opinion as follows: Class I to early or mid-eighth century BC, Class 2 to late eighth century BC and Class 3 to the reign of Josiah (in Ussishkin 1977:54). Yadin (1961a:12) attributes the introduction of the four-winged group to the time of Uzziah (mid-eighth century BC) and Lapp (1960:18) asserts that stratigraphical evidence indicates that the two groups cannot be separated chronologically, but should be attributed to the seventh century BC and continued in use at least until 587 BC and probably for a short time thereafter. This is in agreement with Buchanan's (1954:335-336) view that the two-winged group cannot have been used on only one particular type of jar if that type of jar is dated a century earlier (as in the case of the *lmlk* jars, the date of which is based on the eighth century BC date for the four-winged group). Consequently, he proposes three possibilities: the *lmlk* jars continued in use during the sixth century BC at Lachish, which he regards as doubtful seeing that so few specimens were found in Level II; the two-winged group was impressed on other jar types, but no evidence has been found for this; and the most plausible reason, the two-winged group was in use together with the four-winged group in Level III at Lachish since at least half of the examples of the two-winged group were found in Level III and only one in Level II. In addition, the presence of this two-winged handle in Level II does not, according to Lance (1971:325-326), imply that this type originated in Level II, particularly if other two-winged handles were found in Level III.[86] Furthermore, it appears that these jars were found mainly in the areas invaded by Sennacherib in 701 BC, which suggests the possibility that the jars were filled with foodstuffs and distributed to the various garrisons stationed at towns where Hezekiah expected Sennacherib to attack (Mazar 1992:457-458; Stern 2001:174-175; Ussishkin 2011:222; Yadin 1961a:11). The *lmlk* jars were also occasionally found in late seventh century BC contexts. Since Jerusalem as well as other

[86] Lemaire (cited by Lipschits, Sergi, et al 2010:10-11) makes further differentiations: two classes (Ia and Ib) for the four-winged type and three classes (IIa, IIb and IIc) for the two-winged type plus one additional type, X II. Ussishkin (2011:222-223, 230-232, 236) identifies another type, O II, as well and demonstrates that all these types appear in strata dated prior to the destruction of 701 BC.

Judaean settlements were not captured by Sennacherib, it is logical that the jars turned up in these later contexts.

(iv) The concentric circle and rosette seal impressions

Concentric circle incisions (Figure 3.6) have been found on the same handles as the *lmlk* seal impressions as well as on their own in the same contexts, which implies that these impressions are contemporaneous (Ussishkin 2011:224-233). Ussishkin (2011:233) views the incisions as additional marks made on the *lmlk* jars and should, therefore, be dated prior to 701 BC.[87]

Figure 3.6: One of the three known specimens of circle marks on the same handle as a personal stamp (Grena 2002:http://www.lmlk.com/research/lmlk_circ.htm)

The use of the rosette seal impressions as a royal emblem followed that of the *lmlk* seal impressions and are dated from the late seventh century BC up to the destruction of Jerusalem by the Babylonians in 587/6 BC (Aharoni 1968a:346; Stern 2001:174; Ussishkin 2011:235).

These rosette impressions (Figures 3.7 & 3.8), of which approximately 250 have been found, are, with the exception of a handful, likewise confined to the region of Judah (Cahill 1995:231; Stern 2001:176). The jars on which these impressions are found are taller and narrower than the *lmlk* jars and the stamp on the handles depicts varying numbers of petals around a central dot. It is possible that the production of jars with the rosette emblem originated with Jehoiakim in response to the threat of the Babylonian invasion that followed

[87] Stern (2001:177-178), on the other hand, reports that the concentric circle incisions appear in the same stratigraphic contexts as the rosette impressions.

the Egyptian defeat at Carchemish in 605 BC (Cahill 1995:252). According to Cahill (1995:252), 'the significance of the rosette motif indicates that the vessels on which they appear were intended for royal or official use and that the Judaean adaptation of the rosette motif demonstrates both the Assyrian impact on and the continuity of Judaean culture from the eighth to the seventh centuries B.C.E.'. Rosette seal impressions have been found at most of the same sites as the *lmlk* impressions, such as Tell en-Naṣbeh, Gibeon, Gibeah, Jerusalem, Nebi Daniel, Beth-Zur, Jericho, En-Gedi, Lachish, Gezer, Tel Batash, Socoh, Azekah, Tell eṣ-Ṣafi, Tel Ḥarasim, Tel Burnat, Tel 'Erani, Arad, Tel Malḥata, Tel ʿIra and Ramat Raḥel (Stern 2001:177-178; Ramat Raḥel Archaeological Project [sa]).

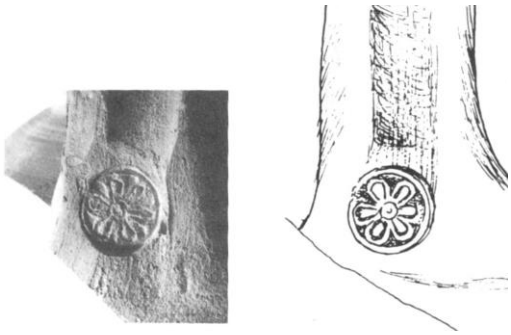


Figure 3.7: Rosette impression with outer frame from the City of David, Jerusalem (Cahill 1995:234, Fig. 4)

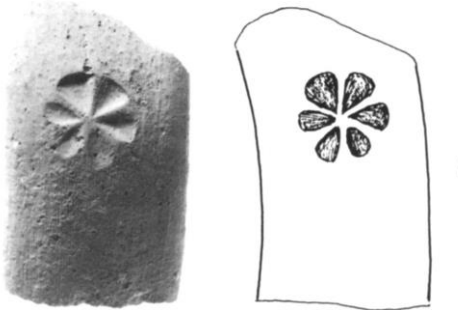


Figure 3.8: Rosette impression with wedge-shaped petals from the City of David, Jerusalem (Cahill 1995:239, Fig. 14)

Stern (2001:177-178) raises the question as to why the Judaean Monarchy chose variations of the sun disk as its emblem since other regions also used the symbol. For example, identical seal impressions have been found in Ammon and Phoenicia. He, however, suggests that there is no straightforward answer, but surmises that the emblem was a local adaptation of an Egyptian motif connected with the sun cult and was later incorporated into Palestinian culture. A seventh century BC cosmetic palette was found in eastern Jordan and depicts two persons kneeling and praying either side of a tree which is crowned by a two-winged sun disk symbol. The sun disk is portrayed by concentric circles in the same manner as those on the jar handles (Stern 2001:177-178).

(b) Weight systems

The shapes of weights used during the seventh and sixth centuries BC varied extensively. The only inscribed weights excavated thus far in Palestine are the Judaean weights (Stern 2001:117-118, 189-191). These were usually carved from stone in the shape of a half-dome and then inscribed or incised with an inscription or number representing the Judaean *sheqel*,

*pym, nsf, bqʿ* or *bat*. It is interesting to note that the numbering system used on these weights was a mixture of Phoenician numbers and hieratic Egyptian numbers. Other shapes used include cubes, trapezoids and animal shapes, such as stags, bulls, turtles (Figure 3.9), frogs, monkeys and water buffalo, shapes that were adopted from the Egyptians and Phoenicians and that were already in use throughout Palestine prior to the seventh century BC (Stern 2001:117-118, 189-191).

Figure 3.9: Weight in the form of a turtle (Stern 2001:190, Fig. I.82)

New shapes that appeared during the seventh century BC, such as ducks and lions, took their shapes from the Mesopotamian or Assyrian repertoire and were most likely based on the Mesopotamian weight standard (Stern 2001:41, 118). Examples of these weights are the Assyrian (or possibly Babylonian) bronze ducks, which were found off the Carmel coast, as well as non-epigraphic bronze weights in the shape of cubes or crouching lions, which were found at Arad in Judah (Kletter 1998:126) and at Ashkelon (Stager, Master & Schloen 2011:8, 10, 474) and Tell Jemmeh in Philistia (Petrie 1928:26; see Stern 2001:41, 118).

Examples of the inscribed/incised Judaean weights have been found in Philistia at Ashdod, Ekron, Tell Jemmeh, Tell el-Farʿah (South), Tel Haror, Tell Abu Salima, Mephalsim and Nebi Rubin; at Gibeon and Tell en-Naṣbeh in Benjamin; at Jerusalem, Ramat Raḥel and Beth-Zur in the Judaean hill country; at En-Gedi in the Judaean desert; at Gezer, Nebi Rubin, Meẓad Ḥashavyahu, Beth-Shemesh, Tel Batash, Azekah, el-Qom, Tell Judeideh and Lachish along the western boundary of Judah; at Ḥorvat ʿUza, Arad, Tel Malḥata, Aroer and Tel ʿIra in the Negev; in the provinces of Megiddo, Samaria and Dor; and in the Transjordanian states of Moab and Edom (Mazar 1963:104; Stern 2001:117-118, 190-191). According to Stern (2001:191), this suggests that the Judaean weights served as the basic units of measure in trade between Palestine and the neighbouring kingdoms, while the Mesopotamian units of measure were used in trade with Assyria and Babylon.

Other than the Judaean weights described above and despite the discovery of a tablet from Tell Keisan, located in Phoenicia and containing a list of Assyrian weights (*minda*) used for distributing rations, no other weights or measures have been found in any of the Assyrian provinces of Megiddo, Samaria and Dor, nor have any been found at sites displaying Assyrian-style architecture, such as Tell Keisan in Phoenicia, Ayelet ha-Shaḥar in the Upper Galilee, Gezer in the northern Shephelah, and Tell Jemmeh and Tell Seraʿ in Philistia (Stern 2001:40-41).

(i) The *sheqel* weight system

Although evidence from the end of the eighth century BC for the use of the *sheqel* weight system has already been found, *inter alia*, in the form of a bronze, dome-shaped weight with the word *sheqel* inscribed beside the number '1', according to the Bible and inscribed archaeological finds, such as ostraca and weights, the *sheqel* system was the main system of weights in use during the seventh-sixth centuries BC (Kletter 1991:124; Stern 2001:191-192). This system included the following weights: the 'talent' (*kikar*), which was divided into 60 *maneh*, each of which in turn was divided into 60 *sheqels*, each of which was then divided into 20 (or 24) *gerah*.[88] Unfortunately, no inscribed weights for the *kikar* unit or the *maneh* unit have as yet been found (Stern 2001:195).

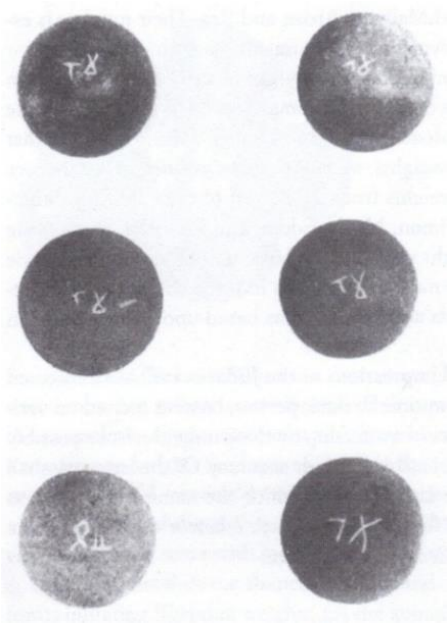


Figure 3.10: A group of *sheqel* weights from various Judaean sites (Stern 2001:192, Fig. I.83)

[88] According to the Bible, a *sheqel* was equivalent to twenty *gerah* (Ex 30:13).

Two ostraca were found at Meẓad Ḥashavyahu (see 4.7.2.1[d]): the inscription *sh 4* appears on one and *sheq(el)* on the other (Naveh 1962:29-30; Stern 2001:191). The hieratic sign *sh* appears on two ostraca from Kadesh-Barnea while the Arad Ostraca (see 4.7.2.1[f]) also portray the use of the *sheqel* system, but use only the first letter, *shin* (Aharoni 1981:30-31, 55; Stern 2001:192). In other cases, the word *sheqel* is inscribed in full, for example, on a bronze weight in the shape of a turtle excavated in the region of Ashkelon (Diringer 1958:228-229; Stern 2001:192-193). On its back, *peleg sheqel* ('a fraction of a sheqel') and on its belly, *peleg rbʿt* ('a fraction of a quarter' of a *sheqel*, equivalent to 2.63 g) are inscribed. A second weight, also in the shape of a turtle, comes from Samaria and is inscribed *ḥamesh* ('five') (Stern 2001:193). According to Stern, this should be read as five *gerah* and is equivalent to a quarter of a *sheqel* (2.49 g) where the *sheqel* equals 20 *gerah*. Another weight from Samaria in the form of a cube is inscribed 'a quarter of a *sheqel*' on one side and 'a quarter of *nsf*' (2.54 g) on the other side (Stern 2001:193).

Approximately another 170 inscribed *sheqel* weights found in Syria-Palestine date from the period of the Assyrian conquest until the destruction of the First Temple (see 2.3.3.3) (Kletter 1991:125-126; Stern 2001:193). Most of these are inscribed with the symbol *γ* and hieratic numbers.[89] Consequently, Albright (in Scott 1959:33, n. 14) suggests that the symbol ☿ represents the hieratic sign *šs*, which is a shortened version of the word *sheqel*. A trapezoid bronze weight found at Gezer bears the symbol ☿, the hieratic number '2' and the word *lmlk* (Grena 2002). This has been interpreted as 'two *sheqels* in the king's stone' and, consequently, it has been posited that the *sheqel* weights were royal weights issued by the Judaean royal administration (Stern 2001:193).[90] Hieratic numerals are also found on two ostraca from Lachish (Aharoni 1966b:18). The numeral '10' appears on ostraca IX and XIX and the numeral '50' also appears on ostracon XIX (Aharoni 1966b:18).

The 8-*sheqel* unit is the basic weight of the *sheqel* system, which is based on the numbers 1, 2, 4, 8, 16, 24 and 40 (Aharoni 1966b:18; Stern 2001:194). Each unit is double the preceding

[89] The use of hieratic numerals and signs reflects Egyptian influence on the culture of Judah (Kitchen 1986:113; Kletter 1991:138).

[90] Kletter (1991:138) suggests that the inscribed *sheqel* weights were not only used by the central authorities, but also by the general population. In spite of the *lmlk* weight from Gezer, Kletter (1991:138-139) asserts that the royal weight system was most probably no different from the ordinary *sheqel* weight system. He (1991:126, 137, 139) explains further that, since the royal administration controlled economic activities, they most probably introduced the *sheqel* weight system during the eighth century BC, but that during the seventh century BC, its use had spread to the general population as evidenced by finds at various sites and in different archaeological contexts.

unit up to 8 while the subsequent units are multiples of 8. On the other hand, the Egyptian hieratic numbers are based on the numbers 5, 10, 20, 30 and so on (Figure 3.11). This required that the local weight system had to be adapted to the Egyptian system since the Egyptians traded with most of the other countries of the region, many of which used the Egyptian system (Scott 1965:135; Stern 2001:194). Consequently, 4 *sheqels* equalled 5 *qedet* (or a half *deben*), 8 *sheqels* equalled 1 *deben* (or 10 *qedet*), 16 *sheqels* equalled 2 *deben* (or 20 *qedet*), 24 *sheqels* equalled 3 *deben* (or 30 *qedet*) and 40 *sheqels* equalled 5 *deben* (or 50 *qedet*). The average weights of the *sheqel* system are as follows: 1 *sheqel* equals 11.332 g; 2 *sheqels* equals 22.161 g; 4 *sheqels* equals 45.239 g; 12 *sheqels* equals 129.145 g; 16 *sheqels* equals 184.769 g; 24 *sheqels* equals 274.33 g; and 40 *sheqels* equals 454.55 g (Stern 2001:194).[91]

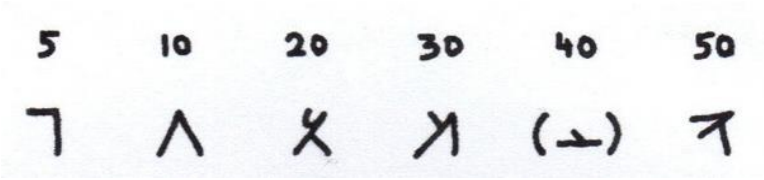



Figure 3.11: Hieratic signs for the Egyptian numeral system (Aharoni 1966b:19)

The *gerah* unit is mentioned in a number of biblical passages (Ex 30:13; Lv 27:25; Ezk 45:12). Weights with inscribed hieratic numerals for 2, 3, 4, 5, 6, 7, 8, 10 and 11 *gerah* have been excavated at sites in Syria-Palestine (Figure 3.12) (Stern 2001:195). These weights were used mainly to weigh small amounts of expensive commodities, such as gold, silver, incense and spices. Although one *sheqel* usually equalled 20 *gerah*, some weights have been found that are $^{1}/_{24}$ of a *sheqel* (Kletter 1991:136; Stern 2001:195). There appears, as yet, no explanation for this discrepancy. The average weight of one *gerah*, according to Kletter (1991:136), is 0.55 g, while Barkay (1981:294) determined it to be 0.5658 g.

[91] The weight of a *sheqel* was determined by Albright (1943a:47, 76) as 11.41 g on the basis of a hemispherical limestone weight found in the West Tower, a public building, in Stratum A at Tell Beit Mirsim.

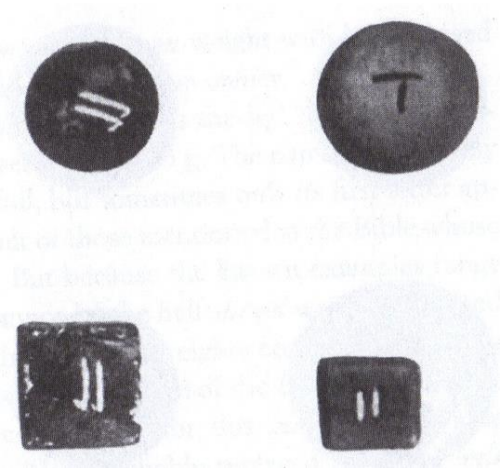


Figure 3.12: A group of *gerah* weights (Stern 2001:195, Fig. I.84)

(ii) The *nsf, pym* and *bqʿ* weight system

A supplementary weight system with three different weights, namely *nsf, pym* and *bqʿ*, was introduced, probably to address additional needs (Figure 3.13) (Stern 2001:195-196). These weights have been found at almost every site in Judah and Philistia where the *sheqel* and *gerah* weights were found. The majority were dome-shaped and made of stone, but rectangular bronze weights have also been uncovered (Stern 2001:195-196).

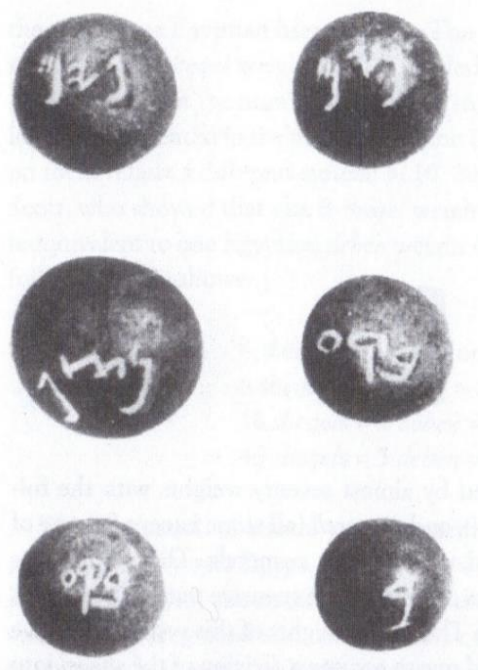


Figure 3.13: Weights (*pym, nsf* and *bqʿ*) from Lachish (Stern 2001:196, Fig. I.85)

Approximately 50 weights representing the *nsf* unit have been excavated (Stern 2001:196-197). Although this unit is not mentioned in the Bible, the most likely translation of *nsf* is 'half'. The average weight of these specimens is 9.659 g. One of the weights was inscribed

‘one *nsf lmlk*’ and weighs 9.515 g. Another weight is inscribed ‘*revʿa nsf*’ (‘a quarter of a *nsf*’). The *pym* unit, slightly smaller than the *nsf* unit and weighing an average of 7.815 g, is mentioned only once in the Bible in 1 Samuel 13:51. One weight had an inscription on its base, ‘lZechario Yaʾir’, which could be the name of its owner. The smallest weight of the three is the *bqʿ*, weighing an average of 6.003 g. Approximately 30 of these specimens have been found at Palestinian sites (Stern 2001:196-197).

(iii) Units of volume

Volumes were divided into dry measures and liquid measures (Stern 2001:198). Dry measures included the following: 1 *homer*, 2 *lethekh*, 10 *ephah*, 30 *seah*, 100 *omer-esaron* and 180 *qav*; and liquid measures included 1 *kur*, 10 *bat*, 60 *hin* and 720 *log*. These names are a mixture of Palestinian, Mesopotamian and Egyptian terms. Unfortunately, many vessels have been found in pieces and the complete vessels that have been found do not have inscriptions indicating their volumes. Moreover, at sites in Judah where complete *lmlk* jars have been uncovered, their volumes vary sufficiently, making it difficult to establish modern measures (Stern 2001:198).

Volume units were also indicated using practical measures, for example, ‘2 donkey loads’ occurs in the Arad Ostraca (Stern 2001:198-199). This practice was also in use in Samaria as evidenced in the Samaria Ostraca, for example ‘*nevel* [“leather flask”] of old wine’ (see 4.7.1.2[b]) or ‘leather flask of ointment oil’. Further examples come from other regions of Palestine, such as the use of *kadim* (jugs) in Phoenician ostraca found at Dor. Another custom involved writing down volume units, but omitting the unit itself. For example, an eighth century BC inscription which reads ‘a thousand and one hundred oil’ was found on an ostracon from Tell Qasîle (see 4.7.1.4). Another inscription ‘*sh* 5’ meaning ‘5 [units] of *shemen* [“oil”]’ was found on a seventh century BC ostracon from Kadesh-Barnea. Also at Arad, an inscription of a measure called *heẓi* (‘half’) was found, while at Tel Sheva, another inscription reads *heẓi lmlk* (‘half in the king’s measure’). Yet other exceptions can also be found in the Arad Ostraca where *homer* is also used for a wet measure (‘a full *homer* of wine’) (see 4.7.2.1[f]) and the *bat* unit is only mentioned by its first letter, for example, ‘*b* I III wine’ (‘one *bat* and three *hin* of wine’). An Egyptian unit of measure that is not mentioned in the Bible is the *hakat*, which is more or less equivalent to an *ephah* (Stern 2001:198-199).

The use of these terms for volume measures continued into the Persian period, as evidenced by archaeological finds (Stern 2001:200). An Aramaic ostracon from Tell el-Farʿah (South) dates to the Persian period and bears an inscription with the word *bat* (*bath*) (Naveh 1970a:40, n. 92; see 4.7.4.2[d]) and at Arad, ostraca from the same period mention units of measure in their shortened form, namely, *s*4 *q*3 (‘four *seah* and three *qab*’) (see 4.7.4.2[h]).

The use of the *lmlk* storage jars and the standardisation of weight measures and unit volumes during the late eighth-early seventh centuries BC in Judah suggest the involvement of a centralised administrative system (Röthlin 2009:121). This is further supported by archaeological evidence in the form of a small jar found at Tel Beersheba, which has been dated to 700 BC and bears the inscription *ḥṣy lmlk*, meaning a ‘half [-measure] of the King’ (a full measure was the *iśśaròn*) (Aharoni 1975:160). Another inscription that was stamped on the *lmlk* jar handles is *bt lmlk* (‘*bat* of the king’) as seen on two specimens from Lachish and Tell en-Naṣbeh, which could possibly indicate that this measurement was also guaranteed by the central administration (Stern 2001:199-200; see Röthlin 2009:121).[92] However, variations of 10.4% have been noted in the sizes of the jars (Zapassky et al 2009:60). In spite of this, Lipschits, Koch, et al (2010:466) suggest that, since hundreds of *lmlk* jars were used, ‘the average volume of most of these jars balances the inaccuracy that exists in the margins of the system’ and, as a result, it was not necessary to know the exact volume of each jar.

### 3.2.2 The Babylonian period (626-539 BC)

#### *3.2.2.1 Historical background of the Babylonian conquest of Palestine*

In 626 BC, Nabopolassar, king of Babylon, initiated attacks against the Assyrians (Grayson 1975:18-20; Stern 2001:301-304). Throughout his reign, he waged campaigns against the Assyrians as well as the Egyptians, who were only defeated towards the end of Nabopolassar’s reign by his son, Nebuchadnezzar, who succeeded in driving the Egyptians out of Syria. This was followed by the conquest of Palestine, which began in 604 BC in

[92] The capacity of the *bat/bath* has been estimated by Kletter (2009:363) to be 19.22 litres and by Zapassky, Finkelstein & Benenson (2009:54) to be 22.5 litres. On the other hand, Lipschits, Koch, et al (2010:469-470) propose that the *bat* should be identified with a type of storage jar, specifically used to store wine or oil, and not with a unit of measurement. See also Kletter (2014:28) who asserts that the term *bath* refers to both the vessel and its measure. In many instances, epigraphic finds denote units of liquids, but not volume, for example ‘three (jars of) oil’ or ‘a hundred (jars of) fine wine’ (Dobbs-Allsopp et al 2005:213). Also on Arad Ostracon No. 34, the symbol for wine appears next to the symbol for a pot and not next to the measurement unit, the *ḥeḳat*, which appears throughout the ostracon (Aharoni 1981:62-64).

Philistia and extended until 586 BC. Similar to the Assyrian conquest of Palestine, the Babylonian conquest of the region was characterised by the destruction of settlements and the deportation of the inhabitants, but it was far more devastating as the Babylonians were not concerned with restoring any of the areas they conquered. Babylonian policy was to appoint local officials and royals of the conquered areas as rulers over some regions, but, in general, they favoured a centralised government, which was concerned only with the welfare of the capital of Babylon and its surrounding areas (Stern 2001:306).

According to Chronicle 5 in the Babylonian Chronicle Series,[93] Nebuchadnezzar II became king of Babylon in 605 BC (Grayson 1975:19). Prior to this, he defeated the Egyptians encamped at Carchemish BC and followed this up with the systematic conquest of Palestine from 604 BC with the ultimate objective of defeating his arch-enemy, Egypt (Malamat 1979a:207-208). In his second regnal year (604 BC), he conquered a city, which has been interpreted as Ashkelon, 'turned the city into a ruin heap' and deported the inhabitants (Grayson 1975:100-101; Lipschits 2005:40-41). From the second to the fourth years of his reign (604-602 BC), Nebuchadnezzar waged several campaigns in Palestine where he 'marched about victoriously' and 'brought the vast [booty]' back to Babylon. After an unsuccessful attempt on Egypt itself in 601 BC, Nebuchadnezzar withdrew to replenish his chariot force, leaving Babylonian garrisons behind in Palestine to subdue any possible uprisings (Malamat 1979a:208-209). During the seventh regnal year of Nebuchadnezzar (598 BC), the Babylonian forces repressed a rebellion led by Jehoiakim, on whose death his son, Jehoiachin, became king (Grayson 1975:102; Stern 2001:304). Babylon, with Nebuchadnezzar at the helm, subsequently laid siege to Jerusalem, forcing Jehoiachin to surrender. Jehoiachin was deported and Zedekiah was appointed king of Judah by Nebuchadnezzar. In 588 BC, with the support of the Egyptians, Zedekiah rebelled against the Babylonians and in 586 BC, Jerusalem fell and the Judaean king was captured and deported (Lipschits 2005:64; Stern 2001:305). All his sons and officials were killed and he was imprisoned. During this siege, the temple and royal palace were set on fire, Jerusalem was destroyed and all the temple articles were taken away to Babylon. With the exception of the 'poorest people' who were left to work the vineyards and fields (2 Ki 25:12; Jr 39:9-10;

[93] The Babylonian Chronicle Series is the name given to two series of tablets, the first of which is the Neo-Babylonian Chronicle Series and includes Chronicles 1 to 7, while the second series, which includes Chronicles 8 to 13a, is called the Late Babylonian Chronicle Series and is actually a continuation of the first series (Grayson 1975:8-9). These tablets document Babylonian history and cover the period from the mid-eighth century BC until the third century BC. Unfortunately, a number of tablets are badly damaged and others are missing, resulting in lacunae in the records.

52:15-16), the inhabitants were deported to Babylon and Palestine was left to waste (Mazar 1992:548; Stern 2001:305).

Nebuchadnezzar II was followed in short succession by Amel Marduk (562-560 BC) and Nergal Shar Usur (560-556 BC) (Stern 2001:306). The last of the Babylonian kings was Nabonidus (556-539 BC) who, for some unknown reason, went to live at Teima in Arabia during the seventh to tenth years of his hegemony, leaving the reins in the hands of his son, Belshazzar (Dougherty 1921:458-459; Stern 2001:307). The Babylonian empire was defeated by Cyrus, king of Persia, in 539 BC.

#### *3.2.2.2 The aftermath of the Babylonian conquest*

There is evidence of widespread destruction in Philistia after which only a few small unfortified settlements were built (Mazar 1992:548; Stern 2001:316-318). Ashdod, Ashkelon, Tell el-Ḥesi and the fortresses along the Via Maris at Meẓad Ḥashavyahu, Ashdod-Yam and near Rishon le-Zion were all destroyed and not reoccupied until the Persian period. Ekron and Timnah were also destroyed, but Ekron was reoccupied as an unfortified settlement for a short period, after which it was abandoned. At Timnah, there are traces of a small settlement and an industrial installation (Mazar 1992:548; Stern 2001:316-318).

In the province of Dor, no Babylonian remains have been uncovered at Mikhmoret, Tel Michal, Tel Ḥefer, Apollonia or Tell Qasîle (Stern 2001:315-316). Many Phoenician cities, which were also destroyed by the Babylonians, show little evidence of occupation. The last stratum before the Persian-period stratum at Tell Keisan dates to the Iron Age (late seventh century BC), while at Acco, virtually no remains from the Babylonian period were found. Also at Tell Abu Hawam and Shiqmona, there is an occupation gap between the last Iron Age stratum and the following Persian-period stratum. At Dor itself, no Babylonian-period remains have yet been uncovered (Stern 2001:315-316).

In the province of Megiddo, which remained sparsely populated during the Assyrian period, excavations and surveys show that some settlements, mainly in Galilee, reduced in size (Stern 2001:312-315). Others, such as Hazor and Megiddo, show evidence of being deserted during the Babylonian period. Although a fortress was built at Megiddo after it was destroyed at the end of the seventh century BC, there has been some debate as to the date of the fortress (Mazar 1992:549; Stern 2001:314). Some scholars attribute the building of the fortress to

Josiah as part of his defence against the Egyptian, Necho, while others believe it was erected by the Egyptian, Psamtik I, who took Megiddo from the Assyrians, and that the fortress continued to be used during the Babylonian period. Stern (2001:314) maintains, however, that no Judaean, Egyptian or Babylonian material was found in the stratum of the fortress, evidence that would have been present if the fortress had been in use at the time.

The province of Samaria, however, shows few signs of destruction (Stern 2001:319-320). It appears that the governors offered little resistance to the Babylonians and, consequently, parts of this region may possibly have continued to exist throughout the Babylonian period. There is, however, no certainty of this since the material culture during the Babylonian period did not differ significantly from that of the previous period. Excavations at Samaria indicate the site possibly remained in use from Iron II until the Hellenistic period. Babylonian-period finds include a few Babylonian seals, one cuneiform tablet written in a Neo-Babylonian script and a few ostraca with Babylonian names. On the other hand, Stern (2001:320) suggests it may be possible that, as with many Babylonian finds from Palestine, these finds could also date to the Persian period. Sites that yielded no Babylonian-period remains include Shechem as well as Gezer, which was destroyed by the Babylonians and not reoccupied until the Persian period (Stern 2001:320).

Contrary to other regions, there is evidence that the region of Benjamin continued to exist and prosper under Babylonian rule (Lipschits 2005:105; Stern 2001:321-322). Bethel and its shrine were rebuilt, Gibeon prospered as a producer and trader of wine and Tell el-Ful/Gibeah also shows evidence of continuity throughout the Babylonian period. After the destruction of Jerusalem, occupation continued at Mizpah (possibly Tell en-Naṣbeh), which became the capital of Judah (Mazar 1992:548; Stern 2001:322). This corresponds to the account in 2 Kings 25:22-24 which recounts that Gedaliah, who was appointed by Nebuchadnezzar as governor of Judah, established his headquarters in Mizpah. The plan of the city is significantly different to that of the previous period and structures include a palace and an area allocated to storehouses (Stern 2001:322). Babylonian-period material remains include *mwṣh* seal impressions (see 3.2.2.3[a]) and a fragment from a bronze bracelet bearing a cuneiform inscription, possibly in a Neo-Babylonian script (Stern 2001:322).

True to form, the Babylonians proceeded with the total destruction of Judah and most of the inhabitants were deported (Stern 2001:323). Nonetheless, although many Judaean towns ceased to exist, small villages were established. In the Upper City of Jerusalem, Babylonian

weapons were discovered at the foot of a well-preserved tower that formed part of the city's fortifications which were destroyed by the Babylonians. Although Jeremiah 41:5 appears to indicate that settlement continued in some form at Jerusalem, Stern (2001:324) asserts that excavations have not yet been able to provide a definitive answer. Possible indications of continued settlement come from Babylonian-period evidence found in burial caves in the Hinnom Valley at Jerusalem (Mazar 1992:548). The evidence also includes finds from the end of the Iron Age. Stern (2001:324-325), however, presents the possibility that the Babylonian-period evidence could date to the beginning of the Persian period, thereby indicating an occupation gap between the end of the Iron Age and the beginning of the Persian period. Excavations in eastern Judah at Jericho and En-Gedi (Kenyon 1957b:264; 1967:275; Lipschits 2005:233; Stern 2001:324) and in the Judaean hills at Tell Beit Mirsim (Finkelstein & Na'aman 2004:63-64, 73; Stern 2001:149-150, 324),[94] Tel Ḥalif (Seger 1980:224; 1983:15)[95] and Tell Rabûd (Kochavi 1974:12)[96] do not indicate occupation during the Babylonian period. In contrast, there is evidence that Khirbet Abu Tuwein (Mazar 1982:105; 1992:548)[97] and Beth-Shemesh (Grant & Wright 1939:78, 144-145; Stern 1982:77)[98] continued to exist to some small degree during the Babylonian period. Towns in western Judah that were completely destroyed and remained unoccupied until Persian times include Lachish, Tell Burnat, Azekah and Tel Batash (Barkay 1993:108; Mazar 1992:458; Stern 2001:325). The Beersheba Valley includes towns and fortresses such as Arad, Aroer, Tel Masos, Tel 'Ira, Malḥata and Kadesh-Barnea that were all completely destroyed, possibly by the Edomites (Barkay 1993:106; Mazar 1992:460).[99]

---

[94] The destruction of the last Iron Age stratum at Tell Beit Mirsim was carried out by Sennacherib circa 701 BC, after which the site continued to be occupied on a smaller scale during the Assyrian period and was then abandoned in the early seventh century BC (Aharoni & Aharoni 1976:87; Finkelstein & Na'aman 2004:63-64, 71).

[95] Tel Ḥalif also appears to have been abandoned during the first half of the seventh century BC (Seger 1983:15).

[96] There is no Babylonian-period stratum at Tell Rabûd between Stratum A2 (seventh-sixth centuries BC, end of Israelite period) and Stratum A1 (fifth century BC, Persian period) (Kochavi 1974:12).

[97] The fortress at Khirbet Abu Tuwein shows no destruction layer attributable to the Babylonians (Mazar 1982:105). Consequently, it either continued in occupation during the Babylonian period or was abandoned for a short time from 587 BC, re-occupied a little later and finally abandoned during the latter part of the Persian period. However, the village located at the foot of the hill on which the fortress was built was most probably abandoned during the Babylonian period as evidenced by the pottery finds which date to the Iron Age (Mazar 1982:105).

[98] The only Babylonian-period evidence at Beth-Shemesh comes from Tomb 14 which has been dated to the late sixth century BC (Grant & Wright 1939:78, 144-145; Stern 1982:77; 2001:343).

[99] Stern (2001:325) credits the Babylonians with these destruction levels. Mazar (1992:460) dates the Edomite invasion to after the Babylonian conquest of the Judaean heartland, while Barkay (1993:106) dates it to prior the Babylonian conquests.

Initially, the Transjordan kings paid tribute to the Babylonians, but later formed alliances with other countries against the Babylonians (Stern 2001:327-328). As punishment, Nebuchadnezzar marched against these kings and defeated them. Some settlements north of the Jabbok River remained in ruins after Assyrian destruction; others were destroyed by the Babylonians and not rebuilt until the Persian and Hellenistic eras. There are, however, indications of continuity in the region of Ammon (Mazar 1992:541-542; Stern 2001:328). Tombs excavated at Meqabelein, Umm Uthainah and Khilda remained in use until the Persian era (see 3.2.3.3[b][i]). Babylonian seals were found in a cemetery at Tell el-Mazar (see 3.2.2.3[a]; 3.2.3.3[b][i]). At Tell el-'Umeiri, a Babylonian ostracon and a bulla were uncovered (Stern 2001:329). Heshbon also shows signs of continuity throughout the Babylonian period (Stern 2001:330). No Babylonian-period evidence, however, has been discovered in the region of Moab. At Buseirah, the capital of Edom, there is clear evidence of a Babylonian period at the site, but Tell el-Kheleifah and Feinan yielded no Babylonian-period evidence (Stern 2001:330-331).

#### *3.2.2.3 Characteristics of the Babylonian administration*

The Babylonians, beginning with Nebuchadnezzar, adopted, for the most part, the administrative structures established by the Assyrians (Lipschits 2005:48-49). They did not implement the Assyrian policy of two-way deportations, nor did they attempt to develop areas that were destroyed. The main objective of their campaigns, other than extending their empire, was to exact and collect tribute and, if the subject regions remained obedient, they were mostly left to their own devices concerning their internal affairs (Lipschits 2005:48-49).

Lipschits (2005:60) is of the opinion that the purpose of the deportation of the elite from the administrative, economic, military and governing spheres of the various regions of Palestine was to ensure that those who were left behind were in no way able to provide any threat to Babylonian rule. In addition, the ascension of Hophra to the throne in Egypt in 589 BC introduced a period in which the Egyptians attempted to undermine Babylonian authority in Palestine (Lipschits 2005:66-69). This led to the rebellion of Zedekiah and the ultimate destruction of Jerusalem (see 3.2.2.1). Consequently, in order to prevent further possible rebellions, Nebuchadnezzar introduced a change in policy by turning the vassal regions, including Judah, into provinces under direct Babylonian rule, reinforced by the presence of the Babylonian military. The destruction of Jerusalem was the main focus of Nebuchadnezzar's campaign to establish stability in the region since the city and its local

kings had proved time and again that they could not be trusted. Unfortunately, due to the collapse of the economic and political centre in Jerusalem, the settlements along the periphery of Palestine, namely the Negev, the Shephelah and the Jordan Valley, were gradually abandoned and later infiltrated by nomadic groups (Lipschits 2005:66-69).

Due to the constant instability in Philistia and its close links with Egypt, this region was also conquered by the Babylonians and turned into a province (Lipschits 2005:67). Various excavations conducted in Philistia indicate that many of the settlements were completely destroyed and only recovered during the Persian period (Stern 2001:304). The Phoenician coast, on the other hand, appears to have been ruled by kings since the area was not under the influence of Egypt as much as Philistia, and Babylon was anxious to protect its economic interests along the coast through taxation and control over the trading ports (Lipschits 2005:67).

Regrettably, the virtual total destruction of much of Palestine by the Babylonians resulted in substantial destruction levels at numerous sites and this, together with the centralised policy followed by the Babylonians, has led to a scarcity of Babylonian artefacts that could assist in comprehensively reconstructing Babylonian administration in Palestine (Stern 2001:308-309).

(a) Seals and seal impressions

In spite of the fact that Babylonian cylinder seals were found in large quantities in Egypt, Syria and Anatolia, only a handful have been found in Palestine (Stern 2001:332). These include two seals with Babylonian inscriptions: a cylinder seal from Samaria which belonged to a scribe, Nabu Zabil, and a votive cylinder seal from Tel Sheva which was found in a *favissa* from the Persian period. Non-epigraphic Babylonian cylinder seals include a late sixth century BC seal (the beginning of the Persian period) found at Tell Jemmeh in Philistia, which depicts a bird-man with a scorpion tail facing the fish-goat representation of the god Ea, between which a moon crescent and a Babylonian motif known as 'the eye' are drawn (Figure 3.14),[100] and a second seal, which depicts a rider shooting a goat who is being bitten by a dog, found in an Ammonite cemetery at Tell el-Mazar in the Jordan Valley (Stern

[100] The excavator (Petrie 1928:10-11) contends that the animal depicted is a dugong and is not to be confused with the fish-goat representation of the god Ea. The seal was found below a Persian-period stratum, which Petrie attributes to the Assyrians. The motif beneath the moon crescent in the centre is regarded as Assyrian by Petrie (1928:11) and as Babylonian by Stern (2001:333).

2001:333; Yassine 1984:107). The seal from Tell el-Mazar was found in a clear Persian-period context, but could date to either the Babylonian or the Persian period (Figure 3.15). Another seal that has been dated to the late seventh-early sixth centuries BC is one from a tomb at Meqabelein (Harding 1950:46). These seals are made from chalcedony, a translucent milky or greyish quartz, indicating that they were imported from Babylon (Mazar & Dunayevsky 1967:139; Reader's Digest Universal Dictionary 1987:270; Stern 2001:333).

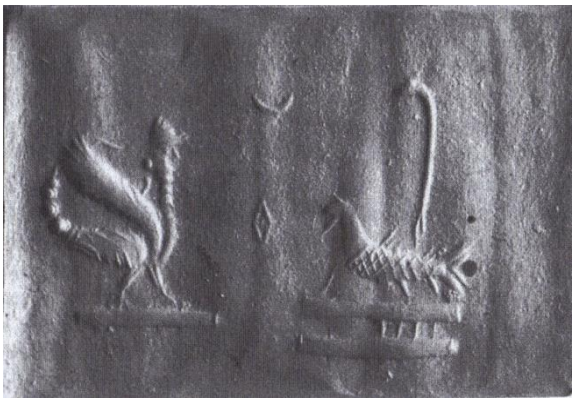


Figure 3.14: Babylonian cylinder seal from Tell Jemmeh (Stern 2001:333, Fig. II.4)

Figure 3.15: Cylinder seal from Tell el-Mazar (Yassine 1984, Fig. 9:6)

With the exception of one duck-shaped seal from Tell el-Mazar, all Babylonian stamp seals are conical in shape with an octagonal base and are also made from chalcedony (Stern 2001:334, 537; Yassine 1984:104). Unfortunately, the stratigraphic context of most of the Babylonian seals found in Palestine is too unclear to determine whether they should be attributed to the Babylonian or Persian periods. Sites where these seals were found include Tel 'Amal, Taanach (Figure 3.16), Tell Keisan, Samaria, Bethel, En-Gedi (Figure 3.17) and Tell eṣ-Ṣafi as well as sites in Edom, Moab and Ammon (Mazar & Dunayevsky 1967:139; Stern 2001:334). In spite of the fact that the seal from Taanach was found on the surface, its shape and material are characteristic of seals from the Neo-Babylonian period (Tushingham

1992:15). Unfortunately, there is no clear Babylonian stratum at Taanach but, since the stamp seal already made its appearance from the late eighth century BC during the Assyrian period, it is possible that the seal should rather be assigned to the late Assyrian period (Tushingham 1992:17). This dating was based on a similar seal from Samaria, which was dated to the last third of the eighth century BC (Tushingham 1992:15-16). According to Tushingham (1992:17), the stamp seal continued in use in Palestine until the sixth century BC, but he does not mention the possibility of a Persian-period date for the seal. In Judah at En-Gedi, two Neo-Babylonian stamp seals were found, one on a floor together with Attic pottery dating to the fifth-fourth centuries BC and the other on the southern slope of the tell near a Persian-period house (Mazar & Dunayevsky 1967:139; Stern 2001:535-536). Mazar & Dunayevsky (1967:139) suggest that the seals could also have been brought back from the Babylonian exile. These examples serve as evidence of the difficulty in dating Neo-Babylonian seals with any certainty.

Figure 3.16: 'Neo-Babylonian' seal from Taanach (Tushingham 1992:16, Fig. 1)

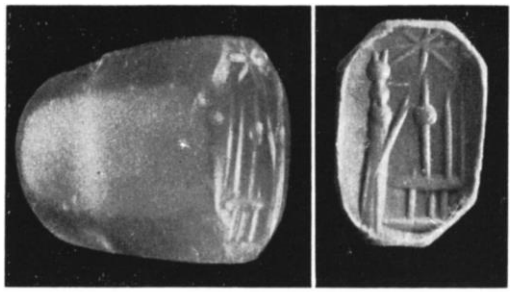


Figure 3.17: Babylonian stamp seal from En-Gedi (Mazar & Dunayevsky 1967, Pl. 31:1)

Syria-Palestinian imitations of Babylonian seals, mostly inscribed in the Aramaic script, bear inscriptions containing Babylonian names, such as 'Nergal Sallim son of Ahhe-eresh' and 'Yehoyishmaʿ daughter of Shamash-shur-usur' (Avigad 1965:228-230; Ornan & Sass 1992:63-64; Stern 2001:335).[101] Non-epigraphic seals, made from local stone, bear typical Babylonian motifs, for example, a moon crescent or an altar with the emblems of Nabu and

[101] Unfortunately, the provenance of these seals is unknown (Avigad 1965:222; Ornan & Sass 1992:63).

Marduk. Examples of these include bullae found at Ḥorvat ʿUza in the Beersheba Valley in Judah, at Qitmit in Edom as well as at Dor and Tell Keisan (Stern 2001:335).

A group of seal impressions (42 in total) stamped on clay jars, which has been found only in the region of Benjamin, bears either the full name *moṣah* (on the body of the jars) or the abbreviated form *mṣh* (on the jar handles) (Stern 2001:335). Of these, 30 were found in Mizpah, four each in Jerusalem and Gibeon, two in Jericho and one each in Ramat Raḥel and Belmont (Lipschits 2005:149-150). According to Avigad (1958:117-119), these labels represent the Benjamite town, Mozah (see Jos 18:26), and may have served one of three purposes: Mozah served as a tax collecting centre; the Mozah stamps may have been used as a trademark for any of the town's products, such as wine and honey; or Mozah was a royal estate that supplied products to the provincial governor. Avigad (1958:119) is of the opinion that this last suggestion is the most plausible, particularly if one takes into consideration that numerous *moṣah* impressions were found at Tell en-Naṣbeh, commonly, though still not positively, identified with biblical Mizpah, thereby possibly indicating that Mozah supplied products to Mizpah. Approximately 30 of these seal impressions were found at Tell en-Naṣbeh, one from near Bit Hanina, four from Gibeon, one from Zobah, four from Jerusalem and one from Ramat Raḥel (Stern 2001:336). If Mizpah is to be identified with Tell en-Naṣbeh, this site achieved prominence during the Neo-Babylonian period when the Babylonian-appointed governor made Mizpah the seat of his administration. The Mozah seal impressions have been dated to the Babylonian period by various scholars[102] based on this possibility as well as on the limited distribution of the impressions. Other scholars have dated the seals to the same period based on palaeographical grounds (Stern 2001:336).

Similar types of inscriptions have been found on 56 wine jar handles excavated at Gibeon (Stern 2001:336-337). The inscriptions bear the name of the town (*gbʿn*), the name of another site in Benjamin (*gdr*)[103] and some personal names (*ʾznyabu, ʾmryahu, hnnyahu, nrʾ* and *dmlʾ*). These inscriptions have been dated to the last days of the Judaean kingdom, the first half of the sixth century BC, by Pritchard (1960:29), while Cross (1962a:23) dates them broadly to the sixth century BC and Wright (1963:211, n. 1) dates them to the second half of the sixth century BC.

[102] Avigad (1972:8-9) and Zorn, Yellin & Hayes (1994:183).
[103] Pritchard (1960:25) believes that the meaning of *gdr* is 'walled enclosure' which refers to the vineyard. He also suggests that it may be a place name designating Gibeon as a section of a larger area, such as Stern (2001:336) does in associating *gdr* with the region of Benjamin.

According to Stern (2001:338), the limited distribution of the *moṣah* and Gibeon impressions as well as their palaeography indicate that these impressions were 'trademarks of wine produced in the tax-exempt governors' estates, including Mozah'. Nehemiah 3:7 mentions Gibeon as an estate of the governor of the 'Beyond the River' satrapy, a province during the Persian period.

(b) Coins

Other than a coin that was discovered in the tombs at Ketef Hinnom in Jerusalem, information on Babylonian-period coins in Palestine is non-existent (Stern 2001:340). The Ketef Hinnom coin is the earliest coin found in the region and is an East Greek coin from the island of Cos (Barkay 1984-5:1-2, 5). The coin has been dated to 550-500 BC (Barkay 1984-5:5).

### 3.2.3 The Persian period (539-332 BC)

#### *3.2.3.1 Historical background of the Persian conquest of Palestine*

Cyrus, king of Persia, conquered the Babylonians in 539 BC and took possession of their territory (including Syria-Palestine), but his rule differed to that of the Assyrians and Babylonians (Aharoni 1968a:356-357; Stern 2001:353). He allowed the exiles to return to their homelands and rebuild their towns and cities. The Jewish exiles were also included in this policy of liberalism. A passage on the Cyrus Cylinder, which accords with the biblical narratives in Ezra 1:2-4, records the Persian imperial policy as follows:

> ...I returned the [images of] the gods to the sacred centers [on the other side] the Tigris whose sanctuaries had been abandoned for a long time, and I let them dwell in eternal abodes. I gathered all their inhabitants and returned [to them] their dwellings... (Cogan 2000:315; Oppenheim 1969:315).

Cambyses II (530-522 BC), son of Cyrus, who was next in line, succeeded in annexing Egypt to the Persian Empire in 525 BC (Stern 2001:353-354). In return for water provided by the Arabs, the coastal strip between Gaza and the Egyptian border was exempt from paying taxes (Aharoni 1968a:358). While Cambyses was still in Egypt, a revolt broke out in Persia and he decided to return home to suppress the revolt, but died while en route (Stern 2001:354).

In spite of the fact that he was not a direct descendent or even a member of the royal family, Darius I (522-486 BC) became monarch after Cambyses (Stern 2001:354-355, 366).

Consequently, a number of rebellions broke out which he succeeded in suppressing. Darius continued to follow Cyrus's policy of allowing Jewish exiles to return to Palestine, even substantiating his strategy with a letter to Tattenai, the governor of 'Beyond the River' (Aramaic: *abar nahara*; Hebrew: *eber hanahar*), the name of the satrapy encompassing Palestine and Babylon (Ezr 6:3-12). During his reign, Darius also had to contend with revolts instigated by Egypt, Anatolia and Greece (Stern 2001:354-355). Under his rule, the Persian Empire became the largest of any empire in the Near East. He also developed an extensive road system, instituted a new taxation system and monetary unit and constructed major buildings. Darius divided the Persian Empire into twenty provinces (satrapies) and governors were appointed in each province. Zerubbabel, grandson of Jehoiachin, was appointed governor of Judah (515 BC) and he initiated the rebuilding of the temple in Jerusalem (Avigad 1976a:32-33). Only a short time after the work had begun, Zerubbabel disappeared suddenly, perhaps because Darius suspected him of plotting a rebellion. There is, unfortunately, no concrete evidence on how the region was governed after Zerubbabel's disappearance and before Nehemiah's appointment as governor of Judah in 445 BC. Stern (2001:355) proposes that Judah was ruled by Persian governors stationed in Samaria, while Avigad (1976a:34-35) suggests that the biblical account in Nehemiah 5 refers to Jewish officials who were exploiting their own countrymen by levying heavy taxes. These governors most likely included Elnathan, Yeho'ezer and Ahzai (see 3.2.3.3). Confirmation of this may be found on storage jars bearing the *yehud* seal impression together with the names of the aforementioned governors (see 3.2.3.3[b][ii]). According to Avigad (1976a:35), the purpose of these jars follows that of the *lmlk* jars of the Assyrian period (see 3.2.1.4[a][iii]).

Xerxes I (486-465 BC), the son of Darius I, ascended the throne of Persia after the death of his father (Stern 2001:355-356). Consequently, a revolt broke out in Egypt, which was eventually suppressed. According to Ezra 4:6, a letter of accusation was lodged with Xerxes against 'the people of Judah and Jerusalem' and it is believed that the Egyptian revolt was in some way connected to this. Another rebellion later broke out in Babylon, during which the satrap of 'Beyond the River' was killed. As a result, Palestine and Babylon were separated into two satrapies (Lipschits 2006:25; Stern 2001:355-356). The satrapy of 'Beyond the River' now comprised Syria, Phoenicia, Palestine and Cyprus (Aharoni 1968a:357; Stern 2001:368).

After Xerxes I was murdered by his vizier, Artaxerxes I (465-424 BC) became king (Stern 2001:356). Although an elder brother of Artaxerxes I should have become king, he was killed

by his brother at the instigation of Artabanus, the commander of the palace guard (Olmstead 1948:289). As a result of the internal conflict, a rebellion broke out, this time instigated by the Egyptians (Stern 2001:356-357). Persia, however, succeeded in crushing the rebellion. Artaxerxes continued to allow the Jewish exiles to return to Judah and in 458 BC, Ezra, the priest and scribe of the exiled Jewish community (Olmstead 1948:304), was appointed by Artaxerxes to re-establish religious and judicial order in Jerusalem (Ezr 7:25-26). In 448 BC, the satrap of 'Beyond the River' rebelled against the Persian monarch, but was quickly dealt with and subsequently removed from his post. After a request to Artaxerxes (Neh 2:1-5), Nehemiah, who was cupbearer to the king, was appointed governor of Jerusalem in 445 BC and was responsible for rebuilding the walls of Jerusalem, instituting new economic and religious laws and establishing Judah as an independent state, which led to the division between the Jews and the Samaritans who then constructed a separate temple on Mount Gerizim (Aharoni 1968a:358; Stern 2001:356-357).

Darius II (423-404 BC) became monarch of Persia after the death of Artaxerxes I (Stern 2001:357). A number of revolts then broke out in the regions of Media, Anatolia and Syria and the satrap of Egypt was sent by the king to suppress these revolts. However, during his absence from Egypt, a revolt broke out there as well. It was during this time (407 BC) that two extant letters were written and sent by the Jewish mercenaries in Elephantine to Bagohi, the governor of Judah, and to Delaiah and Shelemiah, the sons of Sanballat, the governor of Samaria (Porten 1996:139-144). The letters addressed the issue of the destruction of the Jewish temple in Elephantine by Egyptian rebels.

Artaxerxes II Memnon (404-358 BC) ascended the throne after the death of Darius II (Aharoni 1968a:359; Stern 2001:358-359). His younger brother, Cyrus, rose in rebellion against him and Cyrus was subsequently killed. During the conflict between the two brothers, the Egyptians once again rose in revolt and succeeded in destroying the Jewish military colony at Elephantine (see 4.7.5.3) as well as attaining independence from Persian rule, which lasted for the next one hundred years. From 366-360 BC, the 'revolt of the satraps' undermined the might of the Persian Empire, which led to renewed attacks by the Egyptians who succeeded in seizing Phoenicia and the coastal plain of Palestine. However, an internal rebellion in Egypt resulted in the restoration of the satrapy of 'Beyond the River' under Persian autonomy (Aharoni 1968a:359; Stern 2001:358-359).

Artaxerxes III (358-338 BC) succeeded in suppressing the revolt instigated by the satraps, but was unable to overcome Egypt (Aharoni 1968a:359; Stern 2001:359). This led to the king of Sidon, with the aid of the Egyptian pharaoh, initiating a rebellion against Persia. It appears as if the Phoenician leaders and their inhabitants were on opposite sides of this rebellion and, after their leaders betrayed the Phoenician inhabitants, the whole of Sidon was razed to the ground. The Persians then took their campaign once again to the Egyptians and, in 343 BC, succeeded in restoring the region under Persian autonomy (Aharoni 1968a:359; Stern 2001:359).

In 338 BC, Artaxerxes III was poisoned and was succeeded by Arses (337-336 BC), who was followed by Darius III (336-332 BC), the last Persian king (Stern 2001:360). After Alexander the Great defeated Darius III, he attacked Phoenicia, Palestine and Egypt, incorporating the whole of the Persian Empire within his kingdom. In 332 BC, Samaria revolted, as evidenced by records found in the Wâdi ed-Dâliyeh cave where some Samaritans took refuge; this revolt was, however, suppressed by Alexander (Stern 2001:360).

#### *3.2.3.2 The Persian transformation of Palestine*

After the widespread destruction caused by the Babylonians, the economic and social situation of Palestine was in a poor state (Stern 2001:303). In contrast to the Babylonians and Assyrians, the Persians allowed the exiles to return and rebuild their towns and cities (Stern 2001:353). Unfortunately, many sites are unable to provide a complete picture of Persian occupation in Palestine (Stern 2001:461-462). According to Stern, this may be due to three possible reasons: the upper strata at many sites that were abandoned after the Persian period have been destroyed by erosion; subsequent building activities during later periods destroyed Persian-period evidence; and many excavated areas have only yielded large administrative buildings, palaces or forts. In general, there is a sharp contrast between the settlement of the coastal areas and the inland areas (Lipschits 2006:28). The coastal areas continued virtually unchanged due to the maritime trade and Persia's interest in maintaining that trade (see 3.2.3.3), while inland, particularly in the hill country, urban life declined and surviving rural settlements continued to exist. This is evidenced by the establishment and expansion of administrative urban centres and the erection of forts along international trade routes (Lipschits 2006:30). These were manned by officials and garrisons who were responsible for collecting taxes, managing provincial affairs in accordance with the requirements of the Persian government and preparing expeditions. In contrast, the existing settlements in the hill

country were maintained only for their agricultural produce. In cases where a rural settlement became a key economic or production centre, the Persians administered it in isolation without assistance from the local inhabitants (Lipschits 2006:30).

Many settlements show two Persian-period phases while others show three or more phases. In the province of Megiddo, its capital, Megiddo, and Hazor show two phases, and at Tel Megadim in the province of Dor and at Ashdod in Philistia, three phases were identified (Stern 2001:374, 377, 390, 407). At Ashkelon in Philistia, five settlements phases were identified (Stern 2001:409). Two Persian-period strata with granaries and houses with domestic utensils were uncovered at Tell el-Mazar in the Jordan Valley as well as at Tell el-'Umeiri in Ammon where a provincial administration structure, dwellings and stamped jar handles bearing the name of the province of Ammon were found (Stern 2001:455-456). This indicates that Ammon was a separate province during the Persian era (Stern 2001:459).

Sites that were not settled during the Persian period are Umm el-Biyara in Edom and Ekron in Philistia (Stern 2001:408, 457). Sites that were occupied for only part of the Persian era include Bethel and Tell el-Ful in Judah (Stern 2001:432-433). Bethel shows Persian-period settlement during the sixth century BC with a second Persian-period phase from the fourth century BC, while Tell el-Ful was occupied during the sixth-fifth centuries BC and again during the third-second centuries BC (Stern 2001:432-433).

At Persian-period Megiddo, remains of a fortress, barracks and a residential area were uncovered (Stern 2001:376-377). The site was occupied throughout the entire Persian period and was destroyed in 332 BC by Alexander the Great (Stern 2001:378).

Dor, the regional and provincial capital of the province of Dor, was the most important port city along the Carmel coast during the Persian period (Stern 2000:149). A residential district with Phoenician-style walls was uncovered and stone-lined pits containing crushed snail shells and purple dye residue mixed with ash suggest a purple dye manufacturing business existed here (Stern 2000:161, 198-200; 2001:397). Attic ware, figurines, seals (mostly scarab-shaped), coins and ostraca with Phoenician inscriptions were also uncovered (Stern 2000:166-167, 190-193; 2001:398). Fortifications from the Assyrian period, used by the Persians, were destroyed in the mid-fourth century BC, probably when Sidon rebelled against the Persians. After this revolt, new fortifications were erected and the city prospered once again (Stern 2001:394-400).

The coastal area of Philistia included a number of important ports. At Ashkelon, a portion of warehouses that were excavated formed the largest known dog cemetery of the time (Stern 2001:409-410). The manner in which the dogs were buried suggests these animals were regarded as sacred, a typical Phoenician custom. At a nearby inland site, Tell el-Ḥesi, still within the territory of Ashkelon, construction projects and evidence of flour production indicate it functioned as a governmental grain storehouse (Stern 2001:411). A storage jar bearing a South Arabian monogram found at Tell Jemmeh in the Gaza region could indicate that caravans from Yemen passed through the settlement on their way to the port of Gaza (Stern 2001:412-413).

The western part of Samaria shows evidence of substantial settlement during the Persian period, although the sites were generally small in size (Dar 1992:928). Evidence shows that the province of Samaria and the northern region were destroyed during the siege of Alexander the Great (Stern 2001:5579). The two capital cities, Samaria and Shechem, were prosperous cities during the Persian period (Stern 2001:424, 427). Unfortunately, finds from Samaria are scant as, after its destruction by Alexander, the restoration that took place destroyed what was left. Among the finds are Aramaic ostraca, a Persian-style seal impression, a Neo-Babylonian seal, numerous coins and Attic ware (Stern 2001:425). Indications of Samaria's prosperity come from a cave in the Wâdi ed-Dâliyeh, where papyrus fragments dating up to 332 BC (see 4.7.4.1[b]; 4.7.5.4), bullae, gold signet rings, pottery vessels and coins were uncovered (Stern 2001:426).[104]

In the province of Judah at Jerusalem, after the destruction of the city by the Babylonians, settlement was concentrated in the City of David throughout the Persian period (Avigad 1976b:7; Stern 2001:435). On the eastern slope, a few building remains, pottery and seal impressions were found. In general, there are no material remains to indicate that Jerusalem was a distinctive urban centre during the Persian period (Lipschits 2006:31, 40). However, the wall built by Nehemiah, which surrounds the summit of the eastern hill and dates to the Persian era (Stern 2001:435), may indicate a change in the importance of Jerusalem for the Persian Empire from the mid-fifth century BC (Lipschits 2006:34). At this time, Jerusalem once again became the capital of Judah and the temple became not only an important religious

[104] The Wâdi ed-Dâliyeh documents, dating to the end of the Persian period, were legal documents found in a cave where wealthy inhabitants from Samaria sought refuge from Alexander the Great's army (Avigad 1997:34-35). Each document was sealed with several bullae bearing Greco-Persian motifs.

centre for the Jewish inhabitants, but also a centre for collecting taxes and executing other administrative duties on behalf of the Persian government (Lipschits 2006:38-39). Ramat Raḥel was possibly also one of the most important administrative and tax-collection centres during the Persian period, judging from the large number of Persian-period seal impressions, the largest and most varied group from this period found in one place, that was excavated at the site (Lipschits et al 2011:36). At Jericho, the discovery of Attic pottery, seal impressions and coins indicates Persian-period settlement (Stern 2001:438). A Persian-period papyrus document was also found in a cave located close to Jericho. The papyrus, which has been dated to the fourth century BC, contains a list of Jewish names and may be attributed to a rebellion during the reign of Artaxerxes III when Jericho was destroyed and the inhabitants exiled. At Gezer, no building remains were found in a Persian-period stratum, but seal impressions, weapons, Attic ware and incense altars were found (Stern 2001:440-441). A handful of remains found at Timnah indicate that it was only a small settlement during the Persian era (Stern 2001:442).

In the region of Idumaea,[105] ostraca discovered at Tel Sheva bear mixed Edomite, Arabic and West Semitic names, which is an indication of the mixed nature of the inhabitants (Stern 2001:451). These ostraca were used to record the collection of grain as tax payments (see 4.7.4.2[m]). The fortresses at Arad and Tell el-Kheleifeh most likely guarded the route from Arad to Eilat (Stern 2001:452). Aramaic ostraca, found at Arad and dated to the mid-fourth century BC, bear records of deliveries of grain, oil and wine to men and their animals (see 4.7.4.2[h]). These men probably belonged to the garrison force and operated a postal and transport service. Attic ware and ostraca bearing lists of names and serving as receipts of wine deliveries were also found at Tell el-Kheleifeh (see 4.7.4.2[e]) (Stern 2001:453). There are very few Persian-period settlements in the Negev (Stern 2001:454). Five settlements – at Ḥorvat Ritma, Ḥorvat Masorah, Naḥal Roʿah, Yatir and Beʾerotaim – which served as way stations for the garrisons who kept the trade route between Gaza and Egypt open have been found (Stern 2001:454).

The Egyptians rebelled against the Persians numerous times (Stern 2001:577). As a result, the coastal region, the Shephelah and the Negev became war-torn areas. The conflict between the brothers, Cyrus and Artaxerxes II, possibly helped the Egyptians gain control of these areas.

[105] Idumaea, the territory in the Negev that had been captured from Judah, encompassed southern Judah from Lachish and Marissa almost up to Beth-Zur (Stern 2001:443).

Numerous silos, storehouses and grain found at Tell Jemmeh suggest that the site served as a storage depot for the Persian army in preparation for their invasion of Egypt during the revolts (Stern 2001:412). The Persians succeeded in regaining control of the Shephelah in 380 BC (Stern 2001:378). A Persian-period shipwreck discovered off the coast of Maʿagan Mikhaʾel near Dor, which provides information about shipbuilding and maritime trade during the period, may be attributed to this conflict (Stern 2001:401-402, 578). Artefacts such as storage jars, utensils, carved wooden boxes, a carpenter's tool kit, rope, nails and food remains were found on the ship. On the eastern border of Judah, the site of En-Gedi, where the residential area appears to have covered the entire summit, was also destroyed, possibly as a result of the conflict (Stern 2001:438-439). A large house and possibly a workshop containing weights, bottles and stone implements were uncovered at the site. Other finds include Attic ware, vessels with impressions, lamps, seals and Aramaic ostraca. This Persian-period settlement was finally destroyed in 350-340 BC. Kadesh-Barnea, where an unfortified Persian-period fortress, local wares, Greek imports and a seal impression were discovered, was also possibly destroyed during the conflict since no Hellenistic remains were found at the site (Stern 2001:453).

Alexander the Great may also have been responsible for destroying sites in Phoenicia, Dor and Philistia. At Acco in Phoenicia, a large administration building, residential dwellings, silos, ovens, Attic ware and Persian-period coins have been found (Stern 2001:382-383). Remains of its first port were also discovered here. All these finds serve as evidence of the prosperity of the city during the Persian era. Coins similar to those found at the Wâdi ed-Dâliyeh may indicate that the site was destroyed by Alexander (Stern 2001:579). The inland sites of Nahal Tut and ʿEn Hofez in the province of Dor, where a fort, pottery, agricultural implements and weapons were found at each site, were agricultural settlements and served as administration centres during the Persian period (Stern 2001:400-401). Both sites were destroyed by Alexander as coins dating to 332 BC were found in the final occupation phase at each site (Stern 2001:579). Burnt debris and collapsed structures found at Ashkelon in Philistia provide evidence of a major destruction in approximately 300 BC, also possibly at the hands of Alexander (Stern 2001:579).

#### *3.2.3.3 The Persian administrative structure*

It is believed that, with the possible exception of additional new provinces, the internal administrative structure of Palestine as it was established during the Assyrian period

continued mostly unchanged during the Babylonian and Persian periods (Aharoni 1968a:359; Lipschits 2006:25; Stern 2001:369). During the Assyrian period, regions that were organised into provinces were Megiddo, Samaria and Dor in Palestine and Gilead, Hauran and Karnaim in northern Transjordan (see 3.2.1.2[a]). Possibly during the Babylonian period, new provinces, namely Judah, Ashdod, Idumaea, Ammon and Moab, were annexed, while the Qedarite Arabs ruled Gaza, the Negev and possibly Edom. However, since there is a lack of irrefutable evidence from the Babylonian period, this remains conjecture. Persian-period evidence for the existence of the provinces of Samaria, Ashdod, Ammon, Judah and possibly Moab and Dor can be found in the Bible (Ezra and Nehemiah), the Elephantine papyri (see 4.7.5.3),[106] the documents from the Wâdi ed-Dâliyeh (see 4.7.5.4), the Eshmunʿezer Inscription[107] and on coins, seals and seal impressions (Stern 2001:369-370). Furthermore, forts that were rebuilt by the Persians after destruction by the Babylonians attest to the existence of large autonomous administrative units along the Phoenician coast (Stern 2001:371). The Phoenician kings, though not receiving full political rights, enjoyed certain economic rights such as tax concessions. It was also important to Assyria that the maritime trade continued to the economic advantage of the empire (Lipschits 2006:27). Consistent with the Assyrian approach, the Arab tribes in the Negev and Sinai were not organised into administrative units, but the Persian Empire ensured that relations between them and these nomadic tribes remained secure by offering compensation to the tribes for protecting these remote areas (Stern 2001:371-372). Nonetheless, Persian-period fortresses were erected in certain areas, for example at Tel Sheva, Arad, Ḥorvat Ritma, Tell el-Kheleifeh and Kadesh-Barnea (Stern 2001:372).

A province (*pḥwh*) was an area under the rule of a larger unit, the satrapy (*pḥh*), although these terms, together with those for the titles of satrap and governor, were usually interchangeable (Aharoni 1968a:357; Stern 2001:370). The term for province was also interchangeable with *medintha* (‘state’), as can be seen in Ezra 5:8 where the province of Judah is referred to as *yehud medintha*. Another term for ‘province’ is *medinah*, a term used

[106] The Elephantine papyri, dating to the fifth century BC, were written in Aramaic and come from the Jewish military colony located in Upper Egypt (Avigad 1997:33-34). They comprise administrative and legal documents such as letters, contracts, deeds of sale and marriage deeds. The papyri were folded, tied with string and each sealed with a single bulla.

[107] Eshmunʿezer was the king of Sidon during the Persian period (Stern 2000:149). The inscription on his sarcophagus, which is dated to the late sixth century BC, reads: ‘The Lord of Kings gave to us Dor and Jaffa, the glorious cornlands which are in the field of Sharon’.

in Nehemiah 3. A province was further divided into districts (*pelekh*), which were sub-divided into half-districts (Stern 2001:370).

Sheshbazzar was the first post-exilic governor of the province of Judah appointed by Cyrus in 538 BC and he also bore the title 'Prince of Judah' (Aharoni 1968a:359-360; Avigad 1976a:35; Ezr 1:8; 5:14). In 515 BC, he was succeeded by his nephew, Zerubbabel, son of Shealtiel (Hg 1:1; Ezr 3:2; Neh 12:1).[108] Other governors of Judah included: Elnathan (late sixth century BC), mentioned on a bulla and seal from Jerusalem (see 3.2.3.3[b][ii]); Jehoezer and Aḥiyo (early fifth century BC), mentioned in seal impressions from Ramat Raḥel; Nehemiah (445 BC), mentioned in Nehemiah 5:14; Bagohi (408 BC), mentioned in the Elephantine papyri; and *yḥzqyh* (330 BC), mentioned on coins from Beth-Zur and Tell Jemmeh (see 3.2.3.3[c][v]) (Aharoni 1962:56-59; Avigad 1976a:7, 28-29, 35). Jehoezer and Aḥiyo most likely held the office of high priest as well (Aharoni 1962:58).

The biblical account also mentions the governors of the four provinces that bordered Judah, namely Samaria (Sanballat), Ammon (Tobiah), the Arabian district (Geshem the Arab) and Ashdod (the name of the governor of Ashdod is not mentioned), as adversaries of Nehemiah (Aharoni 1968a:360-361; Neh 2:19; 4:1-8). A silver vessel from a temple at Tell el-Maskhuṭah (Succoth) in the eastern Delta region, dating to the end of the fifth century BC, refers to Geshem as the king of Qedar (Cross 1955:47). Qedar is the name of a region that appears frequently in the Bible, for example in Jeremiah 49:28-33, and comprised the North Arabian tribes in the territory of Median. The region was formed by Geshem who conquered Moab, Edom and eastern Egypt. Tobiah was one of the heads of the Jews and related to the high priest, Eliashib, in Jerusalem (Mazar 1957:143-144). His home was located in Ṣôr in Gilead, in an area that was incorporated into the Ammonite province during the reign of Tiglath-pileser III. Although Tobiah lived in Transjordan, as governor of Ammon and due to his relationship with Eliashib, he exercised considerable influence in Jerusalem (Neh 6:17, 19). The names of the governors of Samaria are known from the Samaria papyri (Aharoni 1968a:360; Cross 1963:120-121). Their possible sequence has been reconstructed by Cross (1963:120-121) as follows: Sanballat I (ca. 445 BC); his sons, Delaiah and Shelemiah (ca. 410 BC); Sanballat II, son of Delaiah or Shelemiah (ca. 385 BC); Ḥananiah, son of Sanballat II (ca. 354 BC); and Sanballat III, son of Ḥananiah (ca. 334 BC).

[108] According to 1 Chronicles 3:19, Zerubbabel was the son of Pedaiah, a brother of Shealtiel.

According to Aharoni (1968a:361), the province of Megiddo must have continued to exist during the Persian period, although it is uncertain whether the city of Megiddo remained its capital, while the Phoenician harbour towns were placed under the control of the city governors of Tyre and Sidon. The Eshmunʿezer Inscription mentions the towns of Dor and Jaffa that were received from the Persian king (see n. 107); these two towns fell under the jurisdiction of Sidon. The harbour towns were of great importance to the Persian Empire due to their desire to expand maritime activity in order to be able to compete with the Greeks (Aharoni 1968a:361).

Information regarding the manner in which the Persian administrative organisation in Palestine functioned can be obtained from various artefacts, such as weights and measures, seals and seal impressions as well as coins.

(a) Weights and measures

A large stone weight inscribed *nsf* in Aramaic letters typical of the Persian period was found at Tel Shuqaf in the Shephelah (Stern 2001:197). However, this weight was much heavier than the *nsf* weight of the Judaean Monarchy of the seventh and sixth centuries BC. Unfortunately, it is not known to what weight system it belonged. Another weight found at the same site bears the inscription *pym*, but its weight of 112 g is more than the standard Judaean weight of 7.8 g for the *pym* weights (Stern 2001:572). The use of these earlier Hebrew terms may suggest that a local weight system was in use during the Persian period in Judah (Stern 2001:572).

It has been suggested that the weight system used by the Persians throughout their empire, including Palestine, comprised the following weights: 1 *karash* = 10 *sheqels*, 1 *sheqel* = 4 *reva* and 1 *reva* = $^{1}/_{4}$ *sheqel* = 10 *hallurin* (Cowley 1923:xxxi; see Stern 2001:572-573). A trilingual weight inscribed in Persian, Elamite and Babylonian, now housed in the British Museum [sa], bears the following inscription: 2 *kerashin* = $^{1}/_{3}$ *mina*, where according to the Elephantine papyri, 1 *mina* = 6 *kerashin* = 60 *sheqels* (Cowley 1923:xxxi; Stern 2001:573). Another two trilingual weights from Persepolis in Persia bear proportional equations: 120 *kerashin* = 20 *mina* and 60 *kerashin* = 10 *mina* (Schmidt 1957:105-107; see Stern 2001:573). According to Stern, this appears to support the likelihood that a standardised weight system was in use throughout the Persian Empire. Unfortunately, there is scant evidence in Palestine itself to support this. This evidence includes a document from the Wâdi ed-Dâliyeh (Papyrus

I), dated to 335 BC, which records the sale of a slave for 35 silver *sheqels* and includes a fine of 7 *mina* of silver if the agreement is not fulfilled (Cross 1974:19; Gropp 2001:32; see Stern 2001:573). Six ostraca from Idumaea mention the terms *sheqel* and *maʿah* (‘coins’) (Ephʿal & Naveh 1996:26, 62, 68, 82, 90; see 4.7.4.2[n]). Abbreviations were usually used: *sh = sheqel; r = reva;* and *m = mane* or *maʿah* (Stern 2001:573). Another find comes from Ashkelon where a Persian scale weight, comprising an incised bone case with lead filling, was found. The artefact weighs 1 *karsha* (10 *sheqels*) (Stern 2001:573). Rectangular stone weights were also found at Ashkelon in Persian-period contexts (Stager et al 2011:475). Two Mesopotamian-type bronze weights, each in the form of a duck with its head turned, were found in a Persian-period shipwreck off the coast of ʿAtlit in the province of Dor (Stern 2001:573). They weigh 10 *sheqels* (136 g) and 20 *sheqels* (228 g). Other weights of Phoenician origin include a lead weight from Ashdod-Yam (Figure 3.18), a dome-shaped weight from the ʿAtlit shipwreck engraved in Phoenician script and bronze weights from Ashkelon in the form of cubes and animals (Figure 3.19) (Stern 2001:573-575). According to Stern (2001:575), these weights have ‘many parallels in Palestine and Syria’.

Figure 3.18: A Phoenician lead weight from Ashdod-Yam (Stern 2001:574, Fig. III.64)

Figure 3.19: Bronze weight in the form of an animal (Stern 2001:574, Fig. III.64)

(b) Seals and seal impressions

Persian-period seals and seal impressions excavated in Palestine comprise three groups: imported seals from Babylon, Persia, Egypt and Greece; local seals which imitate the imported seals; and official seals (Stern 2001:535).

(i) Imported seals

Imported Babylonian seals are made from chalcedony or agate and are conical in shape with an octagonal face (Stern 2001:535). They may depict cultic scenes, representations of the

crescent and the sun or merely bear symbols. Babylonian seals were found in clear Persian-period contexts in Judah at Bethel and En-Gedi, in Philistia at Tell Jemmeh, at the city of Samaria and in Transjordan at Tell el-Mazar (see 3.2.2.3[a]), Khilda and Umm Uthainah (Stern 2001:536; Zorn 2014:832).

Persian seals belong mainly to the archives of the Persian administration and were mostly used to make impressions on bullae (Cross 1974:18-19; Stern 2001:537). A large assemblage of bullae was discovered in the Wâdi ed-Dâliyeh cave with a number of them still attached to the papyri. It is presumed that these papyri come from the official archive of the Samarian province and bear seals, which belong to witnesses who signed the documents. A few of these are also inscribed with the names and titles of officials, for example, 'Sanballat the governor of Samaria' (see Neh 4:1) and 'Yoḥanan' with the title of *sagna* ('official') (see Neh 2:16). The rest of the bullae are non-epigraphic and bear local, Babylonian-Persian or Greek motifs. The bullae that sealed the Elephantine papyri include Persian-style as well as Egyptian-style seals (Stern 2001:538). Other sites where bullae, both imported and local, have been found include Samaria, Shechem (Figure 3.20), Dor and Ashkelon. Unfortunately, finds of Persian cylinder seals are scarce, perhaps due to the fact that they were used to seal clay cuneiform documents (Stern 2001:539). Only one cylinder seal was found in a Persian-period fort at Tell el-Ḥer in northern Sinai (Figure 3.21).

Figure 3.20: A bulla from Shechem (Stern 2001:538, Fig. III.48)

Figure 3.21: The Persian-style cylinder seal from Tell el-Ḥer (Stern 2001:538, Fig. III.48a)

Imported Egyptian scarab-shaped seals have been found at numerous Palestinian sites and have been dated to the period from 685 to 380 BC (Stern 2001:539). One seal found at Gezer is inscribed with the name of Pharaoh Nepherites I (398-393 BC), while non-epigraphic seals depict Egyptian motifs (Stern 2001:539).

Imported Greek seals from the fourth century BC have been found in the coastal sites of Shiqmona, Dor and Jaffa (Stern 2001:554). They are stamped on amphora handles and contain Greek letters. Cypriot seal impressions have also been found at Kabri and Acco (Stern 2001:554).

(ii) Local seals

Inscribed seal impressions belonging to officials of the Judaean, Samarian and Ammonite administrations have been found on jar handles and bullae (Stern 2001:543). The Judaean seals bear the name of the province in Aramaic (*yehud*) as well as the names of the rulers of the province and occasionally their title, *peḥa* ('governor') (Naveh 1996:44; Stern 2001:544). Bullae from the province of Samaria (excluding those from the Wâdi ed-Dâliyeh) also mention the names and titles of officials (Stern 1992:41*; 2001:544). Two jar handles from Tell el-ʿUmeiri in Ammon bear a stamped impression with the names of the province (*ʿmn*) and an official, Shubaʾ (*šbʾ*), and therefore attest to the existence of the province of Ammon during the Persian period (Herr 1992:193; 1993:233; Stern 2001:544, 552).

Seals inscribed with personal names to designate ownership or office have also been found, although it appears as if the practice was not widespread during the Persian period (Stern 2001:544). Of the 128 seal impressions found at the Wâdi ed-Dâliyeh, only two bore a personal name: ...-*yhw bn (sn'-) blṭ pḥt šmrn* ('...iah, son of [San]ballat, governor of Samaria');[109] the other name mentioned is Ishmael (Cross 1963:111; Stern 2001:544). According to Cross, the first name most likely refers to Ḥananiah, son of Sanballat II. The appearance of personal names on Judaean seals is slightly more common. Sixty-five Persian-period bullae were found in or near Jerusalem and most of these bear a personal name, for example, 'belonging to Eleazar son of Nahum' or 'belonging to Baruch son of Shimei'

[109] The seal bearing the name of Sanballat appears on bulla No. 419 (Avigad 1997:176).

(Avigad 1976a:3, 8-9).[110] The latter appears on a large stone seal, a type that was usually suspended around the neck; these seals were used to seal tags on hide and clay jars (Stern 2001:545).

The practice of stating the occupation of the seal owner also continued during the Persian period (Stern 2001:545). Examples include a soapstone seal with a handle that is inscribed 'belonging to Shelomy the notary', a seal from Tell Qasîle in Phoenicia that reads 'Asaniyahu officer of the king' and a scaraboid black-stone seal that bears the inscription 'Shelomith the maidservant of Elnathan the governor' (Avigad 1976a:11-13; Smith 2008:237; Stern 2001:545-546). Due to the formulation of the text and its association with the 65 bullae from Jerusalem, Shelomith must have been a woman of high rank within the official hierarchy and may even have been the daughter of Zerubbabel (Avigad 1976a:13, 31-32; Stern 2001:546; 1 Chr 3:19).

Seal impressions bearing the name *yehud* in Aramaic have been found mainly in Judah and Benjamin at Gezer, Mozah, Nebi Samuel, Tell en-Naṣbeh, Tell el-Ful, Jerusalem, Ramat Raḥel, Ḥusan, Bethany, Jericho, En-Gedi and in the archive containing the 65 bullae mentioned above (Figure 3.22) (Aharoni 1962:5-7; Avigad 1976a:3-5, 10; Stern 2001:548; Ramat Raḥel Excavation Project [sa]). The *yehud* seal impressions have been divided into two main groups: (1) impressions on which the name of the province of Judah appears written as *yhwd* or abbreviated as *yhd*, *yh* or *h*[111] and may also include a monogram or the title of an official;[112] and (2) impressions that include the name of the province and a personal name or a personal name and a title. To date, only one whole seal from which the *yehud* impressions were made has been found (Stern 2001:548). It is conical in shape, approximately 36 mm long, is made of reddish limestone and is perforated for suspension around the neck. It has been suggested that the seals that include the title of governor (*peḥa*) or a royal monogram belonged to Jewish governors and those that include the province and personal names belonged to minor officials in the Judaean administration (Aharoni 1962:58-59; see Stern 2001:550). The latter group also includes seals that place the personal name in front of the province name, for example, the inscription 'Ḥanuna Yehud' was found on a seal impression

[110] The bullae in this post-exilic archive were purchased by an antiquities dealer in Jerusalem and no information regarding their provenance, other than they were found 'in the Jerusalem region', is known (Avigad 1976a:1).
[111] The impressions with *yh* and *y* are, according to Avigad (1976a:36), written in a 'degenerate, corrupt script' and should rather be dated to the period after Nehemiah. They were more likely imitations of the earlier impressions.
[112] Most of the seals that include the monogram are written in Hebrew (Stern 2001:548).

at Tel Ḥarasim on the western border of Judah as well as at excavations in Babylon (Naveh 1996:45). The seal impression may have belonged to one of the deportees or to an official in the Judaean administration and indicates trade or tax payments of oil or wine brought from Judah (Naveh 1996:46; Stern 2001:548).

Three different types of monograms were used on the *yehud* impressions: the first has the form of the Hebrew letter *ʿayin*; the second has the form of the number 8 lying on its side with open ends; and the third is round or lozenge-shaped and is either plain or divided by a crossbar or dot (the dot is known as the *tet* symbol) (Stern 2001:550-551). The first type of monogram, which also appears on the Judaean *sheqel* weights, possibly represents the royal *sheqel* on the *lmlk* seals as can be seen on a weight from Gezer which bears the word *lmlk* instead of the monogram. The *tet* symbol has been found on vessels from Elephantine together with the word *lmlk* as well as on fourth century BC storage jars from Shiqmona. Consequently, the *tet* symbol has also been designated a royal symbol. A variation of the *tet* symbol has also been found in seal impressions from Shechem in the province of Samaria (Stern 2001:550-551).

Figure 3.22: *Yehud* seal impressions (Stern 2001:549, Fig. III.54)

No seals or seal impressions bearing the name of the province of Samaria have been found on jar handles although the name does appear on bullae from the Wâdi ed-Dâliyeh (Stern 2001:552).

Phoenicia was an autonomous region ruled by the kings of Sidon and Tyre during the Persian period as evidenced by seal impressions discovered in the region (Stern 2001:552-553). Four impressions that were found consist of three lines each (Greenfield 1985:129-134).[113] The first line contains the word *ʿsr*, which probably means 'one-tenth' or tithe; the second line contains the name of one of the four Phoenician cities of Sarepta, Achshaf (possibly Tell Keisan), Beth Zayit and Liba' (a village east of Sidon); and the third line mentions the regnal year of Azmilk, the king of Tyre (347-332 BC). However, the last line of the fourth seal may contain the name of another king who might possibly be Baʿna (400-386 BC) or Baʿalusalim (386-372 BC). These seals may, therefore, refer to the payment of taxes in the form of a tithe to Azmilk. Seals and seal impressions found on jar handles or on the sides of jars that bear the image and emblem of the Phoenician goddess, Tanit, were excavated at Sarepta and Acco (Stern 2001:553). Her image also appears on Persian-period lead weights, which suggest that the impressions may be associated with temple administration (Stern 2001:553).

(c) Coins

The widespread use of coins during the Persian period is indicative of the growth of international trade (Stern 2001:555). The introduction of coins already began during the first half of the sixth century BC although there are very few coins from this period up to the first half of the fifth century BC (see 3.2.2.3[b]). However, the mention of a specific weight of silver in one of the Wâdi ed-Dâliyeh papyri (Papyrus I, see 3.2.3.3[a]) suggests that measured quantities of silver were also used as a means of payment during the fourth century BC (Stern 2001:555). The earliest document[114] mentioning coins as a means of payment dates to 400 BC and contains the following statement: 'the sum of 2 sheqels, that is, the sum of 1 stater', a stater being a form of Greek currency, first used in the form of ingots and later as coins (Cowley 1923:12-130; Stern 2001:555-556). According to Stern (2001:556), these documents confirm that measured quantities of silver were being used as currency alongside coins.

A number of different types of coins were in use during the Persian period in Palestine. These include Persian, Greek, Phoenician and Palestinian coins as well as coins from Cyprus, Syria, Anatolia and Egypt (Stern 2001:556). According to Stern, the three main weight standards

[113] Stern (2001:552) described the seals as having four lines each.
[114] Aramaic papyrus No. 35 is possibly a marriage/divorce settlement wherein the husband promises to pay the wife a specified sum by a certain date (Cowley 1923:129-130).

were the Persian, Athenian and Phoenician standards.[115] The Persian standard was based on the daric (gold) of 8.4 g, which was divided into 20 *sigloi (sheqels)*, a silver coin of 5.6 g. The Athenian standard was based on the tetradrachm (silver) of 17.5 g, which was divided into drachms of 4.2 g each. The Phoenician standard was based on the stater (silver) of 13.9 g, which was divided into 24 parts including the half-stater weighing 6.5 g. Local currency was based on either the Phoenician or the Athenian weight standard, of which the Athenian was the most commonly used (Stern 2001:556).

(i) Persian coins

The two principle Persian coins comprised a gold coin (the daric) and a silver coin (Stern 2001:557). The daric is mentioned in Ezra 8:27. The minting of coins by anyone other than the Persian kings was strictly forbidden. Only two Persian gold coins, belonging to Darius III, have been officially excavated in Palestine: one at the city of Samaria and the other in Transjordan, although a few more may be in private collections (Stern 2001:557-558).

(ii) Greek coins

The earliest Greek coin found in Palestine dates to 570 BC, that is, the Babylonian period (see 3.2.2.3[b]). Another coin, which has been dated to 555-545 BC and was minted in Athens, was found at Givʿat-Ram in Jerusalem (Meshorer 1961:185), while yet another, which was minted at Thasos and dates to the approximately the same period, was found at Shechem (Betlyon 2005:28-29; Stern 1982:218; 2001:559; Wright 1956:19-20). These few finds do not attest to the prevalence of Greek coins in use in Palestine during the Persian period, although several hundred Greek coins in private collections are said to originate from Palestinian sites (Stern 2001:559). Several coins were ostensibly found in the Wâdi ed-Dâliyeh cave (Cross 1963:116).[116] One of these is an Attic tetradrachmon which has been dated to the time of

[115] Harl (1998), on the other hand, mentions four principle weight standards used in ancient coinage: the *Aeginetic* (employed by the island of Aegina and the cities of the Peloponnesus and Central Greece); the *Attic* or *Euboic* (employed by Athens, Corinth and Sicilian colonies and cities in the Aegean); the *Persic*, the standard of the Lydian kings (employed by Persia and the Asian Greeks); and the *Phoenician* standard (employed in the Levant). In Aegina, the stater or principal coin used in trade was a *didrachma* (12,2 g); in Athens, the stater was a *tetradrachma* (17,2 g); the Persians used a gold *daric*, which was exchanged against 20 silver *sigloi* (the equivalent of 25 Attic *drachmae*); and the Lydian kings and Greek cities of Thrace and northern Asia Minor minted staters made of *electrum*, an alloy of gold and silver (the equivalent of 27 Attic *drachmae*).

[116] With the exception of Greek and Hebrew inscriptions on ribbed Roman ware and a cigarette box filled with papyri fragments written in Greek and Aramaic, all the evidence that was claimed to have been found in the

Philip II, father of Alexander the Great, and a second is a silver stater of Persic standard which was minted by Mazaeus, satrap of Cilicia during the reign of Darius III (336-331 BC) (Cross 1963:116).

(iii) Phoenician coins

The Persian administration granted permission to four Phoenician cities, namely Arwad, Byblos, Sidon and Tyre, to mint silver and bronze coins (Betlyon 1982:137; 2005:16, 48; Stern 2001:559). Tyrian and Sidonian coins are commonplace at excavations in Palestine, particularly in the northern coastal region at sites such as Acco, Tell Keisan, Tell Abu Hawam, ʿAtlit, Dor and Tel Michal, although they have also been found at inland sites such as Hazor, Megiddo, Samaria, Shechem, Gezer, Lachish and Jerusalem as well as at southern coastal sites such as Ashkelon (Betlyon 2005:14, 33, 49; Bijovsky 2009:31; Johns 1933:56; Lambert 1933:2, n. 2; Stern 2001:559). However, coins from Arwad and Byblos are relatively scarce (Betlyon 2005:48; Stern 2001:559). The earliest Phoenician coin found in Palestine comes from Tell Keisan and has been dated to 450-444 BC (Stern 2001:559-560). Although a few Phoenician coins date to the fifth century BC, most are dated to the fourth century BC. Significant hoards of coins that have been found are as follows (see Stern 2001:561): 64 Sidonian coins and one Tyrian coin from Beth Yeraḥ/Khirbet el Kerak (Baramki 1943:86);[117] 109 Tyrian coins from Tell Abu Hawam (Cross 1963:118, n. 18; Lambert 1932:10-20; Thompson, Mørkholm & Kraay 1973:205);[118] three Tyrian and seventeen Sidonian coins from Abu Shusheh near Gezer (Lambert 1933:1; Stern 2001:561); several Tyrian coins and one Sidonian coin from the Wâdi ed-Dâliyeh cave (Betlyon 2005:49; Cross 1963:116); 25 Tyrian coins from Acco as well as Sidonian, Arwad and Anatolian coins (Kindler 1967:79*); fifteen Tyrian coins and one Athenian coin from near Moshav Dalton in Upper Galilee (Gitler & Tal 2014:243); 131 Tyrian coins included in the hoard of 965 coins from Shechem (Thompson et al 1973:205); and 32 Tyrian, 43 Sidonian and eleven Arwad coins included in the hoard of 334 coins from Samaria (Eshel 2007:228; Meshorer & Qedar 1991:65-80).

Wâdi ed-Dâliyeh cave did actually come from the cave (Cross 1963:116). Consequently, Cross makes the assumption that this applied to the coins also purported to have come from the cave.

[117] The Sidonian coins from Beth Yeraḥ/Khirbet el Kerak bear the names of the last two kings of Sidon, namely Euagoras II and Straton II (Baramki 1943:86).

[118] Stern (1982:220; 2001:561) mentions that 119 coins were found in the Abu Hawam hoard. Based on the other sources, this may be a typing error.

(iv) Cypriot, Anatolian and Egyptian coins

Only a few coins that were minted in Cyprus have been recovered, although many local Palestinian coins are imitations of the Cypriot coins (Lambert 1933:1-2; Stern 2001:561). Cilician (Anatolian) coins, probably minted by the Persian satraps of Abar Nahara, were found in the hoard from Acco as well as in the hoard from Shechem (see 3.2.3.3[c][iii]). Egyptian coins from the Persian period were minted in gold and silver and, although only a few have been found in Egypt itself, they were most likely in circulation in the coastal areas of Palestine during the period of Egyptian rule in the region (Stern 2001:561). Other coins that were minted in Egypt, but are imitations of Athenian coins, have only been found outside Palestine (Mørkholm 1974:1-2). These coins bear the inscription 'Artaxerxes Pharaoh' and refer, most likely, to Artaxerxes III, who probably struck the coins after his conquest of Egypt in circa 343 BC (Mørkholm 1974:3).

(v) Palestinian coins

Palestinian coins from the Persian period have been found mainly at coastal sites, but also at inland sites and in Transjordan and have been dated to the fourth century BC (Stern 2001:562). The majority are non-epigraphic, while others have a place name inscribed on them, such as the names of the cities of Ashkelon (abbreviation: *an*), Ashdod (full name: *ashdd* or abbreviation: *ash*) and Gaza (full name: *ʿza* or abbreviation: *ʿz*) and the names of the provinces of Judah and Samaria and, in some cases, personal names (Stern 2001:564-565). No coins with the full name of Ashkelon have yet been recovered. On many of the coins inscribed with one of the three city names appears the Greek name *athe* ('Athens'). These coins are imitations of the Athenian coin (Stern 2001:564).

Judaean coins are inscribed with name of the province, *yehud*, or its abbreviation, *yhd*, and have been found at Jerusalem, Ramat Raḥel, Beth-Zur and Jericho as well as at sites farther afield, such as Tell Jemmeh in Philistia and Mount Gerizim in Samaria (Avigad 1976a:28; Betlyon 2005:49; Stern 2001:565). The coins have been dated to the fourth century BC on the basis of a group of coins from Beth-Zur and Tell Jemmeh that were also inscribed with the personal name, *yḥzqyh*, either alone or with the title *peḥa* ('governor') and bearing Athenian motifs. *Yḥzqyh* has been identified as Ezekias who was a governor of Judah during the Persian period and continued in office as high priest after the conquest by Alexander (Avigad 1976a:29; Stern 1982:226). Several coins belonging to priests have also been found, such as

one bearing identical emblems to the *yḥzqyh* coins, but with the inscription *yehoḥanan hakohen* ('the priest') (Betlyon 2005:49; Stern 2001:567). Stern is of the opinion that this could indicate that Yehohanan was an important person, possibly the high priest at the time that *yḥzqyh* was governor. Another high priest whose name appears on coinage is *yadoa*, who could possibly be Yadoa II, father of Yehohanan II, or his son, Yadoa III, who was high priest when Alexander the Great conquered Palestine in 332 BC (Stern 2001:567). These coins suggest the possibility that a mint was connected to the temple at Jerusalem. An unusual silver coin, weighing 3.29 g and measuring 15 mm in diameter, depicts pagan Greek motifs of a bearded male wearing a Corinthian helmet on the one side of the coin and a bearded male riding a winged chariot and holding a falcon in his left hand on the other side, together with the abbreviation *yhd* (Betlyon 2005:49; Meshorer 1982:26; Stern 2001:567). The helmeted head is similar to the one shown on silver coins issued by two Persian satraps of Abar Nahara, Farnabazus and Datames, between 378 and 373 BC while they were preparing to reconquer the Egyptians (Betlyon 2005:49; Stern 2001:568). Consequently, it has been proposed that the aforementioned silver coin could possibly have been minted by one of the two satraps to pay the Judaean mercenaries who were in the employ of the Persian army (Betlyon 2005:49; Stern 2001:568). Meshorer (1982:27) prefers to allot the minting of the coin to Bagoas, who was governor of *yehud* during the reign of Artaxerxes II (404-359 BC), since the style of the coin resembles others that were presumably minted by him.

Numerous Samaritan coins which were minted in the province of Samaria during the fourth century BC have been recovered in the city of Samaria, its surroundings and in the Wâdi ed-Dâliyeh cave (Betlyon 2005:49; Stern 2001:569). In addition to Tyrian, Sidonian and Arwad coins (see 3.2.3.3[c][iii]), the Samaria hoard also comprises 182 Samaritan coins, while the Shechem hoard comprises another 625 Samaritan coins (Eshel 2007:228; Meshorer & Qedar 1991:65-80; Thompson et al 1973:205). The coins from Samaria bear very similar, or in some cases identical, motifs to those found in seal impressions on bullae. Inscriptions that appear on the coins include the name of the province, *Šmryn*, or its abbreviated forms, *Šmry* or *Šmrn, Šmr, Šm, Šn* or *Š*, as well as the names of the governors of the province, namely Sanballat, Delayah and Ḥananyah (Meshorer & Qedar 1999:19-20, 22-23, 26-27; Stern 2001:570). Unknown names (*Yrbʿm, Ḥym, Yhw'nh* and *'Bd'l*), Phoenician names (*Bdyḥbl*) and Persian names (*Bgbt* and *Mzdy*) also appear on the coins (Meshorer & Qedar 1999:20-21, 23-24, 27; Stern 2001:570).

## 3.3 CONCLUSION

Although the Assyrian conquest of Palestine resulted in extensive destruction and the deportation of many of its inhabitants, the Assyrians proceeded to introduce new settlers, reconstruct most of the areas they had destroyed and, as evidenced by excavations, introduce their culture and way of life to Palestine. There is substantial evidence of the administrative and economic processes of the Assyrians in Palestine as can be seen from the numerous bullae, seal impressions and weights found in excavations. These artefacts suggest that a well-organised hierarchical administrative structure was in place, one that ensured that the Assyrian state received what was due to them. In contrast, the Babylonians sought mainly to destroy most of what the Assyrians had rebuilt, deported many of the inhabitants without replacing them and left those remaining to fend for themselves. This resulted in minimal evidence of Babylonian occupation in many areas, which in turn provides little concrete knowledge of their manner of administration. The main body of evidence comes from the region of Benjamin, which remained mostly intact throughout the Babylonian period. After defeating the Babylonians, the Persians, on the other hand, were more tolerant of their conquered subjects. This is evidenced by the return of the Israelites from exile and the support offered by the Persians for the rebuilding of the temple as well as many towns and cities together with the establishment of industry and international trade in the region. As with the Assyrian period, seal impressions and the weight system of the Persian period provide information on the Persian administrative structure in Palestine. Together with the full-scale introduction of coinage during the Persian period, they also provide information on the expansion of international commerce in the region. All these factors point to the necessity for keeping track of receipts and distributions, as will be demonstrated in the following chapter.

# CHAPTER FOUR

## ACCOUNTING PROCESSES IN PALESTINE DURING THE FIRST MILLENNIUM (1000-332 BC)

### 4.1 INTRODUCTION

Writing most certainly plays an important role in any society and, though there is evidence that records were kept in Palestine, what importance, if any, did *accounting* itself as an autonomous skill, not merely as recordkeeping, enjoy in the region? Does the available evidence from these periods indicate that what is referred to as 'recordkeeping' by scholars can actually be regarded as 'accounting'?

It is possible that Palestine, being a newer nation-state than that of Mesopotamia from where the Assyrians, Babylonians and Persians originated, may have experienced some influence from the surrounding regions regarding the manner of administration and the development of accounting systems. Furthermore, being subject to foreign rule under the Assyrians, Babylonians and Persians from approximately 732 BC should also have had some effect on the manner in which these systems further evolved in the region.

Epigraphic and archaeological evidence reflecting the manner in which economic transactions were recorded was produced mainly as a result of the requirements of the various centralised polities in Palestine, which required that records be kept of state affairs such as the collection of taxes and the distribution of supplies for the upkeep of state, religious and military resources. Unfortunately, much of the evidence dates from the ninth century BC and later – there is not much evidence from the time of David and Solomon. There is, however, reasonably abundant epigraphic evidence from the Assyrian, Babylonian and Persian periods. The only significant archives discovered in Palestine include the Lachish, Arad and Samaria Ostraca and the Wâdi ed-Dâliyeh papyri, but even these are limited in scope when compared to evidence from other Near Eastern cultures. The evidence that will be discussed in this chapter includes dockets, ostraca, tablets and papyri from Palestine as well as from Syria and Egypt since these have a bearing on recordkeeping and accounting processes in Palestine. Only artefacts denoting commercial transactions are pertinent to this study and will, therefore, be discussed.

## 4.2 SCRIPTS AND LANGUAGES

The terms ‘script’ and ‘language’ do not carry the same meaning (Rollston 2010:3). More than one language can use the same script, for example, the Latin script can be used to write French and Dutch and the Greek script to write in both the Greek and Coptic languages; also, ancient Hebrew and Aramaic texts were both written in the Phoenician script.

Linear alphabetic inscriptions (see 4.3.1) from the Iron Age can be divided into two basic script categories, namely lapidary and cursive (Rollston 2010:3). Two of the main characteristics of a lapidary script are letter clarity and uniformity of letter form and size. Lapidary inscriptions normally appear on prepared surfaces, such as stone, resulting in a slower development of the script. In contrast, the cursive script, normally written on papyrus and pottery, features variations in letter form and size due to the rapidity with which it is written, which in turn leads to a more rapid development of the script. The script also displays a more prominent stroke curvature and compact letter spacing (Rollston 2010:3).

## 4.3 THE EMERGENCE OF WRITING

### 4.3.1 The earliest alphabetic inscriptions

Inscriptions that were found at Serabiṭ el-Ḫadim in the Sinai were originally regarded as a local barbaric form of hieroglyphics (Rollston 2010:12). Petrie (1906:131), however, later determined that these inscriptions, which were based on Egyptian hieroglyphics, formed the earliest linear alphabetic signs and dated them to circa 1500 BC. Gardiner (1916:13, 16), instead, preferred a date in the early eighteenth century BC. Another early alphabetic inscription on a potsherd, consisting of three letters and dated to circa 1800-1630 BC, was found at Gezer (Rollston 2010:15). A bronze dagger inscribed with a personal name was discovered at Lachish, while an inscribed bowl, dated to circa 1200 BC by Cross (1980:3), was found at Qubur ʾel-Walaydah near Gaza (Rollston 2010:15-16). These finds indicate that the earliest alphabetic inscriptions date to the early second millennium BC and the latest of these early alphabetic inscriptions date to the late second millennium BC (Rollston 2010:16).

### 4.3.2 Alphabetic cuneiform

In addition to the linear alphabet, alphabetic cuneiform was developed from approximately the last quarter of the second millennium BC (Rollston 2010:16). Alphabetic cuneiform was employed by scribes in Ugarit, but tablets from the Late Bronze Age have also been discovered at Taanach, Beth-Shemesh and Nahal Tabor (Albright 1964:53; Cross 1968:41-42; Rollston 2010:17). As a result of consonantal mergers where consonants attested in both the early alphabet and the Ugaritic cuneiform alphabet were merged with other consonants from these alphabets towards the end of the Late Bronze Age, some consonants disappeared and the Northwest Semitic alphabet was left with only 22 letters (Rollston 2010:18).

### 4.3.3 Proto-Canaanite/Canaanite script

An ostracon found at ʿIzbet Sartah, possibly biblical Ebenezer located in the Ephraim hill country and one of the earliest Israelite settlements, has been dated to the first half of the twelfth century BC and contains five lines of writing, one of which forms an abecedary (Cross 1980:8, 12; Naveh 1978:31, 33, 35).[119] Naveh (1978:33) refers to the script as Proto-Canaanite or Canaanite, which later developed into the Phoenician script. Unfortunately, the rest of the writing is of such poor epigraphic quality with numerous errors that Naveh (1978:35) maintains it cannot be used to draw any palaeographic conclusions, much less the nationality of the writer. Crenshaw (1998:103), however, goes so far as to say that it cannot be an Israelite who made the inscription since the nearest town to the site where it was found, Aphek, was occupied by the Israelites only from the eleventh century BC. An inscribed potsherd from Iron I was found in a tomb near Manahat (Stager 1965:46-48). Four letters in linear Canaanite script (*lšdḥ*), written from right to left, were inscribed after firing. The potsherd is most probably part of a storage jar and, according to Stager (1965:48), provides important comparisons between the Canaanite and early Phoenician scripts.

[119] Kochavi (1977:5) and Demsky (1977:19) believe that the abecedary forms the last line of the inscription and that it was written from left to right. Naveh (1978:32) asserts that the abecedary forms the first line and that it was written from right to left. Cross (1980:9) supports Kochavi and Demsky's hypothesis.

### 4.3.4 The standardisation of script

Until approximately the mid-eleventh century BC, other developments also occurred: the stance of the letters was standardised and sinistrograde (right-to-left) was consistently applied to the direction of writing, which led epigraphers to refer to this new form of the early alphabet as the Phoenician script (Rollston 2010:19). Prior to this, the direction of writing varied between sinistrograde, dextrograde (left-to-right), boustrophedon (lines written from left-to-right, then right-to-left) and columnar form (Rollston 2010:19). Early Phoenician inscriptions dating to the tenth century BC have been found at Byblos: the Azarbaʿal Inscription on a bronze spatula, the Ahiram Sarcophagus royal inscription, the Yehimilk Inscription inscribed on a stone tablet, the Abibaʿal Inscription inscribed on a statue of Pharaoh Sheshonk I and the inscription of Elibaʿal inscribed on a bust of Pharaoh Osorkon I (Rollston 2010:19-23). Other early Phoenician inscriptions, also from Byblos and dated slightly later, possibly to the very early ninth century BC, include the Shipitbaʿal Inscription and the ʿAbda sherd (Rollston 2010:23-24).

### 4.3.5 Phoenician inscriptions outside Phoenicia

Phoenician inscriptions have also been found outside the borders of Phoenicia (Rollston 2010:27-41). A bronze fluted-bowl inscribed with four words was found in a burial cave at Kefar Veradim located in Upper Galilee and has been dated by Tappy et al (2006:30) to no later than the end of the eleventh century BC and by Rollston (2010:27) to the early tenth century BC. On the other hand, Van der Veen (2015:194) suggests a date later than the tenth century BC on the basis of the form of this type of bowl, for which the closest parallels come from Assyria (mid-ninth century BC), Tell eṣ-Ṣafi (Stratum A3 – late ninth century BC) and Lachish (Stratum III – late eighth century BC). Nonetheless, according to Rollston (2010:27), the quality of the script reflects the work of a professional scribe, thus demonstrating that Israelite scribes first used the Phoenician script. The Gezer Calendar has been dated by Albright (1943b:18) to the second half of the tenth century BC, a date supported by Cross (1980:18, n. 16). Albright based his date on the script, which he claimed ‘fits best into the epigraphic record during the second half of the tenth century B.C.’, but other than stating that the inscription was written in classical Hebrew, he did not specify whether he regarded the script as Phoenician or possibly the fledgling Old Hebrew script. Kutscher (1982:67) and Naveh (1982:76) do not believe that the Gezer Calendar was written in Hebrew due to the absence of Hebrew linguistic features. Gibson (1971:1-2) refers to the language as an ‘archaic

[Hebrew] dialect', Cross and Freedman (1952:47) classify it as a Northern Israelite dialect and Young (1992:374) regards the style of the language as 'Archaic Biblical Hebrew'. Cross (1980:14) asserts that these two scripts of the tenth century BC are so similar that it is difficult to determine in which script the Gezer Calendar was written. Rollston (2010:30-31), on the other hand, dates the tablet slightly later to the late tenth-very early ninth centuries BC and regards the script as distinctly Phoenician since certain markers of the Old Hebrew script are missing from the inscription. At Tel Zayit, located in the Shephelah region just north of Lachish, an abecedary was discovered that has been dated by Tappy et al (2006:5, 26) to the early tenth century BC and by Rollston (2010:32) to the late tenth or very early ninth centuries BC. Rollston asserts that the abecedary is written in Phoenician script, while Tappy et al (2006:27-28) maintain it is a transitional script between the Phoenician and Old Hebrew scripts that shares a commonality with the Gezer Calendar in terms of script, a view shared by Hess (2006:342). On the other hand, Rollston (2010:35) posits that the usage of the Phoenician script during the tenth and early ninth centuries BC indicates that the Old Hebrew script had not yet been developed.

### 4.3.6 The development of a distinct Hebrew script

A distinct Old Hebrew script developed from the Phoenician script during the ninth century BC (Rollston 2010:42). According to Aharoni (1968c:10), an ostracon (No. 76; see 4.7.1.1) displaying the earliest stages of the Hebrew script was found at Arad, which he regards as contemporaneous with the Gezer Calendar (late tenth century BC). Conversely, Rollston (2010:42) states that the Mesha Stele (mid-ninth century BC), found in Moab and written in the Moabite language, reveals the earliest evidence of the Old Hebrew script and he provides another example of the script, namely the inscription mentioning Mesha's father, Kemošyat. According to Rollston, both are easily distinguishable from the Phoenician script. In his opinion (2010:43), this reflects a 'distinct scribal tradition in ancient Israel', one that developed as a result of the nascent Israelite nation and which was intended as 'a nationalistic statement, not merely an evolutionary development'. This view is supported by Naveh (1978:34) who also maintains that 'an independent Israelite scribal tradition' was established only from the mid-ninth century BC. The Samaria Ostraca (see 4.7.1.2), which may be either tax receipts written by the Samarian administration for agricultural items received by them or records of agricultural items dispersed as payment to administration officials, are written in the Old Hebrew script and, according to Rollston (2010:67), date to the early eighth century BC. Kaufman (1982:235) follows a similar dating, namely, the reign of Jeroboam II (first half

of eighth century BC). At Arad, a Judaean fortress during most of the Iron Age, a hoard of ostraca, approximately half of which were written in the Old Hebrew script, was found (see 4.7.1.1; 4.7.2.1[f]) (Aharoni 1968c:9). Many of them represent letters which display the epistolary opening formula and contain personal names (Rollston 2010:67). Others concern orders to provide bread and wine to certain individuals, together with the quality and quantity provided. These have been dated from the tenth century BC to the early sixth century BC (Aharoni 1968c:9-10, 13). The Lachish Letters were written by a military officer stationed at an outpost near Lachish and were addressed to the garrison commander at Lachish (King & Stager 2001:242). They have been dated by Albright (1936a:15) to 589 BC and concern military matters during the final days of the Judaean kingdom: 'And let him [my lord] know that we are waiting for the fire signals of Lachish, according to all the indications which my lord hath given, for we cannot see Azekah' (Letter 4) (Albright 1936a:13-14).

### 4.3.7 Aramaic inscriptions and the Phoenician script

Prior to the ninth century BC, Aramaic inscriptions were written in Phoenician script (Rollston 2010:44). One of the earliest examples of the Aramaic script can be seen in the stele of Bar-Hadad, king of Damascus, found near Aleppo in Syria, which is dated to the mid-ninth century BC (Naveh 1982:80). According to Naveh (1970a:14-15; 1982:78-80), at this stage the script was not dissimilar to the Phoenician script, but from the mid-eighth century BC the script began to develop its own characteristics. Examples of this independent Aramaic script include the Sefire Inscriptions, dated to the mid-eighth century BC (Naveh 1970a:8), and some of the Arad Ostraca (see 4.7.4.2[h]), dated from circa 400 BC, which contain some personal names and quantities of wine, oil, flour and silver (Aharoni 1968c:9-11). The Deir ʿAlla Plaster Texts have been dated by Naveh (1982:109), who maintains they are written in the Aramaic script, to the mid-eighth century BC. Cross (1973:12-14), however, argues that the script is Ammonite and that they should be dated to the early seventh century BC.

### 4.3.8 Other scripts found in Israel

Other scripts are also attested in ancient Israel. An inscribed incense altar was found at Tell Mudeyineh in Transjordan (Rollston 2010:62-63). The script reflects characteristics of the Moabite script and has been dated to 800-750 BC. The Tell Siran bottle, made of bronze and written in the Ammonite language and script, has been dated to the sixth century BC (Rollston 2010:64). Other examples of the Ammonite script come from ostraca found at Heshbon.

Naveh (1966:30; 1982:102-105) asserts that the Edomite script is a mixture of Hebrew, which was first adopted by the Edomites, and Aramaic, which influenced the development of the script when the Assyrians conquered Palestine. Examples include ostraca from Ḥorvat ʿUza (see 4.7.2.1[g]) and Tell el-Kheleifeh/Elath (see 4.7.4.2[e]).

## 4.4 WRITING MATERIALS AND TOOLS

Northwest Semitic inscriptions were inscribed on various media: stone, metal (iron and bronze), papyrus, vellum, plaster and clay. Each medium required specific tools, such as pen and ink, a chisel and incising tools (Rollston 2010:47, 112).

A reed pen (*ʻēt sōperîm*) and ink (*děyô*) were used on pottery or else the inscription could be incised on fired pottery using a sharp stylus (*ʻēt barzel*) which required precision and, therefore, a steady hand (Rollston 2010:72-73). An example of this is the Old Hebrew Barley Letter from Samaria (ca. 722 BC) which was incised on a glazed piece of pottery (see 4.7.1.3). Inscriptions on unfired pottery were easier to make and were incised when the clay was leather-hard. An inscription from Tel ʿIra is such an example. Fired pottery could also be incised using a chisel (also *ʻēt barzel*), as evidenced by a potsherd also from Tel ʿIra. Inscriptions were also made on jar handles (Rollston 2010:73-74). Some scholars have dated the inscribed jar handles found at Gibeon (see 2.4.4.2) to the early sixth century BC. Cross (1962a:23), for example, suggests that, based on the script, circa 600 BC is the earliest possible date for the handles. Rollston (2010:74), on the other hand, argues that they should rather be dated to the late eighth or early seventh centuries BC, while Pritchard (1964b:23) dates the handles broadly from the eighth to the sixth centuries BC.

Papyrus was usually chosen when it was necessary for a permanent record to be kept, such as contracts, marriage licenses, deeds of purchase and divorce certificates (Rollston 2010:74-75). A scribal knife (*taʻar hassōperîm*) was used to cut parchment or papyrus. The Murabbaʿat Papyrus, an Old Hebrew papyrus dating to the first half of the seventh century BC (Cross 1962b:34), is referred to as a 'palimpsest', in other words, a document from which the original text was scraped off and then reused to write a different text. Ancient papyri, once completed, were rolled, fastened with a string and sealed with a small piece of soft clay (Rollston 2010:75, 77). The seals of the relevant parties were then impressed onto the wet clay. These impressed clay pieces are referred to as 'bullae'. The papyri were then stored in archives and, if it was necessary at some stage to peruse the contents, they were taken out and

the seal broken. In many instances, a copy was made of the original papyrus and this was used instead of breaking the seal of the original. Sealed papyri have been discovered at the Jewish colony at Elephantine (from the late sixth-early fifth centuries BC to ca. 400 BC) (see 4.7.5.3) as well as in the Wâdi ed-Dâliyeh cave near Samaria (late fourth century BC) (see 4.7.5.4) and bullae have been found throughout Palestine at places such as the City of David and Lachish (see 2.3.3.1[b]). Bullae usually bear an inscription or iconography or both on one or both sides (Rollston 2010:78).

## 4.5 THE ROLE OF SCRIBES

According to Stone (1969:285), the scribe fulfilled an important role in the economic life of ancient civilisations. Concrete evidence for the education of scribes in Palestine is, unfortunately, not very clear and this has been interpreted in various ways by different scholars.[120] Rollston (2010:85, 92, 94, 113) posits that the scribe was 'a respected member of the elite class' and suggests that 'the presence of a mechanism for the formal, standardized education of scribal elites in ancient Israel' existed and maintains that this mechanism comprised mainly the state. The various scripts used in Palestine, mainly the Phoenician and Old Hebrew scripts, as well as the use of hieratic numerals and the specialised writing materials and tools required (see 4.3-4.4) indicate, according to Rollston (2010:113), that 'the production of formal, standardised, and sophisticated epigraphs necessitates the presence of formal, standardised scribal education'. This is in line with the view of Davies (1995:210-211) who states that, at least until the eighth century BC, the evidence does not indicate 'a widespread educational system', but that formal teaching took place mainly in capital cities and administration centres. In spite of the existence of formal scribal education, Rollston (2010:116) posits that it did not take place in buildings dedicated to the purpose, but rather that it may have taken place in a domestic context, such as the home of a scribe where the scribe taught his son and other young relatives. 'Scribal families' would, therefore, have existed as is evidenced by some of the Elephantine papyri mentioning a scribe named Nathan as well as his two sons, Ahio and Mauziah, who were also scribes (Rollston 2010:123).

The importance of scribes is also attested in numerous instances in the biblical record, for example: 2 Kings 12:4-16 records an audit that was requested by the king regarding the silver

[120] Regarding the evidence for the existence of schools in Palestine, see Crenshaw (1985:601-615), Davies (1995:199-211) and Rollston (2010:91-114).

collected for the repairs of the temple when the priests failed to carry out the repairs; the scribe occupied an important position in David's government (2 Sm 8:16-17); David's uncle was 'a counsellor, a wise man, and a scribe' (1 Chr 27:32); and in Ezra 4:8-24, Shimshai, the scribe, wrote a letter to Artaxerxes which resulted in the Persian king consenting to Shimshai's request and giving him the authority to carry out his orders.

## 4.6 LIBRARIES AND ARCHIVES

Niditch (1996:61) differentiates between libraries and archives. Libraries are 'repositories for literary and scholarly texts' while archives are 'holdings of letters, contracts, deeds, dockets, and other records'. One possible example of archival material includes the Lachish Letters (see 4.7.2.1[i]),[121] the script of which, according to Reider (1939:226), 'is a careful and beautiful cursive, showing the characteristics of a literary tradition of centuries'. He asserts that the different forms of letters used attest to the letters being written by different scribes, which he believes suggests that writing was 'practiced by many people'. A second example is the Samaria Ostraca (see 4.7.1.2). Kaufman (1982:233) regards the script as a 'superb example' of early cursive writing. Other excellent examples include the Arad Ostraca (see 4.7.1.1; 4.7.3.1[f]; 4.7.5.2[h]), the hoard of inscribed bullae found in the burnt residential quarter of the City of David (see 2.3.3.1[b]) and the Wâdi ed-Dâliyeh papyri (see 4.7.5.4) (Niditch 1996:61-62). However, Niditch (1996:63) posits that since ostraca were not meant for 'long-term, systematic record keeping' and should rather be regarded as 'the scratch paper of the ancient Near Eastern world', the Samaria and Arad Ostraca rather 'reflect "waste basket" material' and should, therefore, not be classified as archives. She, furthermore, asserts that no libraries from ancient Israel have been discovered nor are they specifically mentioned in the Hebrew Bible. In contrast, Schniedewind (2000:328) equates the biblical 'scribe's chamber' (Jr 36:10, 12, 20-21) with scribal administrative buildings which are attested in the archaeological record. Building remains which form part of administrative structures attached to palaces have been discovered at Megiddo, Samaria (where the Samaria Ostraca were found) and Hazor (Herzog 1992:229-230).

[121] Most of the letters concern military and political matters wherein a certain Hoshaʿyahu defends himself against accusations concerning his part in the death of a prophet, Uriyahu. Consequently, these are not relevant to this study and will, therefore, not be discussed. For detailed studies and discussions on the Lachish Letters, see Albright (1936a, 1938, 1939, 1941), Cross (1956), Gordon (1937, 1938, 1945) and Torczyner (1938). However, two of the ostraca from Lachish may be pertinent to this study (see 4.7.3.1[i]).

Although cuneiform tablets have been found in Palestine, no archives of them have been discovered and the individual finds do not amount to nearly as many as those found in Syria, Egypt and Mesopotamia (Cohen 2008:83). According to Cohen (2008:84-85), this may be due to the reason that the use of cuneiform was not as prevalent in Palestine and the fact that sites in Palestine were, more or less, continuously settled in contrast to sites, such as Ugarit and Amarna, that were abandoned for very long periods of time. This then allowed these archives to remain undisturbed awaiting discovery. During the Bronze Age, a number of finds attest to the general use of cuneiform in Palestine, such as Taanach, Hazor, Aphek, Ashkelon, Megiddo, Beth-Shean, Gezer, Hebron, Jericho and Shechem (Cohen 2008:83-84). However, the finds from the Iron Age are drastically reduced. Isolated finds occur at Hadid (see 4.7.5.1), Tell Keisan (see 4.7.2.3[b]), Samaria (see 4.7.2.3[c]) and Tel Mikhmoret (see 4.7.4.3[a]). These were written either by the royal administration or by deportees (Cohen 2008:84).

## 4.7 EPIGRAPHIC EVIDENCE OF ACCOUNTING IN PALESTINE

### 4.7.1 Evidence from the tenth-seventh centuries BC

#### *4.7.1.1 Arad Ostraca*

A large number of Hebrew, Aramaic, Greek and Arabic inscriptions were found in various strata on the citadel mound at Arad (Aharoni 1981:3-4). Of the 88 Hebrew inscriptions, fifteen are whole, 25 are partly preserved, only a single word is preserved in another 28 and only a single letter in the remaining twenty. Of the 85 Aramaic inscriptions, 45 have been preserved in part, but the script of the rest is virtually illegible. The Hebrew and Aramaic inscriptions that are relevant to this discussion comprise administrative documents dating from the tenth century BC (Stratum XI; see 2.2.2.2[e]) until the fourth century BC (Stratum V; see 2.3.2.9) (Aharoni 1981:4, 9).

The earliest Hebrew ostracon (No. 76) was discovered in Stratum XI (tenth century BC) in a building east of the temple and is only partially preserved; it contains seven lines of script comprising some names with amounts of grain noted down next to each name (Figure 4.1) (Aharoni 1968c:10; 1981:5, 98):

1. Son of …
2. Son of … *ḥeḳat* 10
3. Son of … 100 *ḥeḳat*
4. *ts*
5. *qt*
6. *zg* [*ḥeḳat*] 2[0]
7. *g*

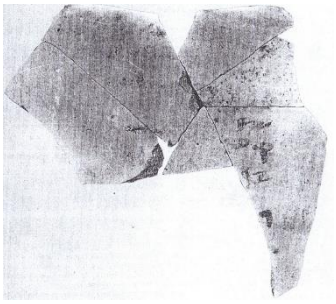


Figure 4.1: Arad ostracon No. 76 (Aharoni 1981:99)

Another ostracon (No. 79) from Stratum XI bears the last part of a personal name followed by the letter *bet* and three strokes, the first of which is the abbreviation for the *bath* measure and the last two represent the number '2' – '…*aḥ* 2 *baths*' (Aharoni 1981:100).

Of the ostraca from Stratum X (ninth century BC), only two (Nos. 67 and 72) may possibly bear information regarding the issue or receipt of commodities (see Aharoni 1981:93, 96). Only portions of personal names have been preserved on Ostracon Number 67, each followed by the number '1' or '2'. Ostracon Number 72 contains five rows of names and numbers:

1. Nakonyahu 2, Menahem 1
2. Pepi 1, Aḥimelek 1
3. Gada 1, (no name) 3
4. ʿUzza 3
5. (no name) 2.

Ostracon Number 60, found in a Stratum IX (eighth century BC) building located between the storehouse and the temple, may concern the weighing of an amount of grain, either barley or wheat, as denoted by *ḥeḳat*, the measure for grain (Aharoni 1981:90):

*Obverse*
As all … I took (or weighed) 2+25 *ḥeḳats*
Shebanyahu 1
Mikneyahu, give to Gab-

*Reverse (continuation of previous line)*
[-riyahu] 6.

Some of the ostraca (Nos. 50-57) from Stratum VIII (late eighth century BC) concern the administration of the temple at the site and bear only names of recognised Levite priests (Aharoni 1981:87; Herzog et al 1984:32). According to Aharoni (1981:87), the texts of these ostraca may refer to the assignment of priestly duties in the temple. Another ostracon (No. 42) mentions the receipt of an unknown quantity (*lethech*) of a commodity from a place named Yagur, which is mentioned in Joshua 15:21 (Aharoni 1981:76). Ostracon Number 49 was found in the building next to the entrance of the temple and is part of a bowl on which rows of

numbers and names, one of which (Korah) is a well-known Levite family name and another (Gilgal) is the name of the sanctuary near Jericho, were written (Aharoni 1981:81). Aharoni (1981:148) suggests that the names and numbers may be a list of offerings for the temple.

#### *4.7.1.2 Samaria Ostraca*

(a) Dating

Sixty-three ostraca, written in Palaeo-Hebrew script, were found by the Harvard Expedition at Samaria in the Ostraca House (see 2.3.2.4) (Crowfoot, Crowfoot & Kenyon 1957:9; Kaufman 1982:231). Based on the years inscribed on the ostraca (ninth, tenth, fifteenth and possibly seventeenth), they have been dated by various scholars to the reigns of Jehoahaz (Maisler 1948:131), Jehoahaz and Jehoash (Shea 1985:16), Jehoash and Jeroboam II (Aharoni 1968a:323-324; 1970:42; Rainey 1988:69), Jeroboam II (Birnbaum 1942:108; Cross 1975:8; Kaufman 1982:235) or Menahem (Yadin 1961b:22-23; 1962:66). The differences between the two groups of ostraca are summarised as follows (Shea 1985:13-14) – ninth and tenth year ostraca are referred to as Group 1 and fifteenth year ostraca as Group 2:

- Group 1 mentions commodities, but not Group 2 (except for No. 44);
- Group 1 generally mentions only one personal name, but Group 2 mentions two personal names, the second of which is not preceded by *lamed*;
- Clan names appear only rarely in Group 1, but frequently in Group 2;
- In Group 1, town names appear at the beginning of the date formula, but at the end in Group 2;
- The personal names do not overlap between the two groups;
- Patronyms are used rarely in Group 1, but frequently in Group 2;
- Hebrew numerals are used in Group 1, but hieratic numerals are used in Group 2.

Since the date of the ostraca determines their historical significance and purpose, it is important that this is first established (Shea 1977:17). However, as the discussion below will demonstrate, this is nigh to impossible and only speculations regarding this can be made.

Kaufman (1982:231-234) considers the evidence from three different angles, namely, archaeological, palaeographical and the use of Egyptian hieratic numerals. The ostraca were found in the fill of the floor of the corridors behind the Ostraca House (see Figure 2.6), which was later modified and eventually destroyed in 722/721 BC. Based on this information, Kaufman (1982:231-232) advises a ‘mid-century’ date for the ostraca. Furthermore, the level

in which the ostraca were found antedates the appearance of water decanters which first appeared in Pottery Period VI (Crowfoot et al 1942:108; Kaufman 1982:233). As only a small amount of pottery can be attributed to Pottery Period V, which Kenyon (in Crowfoot et al 1957:199) associates closely with that of Pottery Period VI, most of the ostraca has been assigned to Pottery Period IV. Crowfoot et al (1957:470) attribute the Pottery Periods as follows: IV – from the beginning of the eighth century BC, V – within the first half of the eighth century BC, and VI – the last half of the eighth century BC. This correlates approximately with Tappy's (1992:253) conclusions. Holladay (1976:271), on the other hand, attributes the periods as follows: IV – circa 842-760 BC, V – circa 760-745/735 BC, and VI – circa 745/735-722 BC. From a palaeographical point of view, the writing on the ostraca reflects the beginning of cursive writing using a split-reed pen and ink (Kaufman 1982:233; Yeivin 1960:205). By studying the development of the Palaeo-Hebrew script during the ninth and tenth centuries BC and by comparing the script on the Samaria Ostraca with that of the Mesha Stele (ca. 840 BC), a group of inscriptions from Kuntillet Ajrud (ca. 800 BC) and a later group of ostraca found at Samaria from Pottery Period VI (see 4.7.4.2[l]), Kaufman (1982:233-234) proposes placing the ostraca in the second quarter of the eighth century BC. The numerals for '5' and '10' that appear on the ostraca for the fifteenth year are hieratic numerals, as proved by Aharoni (1966b:17-18), and not for the numbers '4' and '5' in the Old Hebrew script, as originally proposed by Yadin (1961b:20-21) (see 3.2.1.4[b][i]). It is, therefore, necessary to find a king who ruled for at least fifteen years during the ninth to eighth centuries BC. The kings who qualify are Jehoahaz/Jehoash and Jeroboam II (see Table 4.1). Shea (1985:16) suggests attributing the ninth and tenth year ostraca to Jehoahaz based on the different date formulae used in these ostraca compared to that of the fifteenth year ostraca which he attributes to Jehoahaz's fifteenth year, at the time when his son, Jehoash, was serving as co-regent. The designation of the ostraca to two kings is also supported by Rainey (1988:69-71) and Aharoni (1968a:323-324) who suggest that the fifteenth year ostraca be attributed to Jehoash and the ninth and tenth year ostraca to Jeroboam II. They, therefore, switch the two groups in contrast to other scholars, placing the fifteenth year ostraca earlier than those from the ninth and tenth years. In spite of the differences, Kaufman (1982:238) maintains that 'cursive developments' appear in the ostraca from all three years. Consequently, he (1982:234) dates the ostraca from all three years to the time of Jeroboam II (early-mid eighth century BC). Shea (1985:14) has taken Kaufman's concerns regarding the script as well as the differences between the two groups into consideration and suggests that, due to a political development, the first group should be attributed to Jehoahaz and the second group to Jehoash. This political development he attributes to the initial adoption by the

northern kingdom of the Egyptian practice of co-regency, which he maintains led to the use of hieratic numerals in the second group. Galil (1996:50), on the other hand, suggests that Jehoahaz already served as co-regent with his father, Jehu, and was crowned during Jehu's 23rd year at a time of Aramean expansion when Jehu needed to strengthen his reign and ensure the continuity of his dynasty. This is also supported by Yeivin (1979a:152) and Na'aman (1986b:92). Consequently, the precise dating of the ostraca remains enigmatic, but they can be dated broadly from the late ninth to the mid-eight century BC.

(b) Function

The texts on the ostraca include regnal years, sixteen place names, seven clan names, several personal names and the commodities of oil and wine; however, not all the texts include all the information (Table 4.1)[122] (Aharoni 1968a:315, 318-321). According to Reisner et al (1924:231-232), the ostraca are only temporary notes that accompanied the commodities and contain only the minimum required information.

| No. | Date | Place | Clan | '*l*-men'[123] | 'non-*l*-men' | Commodity |
|---|---|---|---|---|---|---|
| 1. | 10 | *Poraim | | to *Shamaryau | Pega (son of )<br>Elisha<br>Uzza (son of)<br>Kabesh<br>Eliba<br>Baala (son of)<br>Elisha<br>Yedayau | 2 jars (*nebel*) of old [wine][124]<br>1<br><br><br>1<br>2<br><br>1 |
| 2. | 10 | *Azzah | | to *Gaddiyau | Abibaal<br>Ahaz<br>Sheba<br>Meribaal | 2<br>2<br>1<br>1 |
| 3. | 10 | | Shemida | to [. . .]a<br>Baala A[. . .] | | jar of [ol]d wine |
| 4. | 9 | *Kozoh | | to Gaddiyau | | jar [of old wine] |
| 5. | 9 | *Kozoh | | to [Gaddi]yau | | jar of old wine |
| 6. | 9 | *Kozoh | | to Gaddiyau | | jar of old wine |
| 7. | ? | ? | | to Gaddi[yau] | | [jar of o]ld wine |
| 8. | 9 | Geb[a] | | [to Ahino]am | | jar of [ol]d [wine] |
| 9. | 9 | *Yazith | | to A*h*inoam | | [j]ar of old wi[ne] |
| 10. | 9 | *Yazith | | to Ahinoam | | jar of old wine |
| 11. | | | | [to Ahi]noam | | [j]ar of wine |

[122] The names marked with an * are non-biblical names or ones that differ from known biblical forms; the other proper names are given in their biblical form (Aharoni 1968a:317).
[123] Aharoni (1968a:318-321) uses the words 'recipient' and 'sender' in the place of '*l*-men' and 'non-*l*-men' respectively. Since there is disagreement among scholars on whether the '*l*-men' were the owners or the recipients of the goods and the 'non-*l*-men' were the senders or merely servants of the owners, I have opted to use the terms '*l*-men' and 'non-*l*-men', being terms that all scholars agree on.
[124] Aharoni (1968a:318-321) uses the spelling *nebel*, while Stern (2001:199; see 3.2.1.4[b][iii]) uses *nevel*.

| No. | Date | Place | Clan | ‘*l*-men’ | ‘non-*l*-men’ | Commodity |
|---|---|---|---|---|---|---|
| 12. | 9 | *Siphtan | | to *Baalzemer | | jar of old wine |
| 13. | 10 | *Tetel (?) | Abiezer | to *Shamaryau to *Aś[a ?] | | jar of old wine [? ] |
| 14. | 9 | A[zn]oth-*Par’an | | to *Shamaryau | | jar of old wine |
| 15. | | Hazeroth | | to [. . .] | | jar [of . . .] |
| 16. | 10 | Sepher | | to *Gaddiyau | | jar of fine oil |
| 17. | 10 | *Azzah | | to *Gaddiyau | | jar of fine oil |
| 18. | 10 | Hazeroth | | to *Gaddiyau | | jar of fine oil |
| 19. | 10 | Yazith | | to Ahinoam | | jar of fine oil |
| 20. | 10 | *Cherem-hatte[l] | | | | [jar of] fine oil |
| 21. | 10 | *Tetel (?) | | to *Shamaryau | | jar of fine oil |
| 22. | 15 | Hazeroth | Helek | to *Aśa (son of) Ahimelech | Helez | |
| 23. | 15 | Hazeroth | Helek | to *Aśa (son of) Ahimelech | Helez | |
| 24. | 15 | [Ha]zeroth | [He]lek | to *Aś[a] (son of) Ahime[lech] | Rapha (son of) *Anmes | |
| 25. | | Hazeroth | *Hele*[k] | to *Aśa (son of) A]himele[ch] | Ahazai | |
| 26. | | Ha[zeroth] | [Hele]k | to *Aśa (son of) [Ahimelech] | [Hele]z (son of) H[. ? .]n | |
| 27. | 15 | Baal-meon | Helek | to *Aśa (son of) Ahimelech | *Baala (the) Baalmeonite | |
| 28. | 15 | *Elmattan | Abiezer | to *Aśa (son of) Ahimelech | *Baala | |
| 29. | 15 | Sepher | She[mida] | [to] *Aśa (son of) Ahimelech | *Ke*dar | |
| 30. | 15 | | Shemida | to Helez (son of) Gaddiyau | Gera (son of) *Hannia*b* | |
| | | | | | | |
| 31. | 15 | | Shemida | to Helez (son of) *Aphzech | *Baala (son of) Zecher | |
| 32. | 15 | | She<m>ida | to Helez | *Ahima | |
| 33. | [1]5 | | Shemi[da] | to Helez (son of) *Gaddiyau | . . . ? | |
| 34. | 15 | | [Shem]i[da] | [to Helez (son of) *Ga]ddiyau | . . . ? | |
| 35. | 15 | | She[mida] | to Helez (son of) *Gaddiyau | | |
| 36. | | | Shemid[a] | | [Ge]ra | [o]ld wine |
| 37. | 15 | | Shemida | to *Ahima | *Aśa (son of) *Baalzecher | |
| 38. | 15 | | Shemida | to *Ahima | *Ullah (son of) Ela | |
| 39. | 15 | | Shemida | [to] *Ahima | [*Aś]a (son of) [Baalzecher?] | |
| 40. | | | Shemida | to ? | | |
| 41. | | | | | . ?.sha (son of) *Egliyau | |
| 42. | 15 | *As(h)ereth | <A>srie[l] | to *Yedayau | *Meronyau (son of) Gaddiya[u] | |
| 42. | 15 | *As(h)ereth | <A>srie[l] | to *Yedayau | *Meronyau (son of) Gaddiya[u] | |
| 43. | (h ?) | | | [to] Hannan . . . | El . . . | |
| 44. | 15 | | Shechem | | | wine |
| 45. | 15 | *Yaz[ith] | Hogla[h] | to Hanan (son of) Ba[ar]a | [*Meron]yau (son of) Nathan | |

| No. | Date | Place | Clan | '*l*-men' | 'non-*l*-men' | Commodity |
|---|---|---|---|---|---|---|
| 42. | 15 | *As(h)ereth | <A>srie[l] | to *Yedayau | *Meronyau (son of) Gaddiya[u] | |
| 43. | (h ?) | | | [to] Hannan . . . | El . . . | |
| 44. | 15 | | Shechem | | | wine |
| 45. | 15 | *Yaz[ith] | Hogla[h] | to Hanan (son of) Ba[ar]a | [*Meron]yau (son of) Nathan | |
| 46. | 15 | | | to Hanan (son of) Ba[ara] | | |
| 47. | | *Yazith | Hoglah | to Hanan (son of) Baara | ? | |
| 48. | 15 | *Yashub | <A>srie[l] | to *Yedayau (son of) Ahimelech | Joshua | |
| 49. | | | [Shemid]a | to He[lez (son of *Gaddiyau] | ? | |
| 50. | 15 | | Noah | to Gomer/ Gemariah | *Obadyau to *Uriyau | |
| 51. | 10 | | | | *Aha the Judea[n] | |
| 52. | 15 | | | | *Abiyau | |
| 53. | 10 | *Cherem-hattel | | | | wine, in a jar of fine oil |
| 54. | 10 | *Cherem-hattel | | | | wine<br>jar of fine oil |
| 55. | 10 | *Cherem-Yeḥo-eli | | | | jar of fine oil |
| 56. | 15 | *Hatt[el] | | to Nimsh[i] | | |
| 57. | | | Shem<i>da | Abda | ? | |
| 58. | 15 | *Cherem-hattel | | to *Bedeyau | | |
| 59. | | | | | | jar of f[in]e oil |
| 60. | | *Cherem-Yeḥo-el[i] | | | | |
| 61. | 15 | *Cherem-hattel | | | | |
| 62.[125] | | | Shemid[a] | | | wine |
| 63. | 17[126] | ? | Shemid[a] | | | |

Table 4.1: Information contained in the Samaria Ostraca (Aharoni 1968a:318-321)

One group of names is preceded by the preposition *lamed* (termed '*l*-men'), and the second group has no preposition (termed 'non-*l*-men') (Cross 1975:8-9). Eight of the twelve '*l*-men' appear more than once and are associated in many cases with more than one place or clan name. The place names denote the origin of the commodity and either precede or follow the name of the '*l*-man'. In the case of the 'non-*l*-men', who are further identified with a patronymic (a name derived from a father or paternal ancestor), a gentilic (a name with ethnic or national affiliation) (Reader's Digest Universal Dictionary 1987:638, 1135) or a town of origin, the place names follow after their names. In instances where their names appear more than once, these occur with the same '*l*-man' and/or the same town. All the clan names appear in the Bible as the descendants of Manasseh and all the place names are located in the

[125] Nos. 62 and 63 are jar labels (Reisner et al 1924:227-228).
[126] Kaufman (1982:235) states that the number should be read as 'at least 12 and no more than 14'.

northern part of Mount Ephraim, the traditional territory of the tribe of Manasseh (Aharoni 1968a:324). Aharoni posits that the region may have been an administrative district and Samaria its capital.

There are basically two schools of thought regarding the Samaria Ostraca: those who view the ostraca as tax payments received from owners of estates and those who maintain they are records of shipments from an owner's estate to the owner for his subsistence in the city of Samaria. A third possibility springing from the tax receipt theory is that the '*l*-men' are tax officials; however, according to Rainey (1979:91) and Kaufman (1982:236), this reflects a disorganised tax collection system since in years nine and ten, one tax collector is responsible for three towns and one clan (Ostraca 1, 13, 14 and 21), while in Ostraca 13 and 21, two tax collectors are responsible for one town. Also in Ostraca 29, 30, 31, 37 and 57 from year fifteen, five tax collectors are allocated to one clan.

Rainey (1979:91-92) views the ostraca as records of shipments to the owners of estates as part of their income from those estates which were either inherited by them or were granted to them by the state. The fact that the ostraca record only small quantities of a commodity may indicate that the owners were either in Samaria for a short 'tour of duty' or that, since the city would not have provided sufficient storage for every owner's produce and each owner's own storehouses would, consequently, have rather been located in his own district, the quantities were meant to serve their immediate needs. Furthermore, if the owners were in the employ of the state, it is not unreasonable to presume that the commodities were delivered via the royal storehouse. Rainey (1967:36-38, 40) compares this to the practice at Ugarit where grants of land were made to loyal subjects who then received the income from the land as payment for their services to the state. The ostraca that do not denote a recipient may indicate that those commodities were meant for the state. 2 Samuel 9:7-10 may illustrate the practice of receiving income from inherited land: David gave the son of Saul, Mephibosheth, all his father's property, the income from which was to be used to provide food for him even though he could 'always eat at my [David's] table' (see Rainey 1967:39; 1979:92). The entry in David's records may, therefore, have recorded the year of David's reign, the place name as 'Gibeah', the '*l*-man' as 'Mephibosheth', the 'non-*l*-man' as 'Ziba, steward of Saul' and the relevant commodity (Rainey 1979:92). In concurrence with Reisner et al (1924:231-232) mentioned above, Rainey (1979:91) refers to the Samaria Ostraca as 'scratch-pad notations' that were summarised at a later date on papyrus, thereby possibly indicating the reason for discarding the ostraca. In addition, he (1979:93) emphasises that the *lamed* in the Samaria Ostraca refers

to the recipient and not to the sender as suggested by Yadin (1959:185), who applies the same meaning of *lamed* as in the *lmlk* inscriptions, that is, 'belonging to', to the Samaria Ostraca. Rainey (1967:33), however, explains that the *lamed* of ownership does not necessarily indicate 'sender'. Herzog et al (1984:31) support this view based on the use of *lamed* in the Arad Ostraca to designate recipients.

This theory is also supported to a certain extent by Niemann (2008:251-252, 262), who maintains that the ostraca do not reflect state administration since they concern only the palace and its immediate surroundings and, consequently, cannot be regarded as tax receipts. They do, however, accentuate a personal relationship between sender and receiver. Niemann (2008:264), therefore, posits that elite members of the surrounding clans were invited to reside at the palace for a short period, occasionally receiving additional supplies from their family units. The idea behind this was 'a royal attempt at aligning, influencing and controlling tribal elites' to obtain their loyalty.

Cross (1975:9-10, n. 25), who supports the tax receipt theory, suggests that the '*l*-men' are the owners of estates, either commercial or military officers who received parcels of land as a reward for their services and, consequently, also received the income from that land. The 'non-*l*-men' are their tenants or servants who are attached to a single estate and who deliver the produce as payments of tax made by their owners. It is possible that copies of these tax receipts were given to the owners as proof of payment so that, in cases where the name of a 'non-*l*-man' is omitted regarding the delivery of one or two jars, it is to be assumed that 'the receipt is proof enough of his full delivery' (Cross 1975:10). Another scholar who agrees that the ostraca are tax receipts is Kaufman (1982:237). He suggests that, since the ostraca were recorded on carefully broken sherds, not on whole jars, and since they were documented in the city of Samaria and not at the place of origin of the commodity, they cannot be regarded as 'directives for delivery'. Consequently, they must be records of commodities received as some form of tax from the owners of the estates, the '*l*-men'. As Kaufman (1982:237) notes, 'this tax went toward the maintenance of high living in the royal palace of Jeroboam II, whose reign was noted for lavish use of wine and cosmetic oil'. I would venture to suggest that, if the ostraca were intended as tax receipts, the *lamed* could well have referred to the owner of the goods as the sender, as Yadin (1959:185) asserts and as Cross (1975:10) implies, and the 'non-*l*-man' was merely the person who delivered the goods on behalf of the owner to the crown. If, however, the ostraca were intended as shipments for delivery to the owners via the royal storehouse, I disagree with Cross (1975:10) since the recording of the delivery could

well have originated at the royal storehouse. On the other hand, if no delivery note accompanied the goods from their point of origin to the storehouse, this allows for the possibility of fraud. However, this could, to a certain extent, be circumvented if a copy of the receipt was handed to the 'non-*l*-man' to take back with him.

Nevertheless, Nam (2012:123-124) is of the opinion that both the tax receipt and redistribution theories 'reflect a growing centralization in northern Israel' and offers yet a third possibility for the purpose of the ostraca, a variation of both theories. He asserts that the motivation behind the ostraca was to garner political support through the redistribution of goods. The ostraca refer to old wine and fine oil, which require extra effort and resources to produce. Since aged wine goes through multiple fermentation stages, it requires valuable storage and production facilities. Fine oil is extracted from washing the first batch of oil with water and then skimming the higher grade top layer. This top layer amounts to only a small quantity per batch and thereafter, the oil is processed further for general use. Consequently, Nam (2012:124) maintains that the crown used these two specialised commodities for gifts and for building social relations. The small quantities mentioned in the ostraca may reflect this. Furthermore, the geographic distribution of the ostraca covers an area within a day's journey around the capital city, but is concentrated to the west, an area that was plagued by bandits. These commodities were, therefore, procured by the crown and redistributed to neighbouring tribal leaders to solidify political relations, a practice Nam (2012:124) refers to as 'competitive feasting'. Irrespective of whether the '*l*-men' were senders or recipients, Nam (2012:125) believes that the ostraca 'show an inward distribution of product to the capital city of Samaria'.

Other than citing a change in administration, none of the above scholars, with the exception of Shea (1985:16-18), address either the reason why the order of information on the ostraca was changed or why no commodities are mentioned in the second group of ostraca. In Group 1, the order is the date, the name of a town preceded by 'from', the name of a person preceded by *lamed* and the commodity, either wine or oil. In Group 2, the order is the date, a clan name preceded by 'from', the name of a person preceded by *lamed*, a second name and the name of a town, but no commodity. In Shea's (1985:16-17) opinion, the first group are to be regarded as tax receipts naming tax officials as the recipients. With the exception of the place name, Tetel, which appears to be attributed to two tax officials, none of the place names overlap with any tax officials, which negates the idea of a disorganised tax system. According to Shea (1985:17), the pressures brought to bear on Jehoahaz by Hazael (2 Ki 13:3) necessitated extra

provisions collected in the form of tax. Concerning the second group, Shea (1985:17) logically questions why no commodities are listed if this group was also supposed to be tax receipts or even shipments to owners, for that matter. Shea's (1985:18) proposal is that the additional second name listed takes the place of the commodities in the first group and that these men were, therefore, the 'commodities' that were sent as soldiers for Jehoash's army and the '*l*-men' were their commanding officers. He (1985:19) correlates this with Jehoash's military exploits against Ben-Hadad of Damascus and Amaziah of Judah which required that the army that was decimated by Hazael during Jehoahaz's reign be replenished. This also correlates with Dearman's (1989:346) opinion. Rainey (1988:69-70) does not recognise a co-regency between Jehoahaz and Jehoash and disregards Shea's proposals, but does not provide specific reasons, merely saying that they are 'based on historical misapprehensions'.

Unfortunately, as Rainey (1988:73) states, 'there is little hope of ever proving' the precise dates and function of the Samaria Ostraca. However, despite the different theories, the ostraca, most likely, reflect the influence and/or involvement of a central authority.

#### *4.7.1.3 The Barley Letter from Samaria*

A group of eleven potsherds,[127] found by the Joint Expedition at Samaria and dated to the third quarter of the eighth century BC, were also written in Palaeo-Hebrew script (Crowfoot et al 1957:9, 24). Albright (1936b:213-214), however, dates these sherds to the first half of the eighth century BC, while Cross (1962b:35) dates them to the last days of the city (ca. 722 BC). Nine of the sherds were found at a site located outside the city (Crowfoot et al 1957:9) referred to as an 'Israelite shrine' by Sukenik (in Crowfoot et al 1942:23-24). Another one was found in an Israelite stratum against the southern outer casemate wall at the site and the last one on the northern side of the site in a disturbed context (Crowfoot et al 1957:9).

One of the sherds found at the shrine is a fragment from the rim of a shallow bowl, which was inscribed after the vessel had broken and is, therefore, an ostracon (Birnbaum 1957:11, 25). Approximately two-thirds of the ostracon remain, containing three lines of writing, each line written by a different person (Albright 1936b:211; Birnbaum 1957:11). This inscription,

[127] Birnbaum (1957:24) explains that an ostracon is a fragment from a broken vessel that is used for writing; however, when an inscription is made on a vessel while it is still whole, any fragments of this vessel that contain writing are not referred to as ostraca.

which has become known as the Barley Letter (Figure 4.2), appears to be an order to, possibly, a slave, instructing him to hand thirteen measures of barley to the bearer of the ostracon. It has been translated by Albright (1936b:212) as follows:

1. (O) Baruch, greet[ings] !
2. (O) Baruch, now pay attention and [give X son of]
3. Imnah barley, 13 (measures).

Figure 4.2: The Barley Letter (Rollston 2010:73, Fig. 3.23)

*4.7.1.4 Ostraca from Tell Qasîle*

An ostracon from Tell Qasîle in Philistia (No. 1) which reads 'For the King one thousand and one hundred (log of) oil... Ḥiyahu' (see 3.2.1.4[b][iii]) is written in the cursive Hebrew script of the eighth century BC (Maisler 1950-51c:208). Maisler (1950-51c:209) proposes that the ostracon could be an invoice for a quantity of oil sent by Ḥiyahu, who may have been an inspector at the harbour of Tell Qasîle, from the king's storehouse to one of the coastal towns in Phoenicia or Egypt. A second ostracon (No. 2) from the same period records the delivery of 30 *sheqels* of Ophir gold to Beth Horon: 'Gold of Ophir to Beth Horon... thirty sheqels' (see 2.4.3) (Maisler 1950-51c:210).

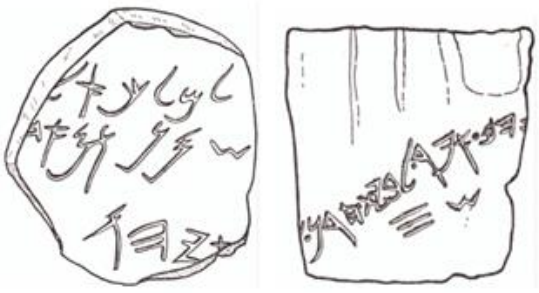


Figure 4.3: Ostraca from Tell Qasîle: left – No. 1, right – No. 2 (Maisler 1950-51c:204, Figs. 13b & 13f)

### 4.7.2 Evidence from the Assyrian period (late eighth-early sixth centuries BC)

#### *4.7.2.1 Ostraca*

Hundreds of ostraca from the Assyrian period have been found throughout Palestine. They attest to many aspects of daily life during the Assyrian period, such as the history of the region, its administration, military organisation and cult (Stern 2001:171).

(a) Tell el-Farʿah (South)

An ostracon from Tell el-Farʿah (South) in Philistia (Figure 4.4), written in the Aramaic language, has been dated to circa 300 BC by Cowley (1929:111). During the Assyrian period, an Assyrian garrison was stationed at the settlement (Naveh 1985a:20). However, the script differs from that of the Persian period and is influenced by the Phoenician script, which led Naveh (1985a:20) to assert that it is the Aramaic script of the seventh century BC. Cowley (1929:111-112) describes the ostracon either as a record of accounts or an expense report to a superior (if the third line is to be read 'thy workman').

1. . . .
2. Expenses of the house of
3. AMNK (or thy workman)
4. Shebaniah the sum of . . .
5. to Shebi
6. the Arab
7. in his hand

Figure 4.4: Aramaic ostracon from Tell el-Farʿah (South) (Naveh 1985a, Pl. 4C)

(b) Tell Jemmeh

An ostracon from Tell Jemmeh, an Assyrian fort in Philistia, is written in a script that resembles the seventh century BC Hebrew script used in Judah in some respects, but differs in others (Naveh 1985a:14; Stern 2001:3). Naveh (1985a:15) refers to the characteristics of this script as 'Philistine'. The ostracon bears a list of names together with some quantities and has been dated to the early or mid-seventh century BC (Figure 4.5) (Naveh 1985a:11, 13). Numerals and a sign that is similar to the sign for *seah* that appears in Arad Ostracon Number

31 (see 4.7.2.1[f]) are written in the last two lines in the left-hand column (Naveh 1985a:15). Each vertical line represents one unit and each horizontal bar represents a unit of ten.

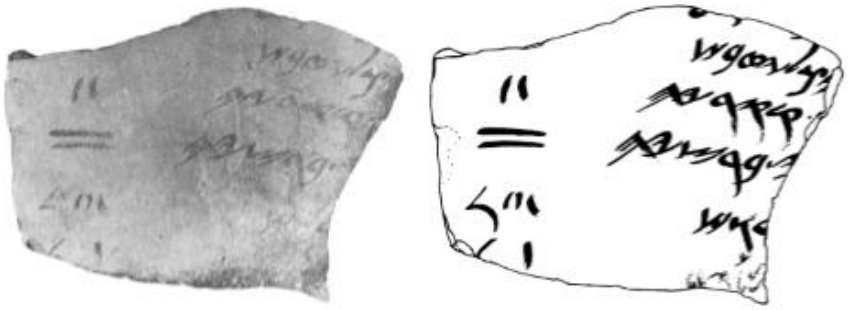


Figure 4.5: Ostracon from Tell Jemmeh with hand-drawn facsimile (Naveh 1985a:12, Fig. 2.2, Pl. 3B)

Another ostracon from Tell Jemmeh bears an incomplete inscription in Aramaic script dated to the mid-seventh century BC (Figure 4.6) (Naveh 1985a:19). It concerns the delivery of an uncertain quantity of, possibly, grain since the word *homer* is used. Unfortunately, the name of the person who received the delivery is missing (Naveh 1985a:19).

Figure 4.6: Aramaic ostracon from Tell Jemmeh with hand-drawn facsimile (Naveh 1985a:20, Fig. 5, Pl. 4D)

(c) Jerusalem

Just prior to and during the Assyrian period, Jerusalem expanded considerably (see 2.3.2.6). Unfortunately, the number of accounting ostraca from the same period do not correspond. Three Hebrew ostraca were found on the Ophel in the same unstratified context during Kenyon's excavations and bear hieratic numerals (Dobbs-Allsopp et al 2005:212-213). The first has been dated broadly to the eighth century BC and reads '100+/18 [units] are remitted/to [pay as] tithe' (Dobbs-Allsopp et al 2005:215-216). Apart from, possibly, Arad Ostracon Number 5 (see 4.7.2.1[f]), this is the only ostracon among those discussed that bears the word 'tithe'. The second dates to the late eighth century BC and bears writing on both sides (Dobbs-Allsopp et al 2005:216-218). Side A reads '…[(jars of)] oil/…(jars of)

oil/…[(jars of)] oil/… 5 (jars of) oil/... 8 [+ (?)]…' and Side B, written by another hand, 'Gath Parh'. Dobbs-Allsopp et al (2005:217) suggest the ostracon may be either an issue or a receipt of oil to or from Gath Parh, possibly a toponym (a name derived from a place or region: Reader's Digest Universal Dictionary 1987:1589). The third has been dated to the mid-seventh century BC on the basis of the shape of the *mem* and reads '57 [jars of] oil/4 [jars of] grain' (Dobbs-Allsopp et al 2005:212-214). The purpose of this ostracon is, unfortunately, indeterminable.

Another ostracon, dating to the late seventh-early sixth centuries BC on the basis of its script, was found in Stratum 9 (sixth-fourth centuries BC) of the City of David (Dobbs-Allsopp et al 2005:233). The first three lines are the same: '… one-half measure (of grain). … The wife of …'. The fourth line reads '… one-half measure (of grain). *ḥš* …', while the last two lines cannot be deciphered. The ostracon may be some kind of accounting list and refers to persons who are known only by their husbands' names, a possible indication of the status of women during the pre-exilic period (Dobbs-Allsopp et al 2005:234). *ḥš* could be a proper name or, if the ostracon originally contained two columns, it could also be reconstructed as *ḥšnb* ('account') (Dobbs-Allsopp et al 2005:234).

(d) Meẓad Ḥashavyahu

A handful of late seventh century BC fragmentary ostraca with only faint traces of Hebrew script were found at Meẓad Ḥashavyahu, a fortress located on the border of Judah and Philistia, possibly in existence during the time of Josiah (Aharoni 1966b:19; Naveh 1960:129, 139; 1962:27-29; Stern 2001:109). The fortress existed only for this brief period between the Assyrian retreat from the coastal region and the battle between Josiah and Pharaoh Necho (Stern 2001:140; see 2.3.1). Two of the ostraca (Nos. 3 and 4) bear four vertical strokes denoting the numeral '4' (Figure 4.7 – first line; Figure 4.8 – second line) (Naveh 1962:29). A proper name appears on the first line of Ostracon Number 6 (Figure 4.9) and possibly at the beginning of the second line, followed by the word 'silver' and the sign for *sheqel* (𐤔) (see 2.3.3.3; 3.2.1.4[b][i]) (Aharoni 1966b:19; Naveh 1962:30). However, Naveh and Aharoni differ in their interpretation of the signs following the *sheqel* sign. Naveh (1962:30-31) interprets the next sign as that for the Hebrew value for '4' (ר) followed by שי which he interprets as 'present' or 'donation'. Consequently, he reads the inscription as '(he) weighed four (shekels of) silver, after the king's weight as a donation'. Aharoni (1966b:19), on the other hand, maintains Naveh's interpretation is 'doubtful' and interprets the last two signs as

the symbol denoting the hieratic sign for '30' (𓎆) followed by three strokes. He, therefore, reads the inscription as '(?) silver sh(eqels) 33'.


Figure 4.7: Meẓad Ḥashavyahu Ostracon No. 3 (Naveh 1962, Pl. 5C)


Figure 4.8: Meẓad Ḥashavyahu Ostracon No. 4 (Naveh 1962, Pl. 5E)


Figure 4.9: Meẓad Ḥashavyahu Ostracon No. 6 (Naveh 1962, Pl. 6A)

(e) Ashkelon

An ostracon, in which Hebrew letters are written in a Philistine script, was found at Ashkelon in a destruction level left by the Babylonians when they attacked and captured the city in 604 BC (Figure 4.10) (Cross 2003:164-165; Stern 2001:229). The ostracon is broken on two sides and its script is barely legible. It concerns an agreement to purchase or deliver grain and reads as follows (Cross 2003:164):

1. ]from the (cereal) crop which you [
2. ]. . .they shall pay to[
3. ]. . .(cereal) crop of Ṣapan-[DN?]

Figure 4.10: Seventh century BC ostracon from Ashkelon (Cross 2003:165, Fig. 21.1)

(f) Arad

Continuing the discussion of the Arad Ostraca (see 4.7.1.1), the ostraca that fall in the late seventh and early sixth centuries BC are those found in Strata VII-VI.

Ostraca addressed to Eliashib as well as three seals (Inscription Nos. 105-107) bearing his name (see 2.3.2.9) were found in Stratum VII in a small room near the room where the Stratum VI ostraca, also addressed to Eliashib, were found. Ostraca Numbers 31, 32 and 34 as well as two marked *sheqel* weights were found in the same room as the three seals (Aharoni 1981:56-58). Ostracon Number 31 (Figure 4.11), known as the Wheat Roster (Aharoni 1970:38), was written on a jar of which other pieces with traces of script were also found nearby, thus indicating that these ostraca were written in Arad. The sherd is a palimpsest since erased traces of writing can be discerned beneath the text; it contains a list of names to whom wheat was allocated. The total quantity issued is recorded in the last line, '46 ephahs of grain', and is written in a different handwriting to that of the other lines. Aharoni (1970:38) surmises that the summary in the last line was made at a later stage by another scribe and attests to the careful recording and control of transactions by the royal administration. The reading of the ostracon is as follows (Aharoni 1981:56):

| | | |
|---|---|---|
| 1. | Wheat | |
| 2. | Uriyahu son of Raga | ephahs 5 |
| 3. | Neḥemyahu son of Yehoʿaz | 8 |
| 4. | Neriyahu son of Seʿaryahu | 5 |
| 5. | Ahiqam son of Shemaʿyahu | 7 |
| 6. | Gaham | 5 |
| 7. | Yedaʿyahu | 5 |
| 8. | Gemaryahu | 5 |
| 9. | . . .yahu | 6 |
| 10. | 46 ephahs of grain | |

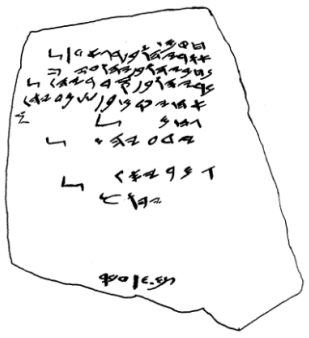


Figure 4.11: Facsimile of the Wheat ostracon (Aharoni 1970:34, Fig. 8)

Ostracon Number 34 (Figure 4.12) contains two columns of hieratic signs for the standard measure of grain (*ḥeḳat*) and a pot as well as quantities and commodities (Aharoni 1981:62). Unfortunately, the interpretation of the commodity signs is uncertain; the commodities accompanying the *ḥeḳat* sign have been interpreted as possibly being south-Egyptian barley and wheat, while those associated with the hieratic sign for a pot refer to wine (Aharoni 1981:63-64). Although there are no totals written on the ostracon, the total quantities of the items add up as follows: wheat – 260 *ḥeḳat;* barley – 185 *ḥeḳat*; other grains – 120 *ḥeḳat*; and

wine – 2 pots (Aharoni 1981:64). Aharoni (1981:64) posits that the ostracon represents an inventory list written by an Egyptian scribe after the Egyptians had conquered the fortress. Yeivin's (1966:153-154) suggestion that a possible third column with names may be missing and his interpretation of one of the hieratic signs as animal fat has been rejected by Aharoni (1981:63-64). Aharoni (1981:63) explains that the ostracon has a straight right-hand edge with the signs beginning at a uniform distance from that edge. Furthermore, the sign Yeivin interpreted as animal fat appears with the *ḥeḳat* sign; consequently, Aharoni (1981:64) suggests it is unlikely that animal fat, a liquid, would be written together with the sign for a dry measure. In contrast to Aharoni, Yeivin (1966:153, 158-159) asserts the ostracon is a distribution list of rations and believes that the prevalence of hieratic signs on the ostracon points to the presence of Egyptian mercenaries in the Judaean army and suggests the ostracon may have been written by one of them. Rainey (1971:29), on the other hand, states 'there is no reason that the scribe was not a Hebrew-speaking Judaean' since the use of hieratic numerals in Hebrew ostraca is also attested at Samaria (see 4.7.1.2[a]), Meẓad Ḥashavyahu (see 4.7.2.1[d]) and on other ostraca from Arad (Nos. 17 and 25; see further information in subsequent paragraphs).

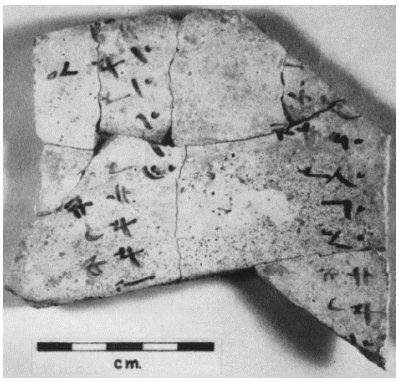



Figure 4.12: Arad Ostracon No. 34 (Yeivin 1966, Pl. 17A)

A similar list is found on Ostracon Number 33, which is written in a mixture of Hebrew and Egyptian measures (Aharoni 1981:61). It is a list of wheat, a word that is repeated in each line. The rest of the signs represent the Hebrew measures *lethech* (five *ephahs* or half a *homer*) and *seah* (see 3.2.1.4[b][iii]) as well as the Egyptian measure *ḥeḳat*. The absence of names led Aharoni (1981:61) to surmise that it may be an inventory list.

The latest stratigraphical group of the Hebrew ostraca are those discovered in Stratum VI (sixth century BC) of the last Israelite fortress (Aharoni 1966a:1; 1981:4-5). The ostraca, which were found in an ash layer in one of the rooms of the southern casemate wall (see 2.3.2.9), are addressed to Eliashib and contain instructions to provide certain persons with

provisions of wine, bread and oil. According to Aharoni (1966b:14), the script of the ostraca is very similar to that of the Lachish Letters. The best-preserved ostracon of this group is Ostracon Number 1, which contains ten lines of writing (Figure 4.13) (Aharoni 1966a:2-3; 1981:12):

> To Eliashib: And now, give the Kittiyîm 3 baths of wine, and write the name of the day. And from the rest of the first flour, send one homer of flour in order to make bread for them. Give them the wine from the *aganoth* vessels.

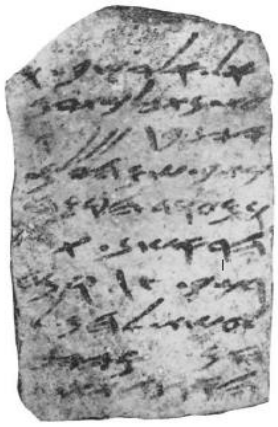


Figure 4.13: Arad Ostracon No. 1 (Aharoni 1981:12)

The Kittiyîm, most probably Greek or Cypriot mercenaries serving in Judaean garrisons stationed at remote fortresses, are mentioned in ten of the Eliashib ostraca (Nos. 1, 2, 4, 5, 7, 8, 10, 11, 14 and 17) (Aharoni 1981:12-13).[128] These ostraca concern provisions handed to the Kittiyîm; in some cases, the provisions were sealed. Ostraca Numbers 2, 4, 5, 7, 8, 10, 11 and 14 refer to quantities of wine, oil, bread, vinegar and flour given to the Kittiyîm. With the exception of one ostracon (No. 14), all of them require the oil to be sealed. Ostracon Number 2 also contains an explicit order to deliver a *homer* of wine the very next day and not to delay (Aharoni 1981:15-16). This indicates that the writer of the message was within a day's journey of Arad and that there was an emergency situation. Ostracon Number 5 could possibly contain the word 'tithe', of which only the first two letters are left (Aharoni 1981:20). It refers to wine or oil that was to be received from a certain Benayahu. Ostracon Number 17 contains an instruction to a certain Nahum to obtain provisions from Eliashib and send them to Ziph (Figure 4.14) (Aharoni 1981:32):

[128] Herzog et al (1984:29) regard the Kittiyîm as Phoenician-speaking merchants or caravaneers who lived in Kition on the island of Cyprus.

1. To Nahum, and now: Come
2. to the house of Eliashib
3. son of Eshiahu, and take
4. from him (?) 1 (jar of) oil, and
5. send (it) to [me?] quickly, and
6. seal it with your
7. seal.

Figure 4.14: Facsimile of the obverse of Arad Ostracon No. 17 (Aharoni 1966b:15, Fig. 1)

On the reverse of the ostracon, a comment regarding the delivery from Nahum to the Kitti (singular of Kittiyîm) and the date thereof is written (Figure 4.15):

1. On the 24th of the month gave Nahum
2. oil by the hand of the Kitti, 1.

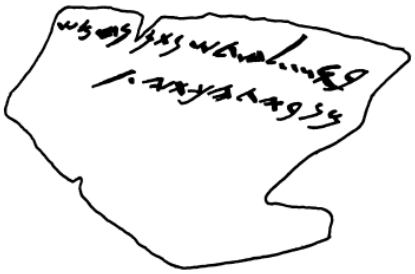


Figure 4.15: Facsimile of the reverse of Arad Ostracon No. 17 (Aharoni 1966b:15, Fig. 1)

A symbol (  ), which represents the hieratic sign for '20', and four strokes makes up the number of the day (Aharoni 1966b:16). Since the handwriting on the reverse side differs from that on the obverse, Aharoni (1981:34) asserts that a scribe was employed at the Arad storehouses. Furthermore, it is probable that Nahum sent the Kitti to the storehouse on his behalf to obtain the provisions. Aharoni (1981:34), therefore, posits that Nahum may either have been the commander of a corps of Kittiyîm mercenaries or the commander of one of the fortresses in the Negev where they were stationed.

Other Stratum VI ostraca addressed to Eliashib are Ostraca Numbers 3, 6, 9, 12, 16, 18 and 24. Ostracon Number 3 instructs Eliashib to issue wine to the messenger, who is not named, and to take dough to Beersheba, an unfortified city near Tell Beersheba which, at that time, lay in ruins, as well as to take inventory of wheat and bread (Aharoni 1981:17-18). The sending of dough to Beersheba suggests that the city's storehouses no longer existed which, in turn, implies an emergency situation, most probably connected to the Edomites. Ostraca Numbers 6, 9 and 12 also contain instructions to Eliashib to issue quantities of oil, flour and possibly bread and wine (Aharoni 1981:21, 24, 26). Ostracon Number 16 concerns a shipment of money for an amount of 8 *sheqels* (Aharoni 1981:30-31). Ostracon Number 18 was sent to

Eliashib from one of his subordinates, most probably from Jerusalem where he was carrying out a task for Eliashib since the 'house of God' is mentioned (Aharoni 1981:35). It carries instructions for Eliashib to issue to a certain Shemaryahu, possibly, a *lethech* of wheat, which amounts to enough wheat to make approximately 225 loaves of bread (Aharoni 1981:36). It is, therefore, possible that Shemaryahu may have been the head of a troop who was on their way to one of the Negev fortresses. Another quantity (a *homer*) of wheat (enough for 450 loaves) was also to be issued to the Kerosi, a family name connected with religious functions. Aharoni (1981:36) surmises that this group was at Arad for some religious purpose. Although not to be regarded as an accounting entry, Ostracon Number 24 concerns the consignment of men from Arad and from Kinah (Jos 15:22), another fortress in the Negev not far from Arad, to be sent as reinforcements to Elishaʿ, the commander of Ramat-Negev; it also contains the words 'And the word of the king is incumbent upon you for your very life!' (Aharoni 1981:46-49, 146). The ostracon serves to indicate that Eliashib also received orders from the king.

Ostracon Number 13 also concerns an assignment of, probably, oil to a person whose name ended in -yahu (Aharoni 1981:27). Similar to Ostracon Number 5, Ostracon Number 25 concerns the receipt of a commodity, in this case, barley from four sources (Aharoni 1981:50-51; Rainey 1971:27). The places mentioned are one unknown place as well as Lower 'Anim, Upper 'Anim and Ma'on; the latter three are in close proximity to Arad. Aharoni (1981:51) proposes that Arad, 'Anim and Ma'on were part of the administrative district of Ziph during this period and the barley represented levies received by the storehouse at Arad from 'Anim and Ma'on. Rainey (1971:28) also suggests the commodities were delivered as taxes to the storehouse at Arad, but proposes that the second two sources (Lower 'Anim and Upper 'Anim) may refer to tribal units located in the eastern Negev. Yeivin (1969:100-101), however, regards the language as Egyptian written in Hebrew-Phoenician script and asserts the place names refer to places in Egypt. As a result, he maintains the ostracon is a list of rations received by groups of Egyptians originating from the Egyptian places mentioned. Needless to say, his interpretation has been rejected by Aharoni and Rainey. Ostracon Number 29 bears the instruction to issue 10 *sheqels* of silver to a person whose name begins with 'M' (Aharoni 1981:55). The form of the script is similar to that of Ostracon Number 16, which also concerns the shipment of silver, and may, therefore, have been written by the same scribe.

As mentioned previously (see 2.3.3.2), Eliashib, as commander of the fortress at Arad, was probably connected in some capacity to the temple in Jerusalem and the ostraca were, therefore, kept by him as a record of the commodities he issued from the storehouse (Aharoni 1966a:4; 1981:119-120). Another commander who is mentioned in Ostracon Number 40 from Stratum VIII is Malkiyahu (see 2.3.2.9).

According to Nam (2012:125), the Arad Ostraca reflect a redistributive policy initiated by a central authority who made decisions regarding the distribution of economic resources. The ostraca attest to the common use of potsherds for writing messages and reflect the authority and responsibility of the commander of Arad to issue supplies to travellers passing through, to supply provisions to military fortresses located in the Negev, to receive taxes, to receive and send dispatches, to take inventory and to carry out instructions received from the crown (Aharoni 1968c:9-10; 1981:141; Herzog et al 1984:30-31). The persons responsible for fetching the supplies were issued with letters authorising the Arad commander to issue specific quantities of certain commodities. Usually, once the transaction was completed, the date was written on the same sherd which was then stored at the site for recordkeeping purposes. The ostraca indicate the importance of Arad as the central storehouse and the military administrative centre for the Negev fortresses, whose commanders were responsible for the other fortresses in the Negev and who fell under the direct authority of the king of Judah himself, as can be seen in Ostracon Number 88 (Aharoni 1981:148). Some of the ostraca, bearing priestly names as well as quantities, may also be connected with the administration of the Jerusalem Temple even after the temple at Arad fell into disuse (Nos. 5 and 18; see preceding paragraphs) (Aharoni 1981:148; Yeivin 1979b:152).

(g) Ḥorvat ʿUza

Ḥorvat ʿUza is located in the eastern Negev and comprised a fortress that protected the border of Judah during the seventh and early sixth centuries BC, at which time it was destroyed (Beit-Arieh & Cresson 1991:127-128; Misgav 1990:215). A number of ostraca were found at the site, of which 28 are Hebrew, one Edomite and one Aramaic (Beit-Arieh & Cresson 1991:133). The Edomite ostracon has a similar script to two ostraca from Elath, Numbers 2070 and 6043, which are merely name lists (Beit-Arieh & Cresson 1985:99; Naveh 1966:27-28). This script is very similar to the Hebrew script, but was later influenced by the Aramaic script (see 4.3.8). The Edomite ostracon reads as follows (Figure 4.16) (Beit-Arieh & Cresson 1985:97):

1. (Thus) said Lumalak (or <E> limelek): Say to *Blbl*
2. Are you well? I bless you
3. by Qaus. And now give the food (grain)
4. that Aḥi'ma/o ...
5. And may U[z]iel lift [it] upon (the altar?)
6. [lest] the food become leavened (?)

Figure 4.16: Edomite ostracon from Ḥorvat ʿUza (Beit-Arieh & Cresson 1991:134)

Beit-Arieh & Cresson (1985:99; 1991:134) propose that the message refers to the delivery of dough to an army unit who required bread quickly and did not have the time or facilities to first make the dough (see 4.7.2.1[f]: Arad Ostracon No. 3). The instruction was issued by an Edomite official to *Blbl*, perhaps the commander at the site or another site in the Negev. According to Beit-Arieh & Cresson (1985:100; 1991:134), the ostracon indicates Edomite presence at the site, perhaps after they had captured the fort just prior to the Babylonian invasion. Another ostracon is merely a Hebrew name list written in the Hebrew script and language (Misgav 1990:216) and is, therefore, not relevant to this study. The majority of the other ostraca are, unfortunately, incomplete and have not yet been published (Beit-Arieh & Cresson 1991:133; Misgav 1990:215).

(h) Tel Seraʿ

An Aramaic ostracon (No. A1032) from Tel Seraʿ, another Assyrian fort located in Philistia, has been dated by Cross (2003:160-161) to the early sixth century BC (Figure 4.17). It contains five lines of script that are rather faded and have been reconstructed by Cross (2003:160-161) as follows:

1. silver: Yiš[maʿʾel?] sent[
2. olives: ʿIdri[
3. aloes (or a PN)[129]: Baraqān[
4. ʾṣn bar Rākib[
5. gnby Ḥannanî

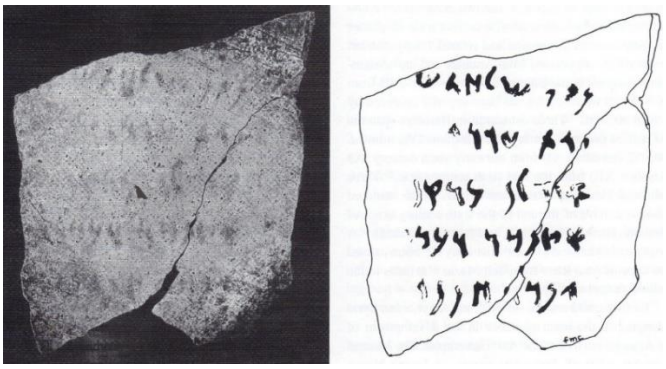


Figure 4.17: Ostracon No. 2 from Tel Seraʿ with drawing (Cross 2003:160, Figs. 20.4 & 20.5)

It is difficult to establish the purpose of this ostracon. The first two lines refer to silver and olives, either received or delivered; the third line could refer to the receipt or delivery of aloes or the line, together with the last two, contains only names.

(i) Lachish Letters

Fragments of sixteen of the Lachish Letters, written in Hebrew script, were found in an ash layer in a room between the outer and inner city gates (Mazar 1992:458; Starkey 1938:11-12). Of the other two letters, one fragment was found amid the soil from beneath the Persian road where it had been dumped by the excavators and the other was found approximately 30 cm below the surface of the road (Starkey 1938:12-13). The letters concern military and political matters just prior to the Babylonian invasion of Judah and comprise correspondence between Hoshaʿyahu, the commander of a small outpost near Lachish, possibly Qiryat-Yeʿarim, and Yaʾush, the military governor of Lachish (Starkey 1938:12; Torczyner 1938:17). Due to their nature, they have no bearing on this study.

Another three ostraca from the same period were found, one (No. XIX) on the roadway at the foot of the south-western corner of the site among burnt masonry from the tower and two (Nos. XX and XXI) in one of the rooms built on the ruins of Palace C along its eastern wall (see 2.3.2.8) (Diringer 1943:89; Inge 1938:254). Number XXI was found ‘below the burnt

[129] PN is the abbreviation for ‘proper name’.

floor of the room' and is a letter in a similar vein to the original eighteen (Ginsberg 1940:13; Inge 1938:254), but the other two could be related to this study. Number XX was found 'lying blackened on the floor among the ashes of destruction' and may be a receipt or an invoice; Number XIX is a list of names with numerals (Avigad 1979:30; Ginsberg 1940:12; Inge 1938:254).

Number XIX originally comprised, possibly, nine lines of script of which only the first five are legible; it contains a list of names followed by numerals and has been reconstructed as follows (Figure 4.18) (Diringer 1943:89):

1. Son.of (a man or the land) Uṣ . 10 . . .
2. Peqaḥ . 11. . . *sh* . . .
3. 'Amidal . Q . . .
4. Shema'yahu . Q . . .
5. . . . ' (or *sh*) *b* (or *n*) *sh* . . .
6. . . . *m* (or *ṣ*)
7. . . . . 11
8. (illegible)
9. . . . . *t* (or *ṭ*) *sh b* .

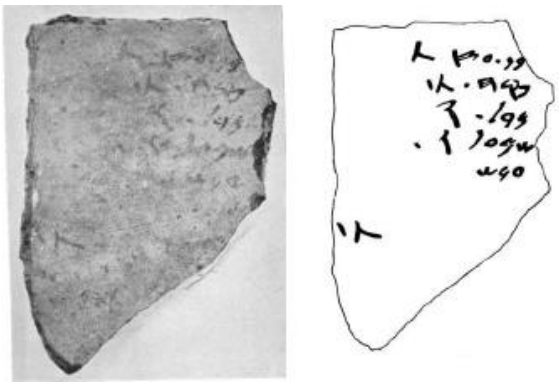


Figure 4.18: Lachish ostracon XIX with hand-drawn copy (Diringer 1943, Pl. V, Figs.1 & 2)

Unfortunately, the above interpretation does not provide an indication of the purpose of the ostracon, although if, as Diringer (1943:92) proposes, the word in line 9 is read as 'foreign inhabitant', the ostracon may be a census count of names and the number of household members and the last line could indicate the total number of people in a street or district.

Number XX (Figure 4.19) consists of seven fragments that originally belonged to a water jar (Diringer 1943:93). This ostracon contains two lines of script and reads 'In the ninth (year) the house of . . .yahu/the wine to R... *z* . *r* ... *l*'. Thomas (1950:55), on the other hand, reads Diringer's 'R' as '*y*'. According to Inge (1938:254) and Diringer (1943:95), the ostracon resembles the Samaria Ostraca since it provides the date (ninth year), the supplier (the house of ... yahu), the commodity (wine) and the recipient (R ...). Albright's (1941:24) reading, however, differs to that of Diringer; he proposes 'In the ninth (year) in the month of .../Jehucal, son of Jaazaniah'. The name Jehucal[130] also appears on a bulla, dated to just prior

[130] Mazar, E (2006) uses a different spelling, namely 'Yehuchal' (see 2.3.3.1[b]).

to the Babylonian invasion and found in the 'Large Stone Structure' in Jerusalem, as well as in the biblical narratives as one of Zedekiah's officials in Jeremiah 37:3 and 38:1 (Mazar, E 2006).

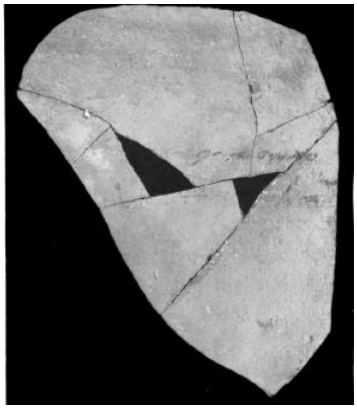


Figure 4.19: Lachish ostracon XX (Diringer 1943, Pl. VI)

#### *4.7.2.2 Papyri*

During the Assyrian period, Aramaic was the common language and script (Stern 2001:15). Unfortunately, many of the documents from this period were written on papyri and since papyrus is not conducive to preservation, papyri from this period have not been found in Palestine. Only a palimpsest from Judah (Murabbaʿât Papyrus; see 4.7.2.2[a]) has survived (Stern 2001:170). The main evidence for the use of papyri comes from the many clay bullae, which bear the names of officials, which were used to seal them (see 2.3.3.1[b]; 3.2.1.4[a][ii]).

(a) Murabbaʿât Papyrus

The Murabbaʿât Papyrus, written in Hebrew, is a palimpsest and has been dated to the late eighth-early seventh centuries BC by Lindenberger (2003:137), to 700-650 BC by Cross (1962b:42) and to circa 650 BC by Gibson (1971:31). It was discovered in a cave about 16 km south of Qumran and may originate from the time of the Assyrian crisis towards the end of the eighth century BC, following which inhabitants may have sought refuge in the cave, or from the time of civil unrest in the early seventh century BC during Manasseh's reign (Cross 1962b:42; Gibson 1971:31). Unfortunately, it contains only a badly preserved letter of five lines (text A) written underneath a list of four names in crude cursive followed by a symbol and numerals (text B) (Cross 1962b:34; Gibson 1971:31). Text B may be either a memorandum or an invoice and reads as follows (Gibson 1971:31-32):

1. [nimṭār] (son of) Hoshea; 14 *seah*
2. Abi (son of) Zibi; 10 *seah*
3. Eleadah (son of) [kriśōn]; 5 *seah*
4. Shemaiah (son of) Joezer; 6 *seah*

#### *4.7.2.3 Tablets*

Unfortunately, cuneiform tablets that have been found in Palestine are, for the most part, legal documents and are, therefore, of little significance to accounting. For example, two tablets from 651 BC and 649 BC, which are contracts for the purchase of land, were found at Gezer in an Assyrian administration building (Johns 1905:206-210; Macalister 1904:207-208; 1905:185; Pinches 1904:229-236; Reich & Brandl 1985:41-42; see Stern 2001:16). At Hadid near Gezer, yet another deed of sale dated to 698/697 BC, was found in an administration building (Na'aman & Zadok 2000:159-169; see Stern 2001:16). A second tablet from Hadid, a debt note with a pledge, will be discussed later (see 4.7.5.1).

(a) Tell Halaf (Guzana)

Cuneiform texts dating to the first quarter of the eighth century BC from Tell Halaf in Syria belong to the archive of Mannu-ki-mat-Assur, the Assyrian governor at the site (Novak 2012).[131] The texts include administrative correspondence as well as short lists and accounting memoranda relating to, *inter alia*, the enlistment of soldiers, horses and equipment for the Assyrian army, the transfer of tribute to the Assyrian capital and the collection of tax data.

Fales (1979:192-193) collated fragments of some of the clay tablets held in London and Berlin and joined them to produce six distinct documents as well as an additional three texts which he was able to construct from non-adjoining, homogeneous pieces. The first text has a large central piece missing and its message, therefore, cannot be determined (Figure 4.20).

[131] Since the site of Tell Halaf in Syria was annexed as an Assyrian province already in the late ninth century BC, these texts have been included under the Assyrian period.

Figure 4.20: First text from Tell Halaf with large central piece missing (Fales 1979:213)

The second text is a list of sheep and mentions a number of officials from whom the animals were probably collected (Fales 1979:194). It also refers to the feeding of the animals and has been reconstructed as follows (Figure 4.21):

*Obverse*
Two hundred sheep of the *ilku*, eighty sheep of the royal steward, [n] sheep of the *turtānu,* [n+]1 of the town [ ] - [n he]rds among this number – that fed.

*Reverse*
[A total of n hund]red fifty sheep, (of which) [n+]3 inspected(?), that in the town Ṣiamaninu fed.

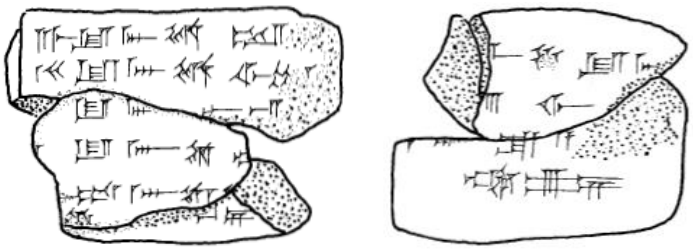


Figure 4.21: Second text from Tell Halaf – obverse (left), reverse (right) (Fales 1979:213)

The third text describes various objects (Figure 4.22) (Fales 1979:195-196):

*Obverse*
Four minas of (animal) dorsal tissue, for Erinu, the leatherworker; five minas (of the same for) Sumuqi; an iron dagger, Baruqu; an iron dagger, Aki ... , (both of which) polished.

*Reverse*
[n+]1 *sāti*('s worth of) *gungubin(n)u*-ornaments; [n] *gtdinu*-clothes, (for) Aḫa-napi; three[?] (ornaments) for the forehead(?), of bronze; [n+] six 'star-shaped' (ornaments), of bronze.

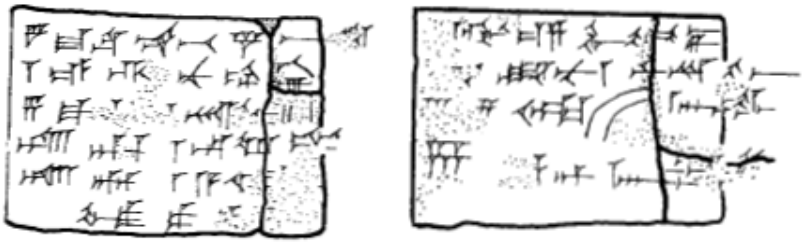


Figure 4.22: Third text from Tell Halaf – obverse (left), reverse (right) (Fales 1979:214)

The fourth text is a list of donkeys attributed to individuals (Figure 4.23) (Fales 1979:197) and reads as follows:

[n+]20 donkeys, Aḫu-dam[iq?]; 40 (donkeys), Bēl-Ḫarrān-b[ēl-uṣu]r?; 24 (donkeys), .... maš; 34 (donkeys), ... -mā. A total of 1[4/58] donkeys. Eighty-five donkeys [ ]; a (further) total of one (*sic*! = two) hundred [thir/for]ty three donkeys.

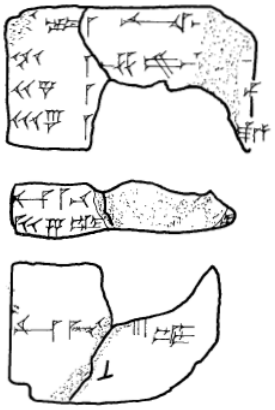


Figure 4.23: Fourth text from Tell Halaf (Fales 1979:214)

The fifth text is a list of animals, possibly sheep and either sick or healthy, related to specific towns or individuals (Figure 4.24) (Fales 1979:198). It reads as follows:

*Obverse*
Three male (sheep?) in the town D[ūr]-Ištar; two, affected. [n+]1 [in the town Ṣ]iamaninu; one, affected. [n] *šappu*-jars of be[er?], [n in the town(?)] Bur- ... -lim, (all) affected. [n in the city of(?)] Ḫarrān,

*Reverse*
[at the disposal of B]alašī .... [n] in the town Gal?-gulim; [n] in the town Ṣiamaninu, affected, [at the] disposal of Kuēnu. [n+]1 in the town D[ūr]-Ištar?]. A total of 7 healthy (sheep), [a tot]al of two-thirds(?) affected.

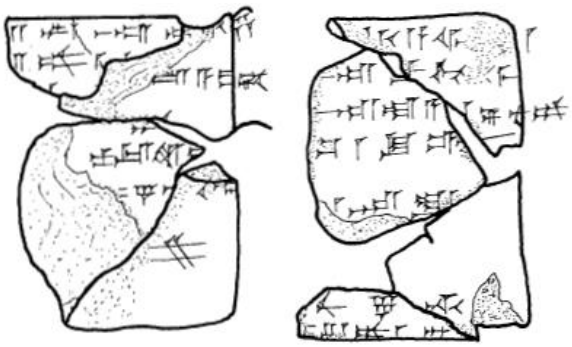


Figure 4.24: Fifth text from Tell Halaf (Fales 1979:214)

The sixth text comprises a list of people ascribing specific quantities of personnel to individuals (Fales 1979:199-200) and is therefore not relevant to this study.

The three texts that Fales (1979:200-203) constructed from non-adjoining fragments comprise lists of animals and plots of land allocated to specific individuals. Their precise interpretation, however, is open to numerous possibilities.

(b) Tell Keisan

Tell Keisan, which is located in the Acco Valley and served as an Assyrian administrative centre, yielded a fragment of a cuneiform tablet that was found in Level 5, which dates to 750-650 BC (Figure 4.25) (Sigrist 1982:32; Stern 2001:16).[132] According to Sigrist (1982:33), it is a ration list wherein all the lines are prefaced with the sign for *ninda*, an Assyrian measure for a bread ration (Stern 2001:16). Since the *ninda* sign is written in a sloppy manner and it is difficult to distinguish the number of indentations on the upper part of the sign, the amount involved is uncertain. The *ninda* sign is always followed by the sign which precedes a name; unfortunately, the names are too faded to read. The scribe commenced with writing only the names of persons, but added the rations either when he realised his error or when he was issued with new instructions (Sigrist 1982:34-35). This is reflected in the first six lines of the one side where the scribe inserted the sign for *ninda* along the edge of the tablet. As a result of this, Sigrist (1982:35) proposes that this side is the obverse side.

[132] Horowitz, Oshima and Sanders (2002:758) have, however, tentatively dated the fragment to the Late Bronze Age on the basis of the sign forms. The Neo-Assyrian period, however, did not fall within the Late Bronze Age.

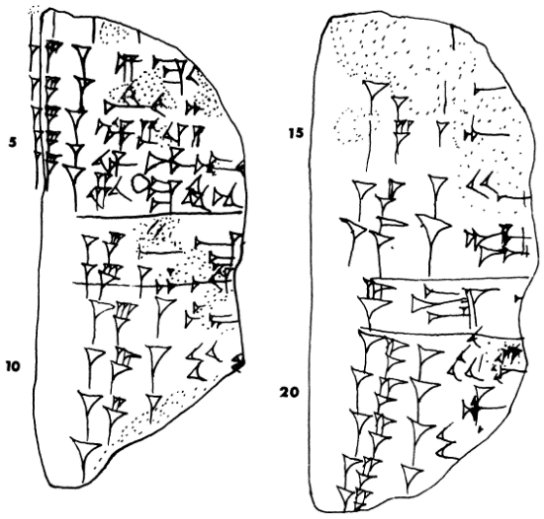



Figure 4.25: Tell Keisan tablet – obverse (left), reverse (right) (Sigrist 1982:33, Fig. 2)

(c) Samaria

A fragment of a clay cuneiform tablet was found in the city of Samaria (Figure 4.26) (Reisner et al 1924:247). The inscription mentions the delivery of oxen and sheep to an Assyrian official (*rab alani*), probably the governor. It could, therefore, refer either to a delivery of supplies or to the payment of taxes.

1. If by the 10th day
2. of the month Ab Nergaltallim(?)
3. shall say (command?), Abiahi
4. to the Governor of the cities
5. shall(?) give (deliver) 6 oxen 12 sheep+

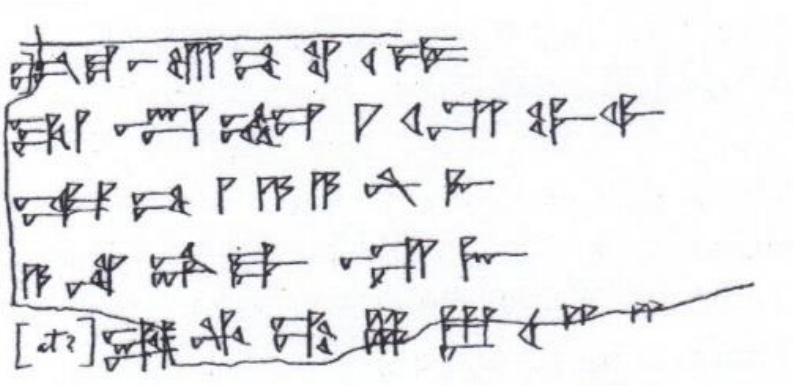


Figure 4.26: Clay cuneiform text from Samaria (Reisner et al 1924:247)

### 4.7.3 Evidence from the Babylonian period (sixth century BC)

#### *4.7.3.1 Sefire tablet*

An Aramaic clay tablet from Sefire, located near Aleppo in Syria, is dated to 571-570 BC and refers to a transaction between two men regarding the sale of an unknown commodity for a sum of money (Figure 4.27) (Gibson 1975:116). Starcky (1960:100-101) translated the inscription as follows:

*Obverse*
1. ... Baitʾel-ʿaśani
2. [à] Baitʾel-yadaʿ in exchange for
3. 27 pieces of silver
4. in the year 34
5. Nebuchadnezzar king
6. Babylon. witness Gaʿla

*Reverse*
1. [son of] SWH; witness
2. Baitʾel dalani son of
3. YZKH; witness
4. Baitʾel dalani son of
5. DYḤWṬ; witness
6. ..YLʾ; scribe
7. .....

Figure 4.27: Sefire tablet – obverse (top), reverse (bottom) (Starcky 1960:101, Figs. 1 & 2)

### 4.7.4 Evidence from the Persian period (late sixth-late fourth centuries BC)

#### *4.7.4.1 Papyri*

(a) Bauer-Meissner papyrus

An Aramaic papyrus found at the site of el-Hibeh in Egypt comprises a land lease drawn up in the sixth century BC (Szubin & Porten 1992:67). Even though the papyrus is essentially a contract drawn up outside of Palestine, it is of interest to this field of study since it comprises a joint venture between, most likely, a Philistine and an Egyptian farmer. Modern joint ventures are formed when two or more businesses agree to carry out a specific business transaction for a specified time period and are required to be recorded in the accounting records of both parties. According to the document, Padi, son of Daganmelech, entered into an agreement with Aḥa, son of Ḥapio, whereby Padi leased a field he owned in Korobis in

Egypt to Aḥa. The agreement, furthermore, states that the two parties were to share equally in the profits and losses of the venture for the period of one year. The agreement also protects the rights of the lessee by means of a defension clause and the rights of the owner through a forfeitable bond. In the defension clause, Padi refers to *ḥ*[*l*]*qy lmlk* ('my s[h]are [that belongs] to the king'), indicating that he, as an immigrant, received land as a royal grant (Szubin & Porten 1992:74). The date recorded on the papyrus corresponds with 3 June 515 BC (Szubin & Porten 1992:72). The papyrus was folded vertically in two places, resulting in missing words, specifically where the size of the field was written (Szubin & Porten 1992:71, 73). The reading is as follows (Szubin & Porten 1992:69):

| | |
|---|---|
| Date: | 1. In year 7 of the Ki[n]g Darius, month of Meḥir, (day) 6, |
| Parties: | 2. Padi son of Daga[n]melech said to Aḥa son of Ḥapio: |
| Joint Venture: | I gave you |
| | 3. my field (of) [x] arouras in (the) town Korobis for sowing (and) division. |
| | 4. You will sow it with your own seed in year 7 and you will divide with me |
| | 5. in year 8, *homer for homer*, *pera*[*s* for ]*peras*.[133] The good |
| | 6. and the bad we shall divide as one, equally [. . .] . |
| | 7. . . . of your own. {and/and the field} you will harvest [your[self [. . .] . . . |
| | 8. . . . will [be] in my field from . . . [. . .] . . . |
| | 9. . . . in full. And I will take for me (as) for you. |
| Defension clause: | And anyone who will [in]terfere with you |
| | 10. I shall block. I shall stand up and cleanse and give (it) to [you. And] if I do not stand up |
| | 11. and cleanse and give (it) to you, I shall give it to you fr[om] my portion from the king, ex |
| | 12. cept for a word of the king. |
| Deposit of bond: | and you gave me a bo[nd] (for) my field, silver, 2 sh(ekels), |
| | 13. a lost (= forfeitable) shekel or a lasting (= refundable) shekel. |
| Transport of grain: | And you shall carry (the) . . . of (the) threshing floor with |
| | 14. your own he-ass and (one) shall not hire a he-ass. |
| Waiver of reclamation: | And I shall not [be able] to reclaim my field |
| | 15. from you since you have (a claim) on [me] (for) a bond and an undertaking. |
| Witnesses: | These are the witnesses: |
| | 16. Nargi, Nanai, Ḥor, [Ṣe]ha/[A]ḥa, Adduladin, Kenani, [ ○ ○ ]*my*, Pana, |
| | 17. Peṭemin, *Qšr* |
| Scribe and Place: | Makkibanit son of Nargi wrote this [docu]ment |
| | 18. upon the instruction of Padi in (the) town of Korobis. |

[133] *Peras* means 'to divide in two' (Blue Letter Bible 2015).

Endorsement: 19. Document of a field undertaking which Pad[i] wr[o]te for Aḥa.

(b) The Wâdi ed-Dâliyeh papyri

After Alexander the Great's invasion of Palestine, a group of wealthy Samaritans initially accepted his rule, but later burned his prefect, Andromachus, alive (Cross 1974:17). As a result, Alexander, who was in Egypt at the time, returned to Samaria to punish the murderers. However, on learning of Alexander's return, they fled with their families, supplies and Aramaic documents written on papyrus and found refuge in the Abu Shinjeh Cave in the Wâdi ed-Dâliyeh, but were later found by the Macedonians and killed (Cross 1974:17; Gropp 2001:3). According to the Taʿâmireh Bedouin who discovered the cave, approximately 300 skeletons were found in the cave (Cross 1974:18). The papyri were, unfortunately, mostly badly preserved and in fragments. Eighteen fragments can be classified as papyri, still leaving almost 150 pieces that cannot be joined together (Gropp 2001:3). The papyri are all legal in nature and relate to property, loans, marriage and slaves (Cross 1974:20). They were drawn up in Samaria during the fourth century BC and on approximately half of the papyri, a place name, a date and a king's name are written (Gropp 2001:3). One hundred and twenty-eight clay seal impressions, of which 70 are reasonably well preserved, as well a number of late pre-Alexandrine coins were also found in the cave (Cross 1974:19; Gropp 2001:3).

In spite of their legal nature, a handful of these papyri refer to pledges in exchange for loans and will, accordingly, be discussed below (see 4.7.5.4). Another papyrus (WDSP 17), which is a receipt for the repayment of a loan involving a pledge, is, unfortunately, only available as a photograph (Gropp 2001, Pl. XVIII).

(c) Ketef Yeriḥo

Fragments of papyrus documents, written in Aramaic, were found in a cave at Ketef Yeriḥo, of which only one, dating from the second half of the fourth century BC, was a complete document (Figure 4.28) (Eshel & Misgav 1988:158). The script on Side B is more cursive than that of Side A (Eshel & Misgav 1988:174). The document comprises a list of names with a sum of money next to each name (Eshel & Misgav 1988:164-165). Side A contains thirteen visible lines of writing and Side B two columns of six lines each. The last line on each side records a total (כל) as well as the outstanding amount next to the total of Side B; the sums of money mentioned are *sheqel* (*š*), *rib'īn* (*r*) and *mā'āt* (*m*). One *sheqel* equals four *rib'īn* and

one *rib'īn* equals six *mā'āt* (Eshel & Misgav 1988:165, n. 8). Some of the names appear on both sides of the document and the amounts on Side B are less than those on Side A. Consequently, Eshel and Misgav (1988:166) propose that Side A may be loans made to the persons listed there and Side B the amounts that were repaid by those persons. Since the total of the sums of money listed on Side A (17.5 *sheqels* if the amount in Line 3 is also 2 *sheqels*)[134] does not add up to the recorded total (21 *sheqels*), they suggest that some lines may be missing. This also appears to be the case with Side B (Eshel & Misgav 1988:167). The names that do not appear on either side may have been written on the missing parts or they may not yet have begun to repay their loans. Carter (1999:166), however, posits that it may rather be a 'local or imperial tax roster' due to its similarity with Cowley Papyrus 22, which records a list of donations (temple tax) made to the temple at Elephantine. The text has been interpreted by Eshel and Misgav (1988:164-265) as follows:

*Side A*

| | |
|---|---|
| 1. Hananiah son of [.. .]zi | *š* 2 |
| 2. Teḥinnah son of *grp'* | *š* 2 |
| 3. *Dlwy* | *š* [ ] |
| 4. Yehoḥanan son of *spnh* | *š* 2 |
| 5. Yehoḥanan son of Abi'or | *š* 2 |
| 6. Neriah son of Padiah | *š* 1 |
| 7. Yehoḥanan son of *grp'* | *š* 2 |
| 8. Shelemiah *ngr'* | *š* 1 |
| 9. Yeho'ezer son of Shewah | *r* 2 |
| 10. Yehosef son of Shewah | *r* 2 |
| 11. Teḥinnah son of Shelomoh | *š* 2 |
| 12. [Te]ḥinn[ah] son of 'Aqqub | *r* 2 |
| 13. [tot]al | *š* 21 |

*Side B*

| *Column 1* | | *Column 2* | |
|---|---|---|---|
| 1. | | Yehoḥanan so[n of] Abi'or | *r* 2 |
| 2. [.. .]son of *yhwḥzy* | *r* 2 | *'bd'* son of ['A]qqub | *r* 2 |
| 3. [...] *grp'* | *š* 1 | Teḥinnah *ḥṭl'* | *r* 2 |
| 4. [...] son of 'ḥwhy | *š* 2 | Shim'on son of Yehoram | *r* 2 |
| 5. [Yehoḥanan] son of *spnh* | *r* 2 | [Yeho]'ezer son of Shewah | *m* 4 |
| 6. [...]*h* | *r* 2 | | |
| 7. [...*n*]*gr* | *r* 2 | total [ ] *m* 4 remaining *š m*[ ] | |

[134] Eshel and Misgav (1988:166) incorrectly wrote 16.5 *sheqels.*

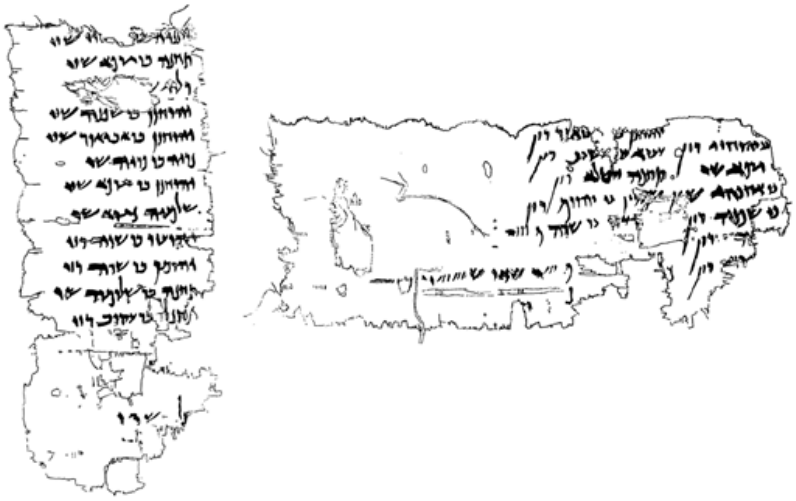


Figure 4.28: Ketef Yeriḥo document – Side A (left) and Side B (right)
(Eshel & Misgav 1988:162-163, Figs. 4 & 5)

According to Eshel and Misgav (1988:175-176), the fact that the papyrus was found in a cave may indicate that the owner/s may have sought refuge from some or other danger, which may have been due to the rebellion against Artaxerxes III that broke out circa 344-343 BC, at which time Jericho was destroyed by the Persians. On the other hand, since the script of the papyrus resembles that of Papyrus 1 from the Wâdi ed-Dâliyeh, which bears the date 335 BC, it is possible that the Ketef Yeriḥo papyrus could date to the last third of the fourth century BC and, consequently, there is no historical connection (Eshel & Misgav 1988:172, 176).

#### *4.7.4.2 Aramaic ostraca*

During the fifth century BC, the Aramaic language and script was common in official circles (Naveh 1970a:21). Evidence from this period includes ostraca from Ashdod (see 4.7.4.2[c]) and Tel el-Farʿah (South) (see 4.7.4.2[d]), a number of the Elephantine papyri (see 4.7.5.3) and most of the Elephantine ostraca (see 4.7.4.2[b]) (Naveh 1970a:31-40). According to Naveh (1970a:43), Aramaic cursive material from the fourth and third centuries BC is rarer than that from the fifth century BC. Examples include some papyri from Elephantine (see 4.7.5.3) and ostraca from Arad (see 4.7.4.2[h]) and Samaria (see 4.7.4.2[l]).

(a) Lachish

During the Persian period, Lachish was part of Idumaea and comprised a handful of buildings, including a public building/palace and a shrine (see 2.3.2.8; 4.7.4.2[n]). An Aramaic ostracon from the site has been dated by Klingbeil (1995:80) to the first half of the fifth century BC

(Figure 4.29). Due to the fact that some of the letters are faded and others are missing, it is difficult to ascertain the exact purpose of the inscription, although Klingbeil (1995:77-78) proposes it may be a ration order or a receipt. The inscription reads '. . . 20 donkeys/. . . barley: 10 qabs' (Klingbeil 1995:81).

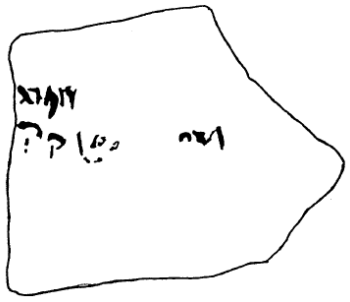


Figure 4.29: Drawing of Aramaic ostracon from Lachish (Klingbeil 1995:78, Fig. 1)

(b) Elephantine

Most of the published ostraca from Elephantine date to the first half of the fifth century BC, circa 475 BC, and appear to be mainly domestic in nature since some of them refer to requests for commodities such as barley and salt to be sent from home (Naveh 1970a:37-38). It appears that some inhabitants from Elephantine were located at Syene and sent instructions to their families at Elephantine.

(c) Ashdod

A Persian-period fort was located at Ashdod where an Aramaic ostracon was found dating to the mid-fifth century BC (Naveh 1970b:200-201; Stern 2001:371). It may be either a docket recording a shipment of wine or a label indicating the contents of a jar. Its inscription reads '(In this jar there is wine from) the vineyard of Zebadiah/(it is) half a jar'. Dockets are clay sealings that are shaped round a string which, in turn, is tied around papyrus or leather; the docket serves as a seal for the document (Lipinski 1994:213; Postgate 1973:34).

(d) Tell el-Farʿah (South)

A Persian-period fort was also located at Tell el-Farʿah (South) (Stern 2001:371). An ostracon from the site, dating to the end of the fifth century BC, has been translated by Naveh (1985b:115) as follows: 'For sowing in the near/field 3 *kor* of barley/in the property or in the other (field) 35 *kor*'. It appears to refer to quantities of barley required to sow a small field

and a larger field or estate, a measurement used in antiquity to determine the size of a piece of land (Naveh 1985b:115; see 1 Ki 18:32).

Another five ostraca were found, of which the writing on one has faded completely (Naveh 1985b:116). The other four have been dated to the fourth century BC on the basis of their script. The first of these bears an Edomite name, perhaps followed by a quantity of some commodity issued to this person, although this part is missing. The second bears a Hebrew name followed by 'on the 3rd of the month' or by an amount of barley. The third bears a Persian name and, possibly, seven *kor* of a commodity. The last one may refer to three *seah* of some commodity (Naveh 1985b:116).

(e) Tell el-Kheleifeh

Aramaic ostraca dating to the fifth-fourth centuries BC were found at Tell el-Kheleifeh, where another Persian-period fort was located (Glueck 1940b:3-4; Stern 2001:372). Together with Lachish (see 4.7.4.2[a]) and Arad (see 4.7.4.2[h]), this site was part of Idumaea during the Persian period and served as a trading post (Stern 2001:447; 458). Number 2069, written on a fragment of a wheel-made jug, was found in the last settlement level of the site dating to the late fifth-early fourth centuries BC (Figure 4.30) (Glueck 1940b:4, 7). The script on the inner side has almost disappeared, while that on the outer side is still very clear; however, the ostracon appears to be incomplete on the left edge. The remains of only two letters can be made out on the reverse side, while the obverse side appears to be a receipt for a wine shipment and reads 'tax-gatherer (or bottled wine), jars [?]/wine, jars 2/wine [?]' (Glueck 1940b:8-9). Torrey (1941:15) prefers Glueck's alternative option for the first word of the first line and reads the inscription as 'bottled wine, good quality, choice! 5 (??)/wine, good quality, choice! 2/wine b[ottled] …'.

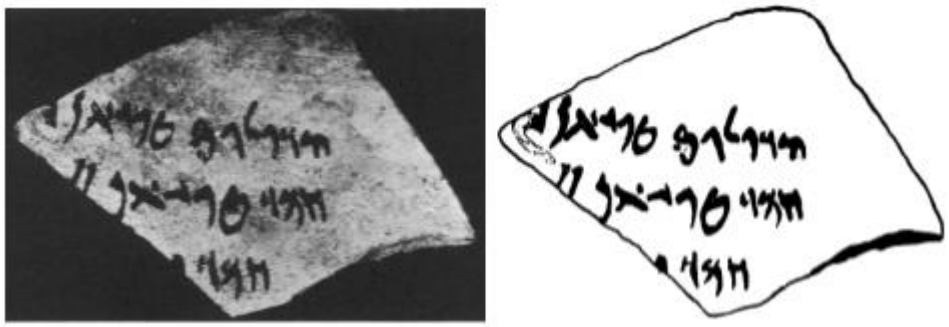


Figure 4.30: Ostracon No. 2069 with hand-drawn copy (Glueck 1940b:6, 8, Figs. 3 & 4)

Glueck (1940b:4-5) proposes that Number 2071, a palimpsest, is a list of names followed by 'the servant of […]' (Figure 4.31). In contrast, Torrey (1941:15) suggests reading *ʿbr* (grain) instead of Glueck's *ʿbr* (servant) and asserts that the ostracon is a receipt for grain. The fourth line was written by a different hand at a later date than the other three lines; the first three lines are dated to the fifth century BC and the last one to the fourth century BC (Glueck 1940b:7).

Figure 4.31: Facsimile of Ostracon No. 2071 (Glueck 1940b:5, Fig. 2)

(f) Tel Seraʿ

An ostracon (No. A5607) from Tel Seraʿ, the site of another Persian-period fort, dates to the mid-fourth century BC (Figure 4.32) (Cross 2003:162-163; Stern 2001:371). It contains fourteen lines of script although the script is faded and some lines are missing. Where the script is legible, names (or parts of names) followed by the abbreviation for *bath* (*b*[*at*]) and a number can be read:

1. *k*[ ]
2. [ ]
3. [ ]
4. Ḥanani *b* 1 [ ]
5. Li-rûḥ [*b*] 2 [ ]
6. *ʿzʾ* [ ]
7. [ ]
8. [ ]
9. [ ]
10. [ ]
11. *ysnʾ b* 3
12. *sʾwb b* 1 [ ]
13. *ʿprʾ b* 2
14. Yāqîm *b* 1

Figure 4.32: Ostracon No. 3 from Tel Seraʿ (Cross 2003:162, Fig. 20.6)

Two other ostraca from Tel Seraʿ bear only single names (Nos. A1247 & A1034) and only the first line of two lines on the last ostracon (No. A305) can be read: ‘on the twentieth [day of the month]’ (Cross 2003:163).

(g) Hebron

An ostracon found in the region of Yatta, approximately 10 km south of Hebron, is a docket concerning the delivery of 26 *seahs* of barley, most likely as taxes, by a person named Yatʿu (whose father’s name is unclear) to two officials who are also identified by their names (Naveh 1985b:117). These three names are Arabic and the year the ostracon was inscribed has been determined by Naveh (1985b:118) as 357 BC during the reign of Artaxerxes III. The inscription reads ‘On the 6th of Tammuz, year 2/Yatʿu, son of MRṢ--/barley: 26 *seah* (delivered) to/Yutayru (?) and Ṣubayḥu’ (Naveh 1985b:117).

(h) Arad

Arad was also the site of a Persian-period fort and formed part of Idumaea during the Persian period (Stern 2001:372, 447). The approximately 100 ostraca from Arad written in the Aramaic script, many of which are poorly preserved, concern the supply of barley to horsemen, horses and donkeys (Naveh 1981:153). Most of them have been attributed to the mid-fourth century BC and mention amounts of barley or flour in *seahs* and *qabs* (one *seah* equals six *qabs*) given to persons whose names appear on the first line of the ostraca (Nos. 1-13, 15-17, 20, 22, 24-25, 27, 30 and 36). These names reflect the ethnic diversity of the population of Arad; they include Edomite, Hebrew, Ammonite and Arabic names (Naveh 1981:176). Another name written on many of the sherds is that of Yaddua‘, a Hebrew name, together with the date ‘on the 5th’ (or 6th or 7th or 8th) (Naveh 1981:153, 175). In contrast to the Hebrew ostraca (Numbers 1 and 17) where Eliashib and Nahum respectively were responsible for issuing the goods and recording the date, Naveh (1981:175) suggests that Yaddua‘ appears to be the person who issued the instructions and handed the sherds to the horsemen and donkey drivers, who then obtained the grain from the storehouse at Arad. He bases his opinion on the fact that, though different handwriting is attested on the Aramaic ostraca from Arad, only one handwriting appears on each individual ostracon. Furthermore, it is possible that Yaddua‘ resided in Arad and could, therefore, have been either the storehouse manager or the commander at Arad. Alternatively, he resided in another place from where he issued the ostraca to the horsemen and donkey drivers, who then travelled to Arad to fetch the

supplies. According to Number 38, Arad also had a straw shed (Naveh 1981:175). The name ʿAnani, who may have been the owner or manager of the shed, is mentioned.

Naveh (1981:176) asserts it is possible that the site also served as a way station for horsemen and donkey drivers who were tasked with the responsibility of exercising control over the roads, maintaining swift communication between the different regions and transporting commodities to remote sites.

(i) Nebi Yunis

An example of a contribution made to a temple may possibly come from an Aramaic ostracon, dating to the second half of the fourth century BC, which was found at Nebi Yunis near Ashdod (Figure 4.33) (Cross 1964:185). Cross (1964:186) interprets the inscription as 'Baʿlīṣīd, sheq[els x]/Donation'. The donor, who gave a specified sum of money to, possibly, the local shrine, bears a Phoenician name. An alternative interpretation suggested by Cross (1964:186) is that, in the place of the personal name, the inscription may be 'Baʿl Ṣūr', which means 'Lord of Tyre', the Tyrian god, Baʿal. However, the normal practice when making an offering to a god was to place a *lamed* before the name, which in this case did not occur.

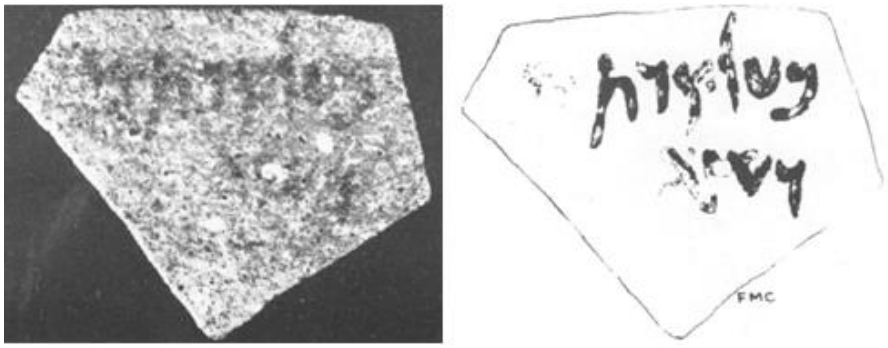



Figure 4.33: Aramaic ostracon from Nebi Yunis (Cross 1964, Pl. 41H)

(j) Tell Jemmeh

Tell Jemmeh is yet another site where a Persian-period fort was located (Stern 2001:371). Six poorly preserved Aramaic ostraca were found in two structures that were probably governmental storehouses. They bear dates, personal names (Hebrew and perhaps Phoenician), commodities (either barley or wheat), measures and quantities and have been dated to the late Persian period (Naveh 1992:49-50). Four of the ostraca were found inside the West Granary (Nos. 1-4) and two inside the East Granary (Nos. 5-6) and possibly represent

tax payments from neighbouring farms. The four from the West Granary were used as labels for the jars or sacks in which the grain was stored; the two from the East Granary were attached to wine jars belonging to a certain Zebidi (Naveh 1992:50).

1. On the 6th of Marhesh[van]
Baʿalpaday son of [ ]
five qab[ ]

2. [On] the 4th [of ]
Yehona[athan (?)... ]
wheat: 3 seah [ ]

3. On the 5th [of... ]
Yeho[... ]
barley: 2 kor, 6 seah 2
altogether barley 2 kor, 10 [seah]

4. On the 3rd of Nisan, year ...
[...] 1 seah, 4 qab

5. Wine of the vineyard
of Zebi
before Yataʿ

6. Wine of
Zebidi

(k) Tel ʿIra

An ostracon was found on the surface at Tel ʿIra in the Beersheba Valley, where a small Persian-period settlement was located (Biran & Cohen 1979:125; Naveh 1985b:118; Stern 2001:446, 451). It is dated to the late fourth century BC and is inscribed with 'Natnu, barley: 11 *seah*/2 [+] D'. Natnu is a proper name and the sign resembling 'D', which also appears on ostraca Numbers 1, 3 and 4 from Beersheba (see 4.7.4.2[m]), appears to indicate a measure smaller than a *seah*.

(l) Samaria

The reading of an Aramaic ostracon from Samaria (Figure 4.34) is too uncertain to determine its validity for this study. In spite of this, it will be described here briefly. The ostracon has been dated by Birnbaum (1957:29-30) to the second half of the fourth century BC. The reading is uncertain, but may concern the payment of an amount of, perhaps, money for *nṣb*', which has been translated by Sukenik (1933:155-156) as a plantation or vineyard. Birnbaum (1957:29) posits that it may rather mean 'stele'. His tentative reading is: 'The stele(?) which Ah[ijah(?)] vowed/9(?)'. Birnbaum (1957:32) regards the ostracon as a docket for an offering and maintains that Sukenik's (1933:156) interpretation of the ostracon as a label indicating the producer and production year of, most likely, wine is incorrect. The other ostraca from Samaria have no relevance for this study.

Figure 4.34: Ostracon from Samaria (Crowfoot et al 1957, Pl. iii.15)

(m) Beersheba

Twenty-six Aramaic ostraca, all poorly preserved, were found at Beersheba in Persian-period refuse pits during the first two excavation seasons (Naveh 1973:79). Of these, Ostraca Numbers 1-12 are dockets concerning barley and wheat, Ostraca Numbers 13-17 use a different type of text and the last nine are illegible. Those bearing regnal years, specific quantities of wheat or barley and the names of, presumably, the persons who delivered the items (Nos. 1-9) indicate that the goods were brought to the site from farms and estates in the Negev to be stored at Beersheba in the royal storehouses (Naveh 1973:82). Numbers 1, 3 and 4 bear the same quantity, 'D', as on the ostracon from Tel ʿIra (see 4.7.4.2[k]; Naveh 1973:79-80). Based on palaeographical evidence, these ostraca date to the mid-fourth century BC during the reign of Artaxerxes III (Naveh 1973:79). Numbers 10-12 record only the day; of these, only one still bears an amount of wheat (Naveh 1973:81). Numbers 13-17 have no dates, one of which records an amount of wheat, one could be a name list and bears only parts of two names with the Edomite theophoric element, one could be a label and two refer to *sheqels*. The use of Edomite names affirms that Beersheba was part of Idumaea, an area that was settled by Edomites during the Persian period (see Stern 2001:443, 445). According to Naveh (1981:153; 1985b:116), the ostraca from Beersheba reflect the character of the site as a centre for receiving taxes in the form of grain.

Another six ostraca representing dockets (Nos. 27-32), most likely concerning the delivery of taxes in kind and also dating to the late Persian period (fourth century BC), were found during later excavations (Naveh 1979:182).

No. 27: On the 10th of Tammuz, 7th year
NHRH(?), barley 28 *seah* 4 *qab* (and) ½

No. 28: On the 13th of Tammuz, year ...
QWSNHR, barley: 3 *seah*, 3 *qab*
(delivered) to ʿDRʾL.

No. 29: On the 29th of Mar.l.t[eshwan ...
WNDN(?), wheat: [ ] *seah [*

No. 30: On the 6th (?) of [
QNY(?) ḤGG[H] (?) [
wheat: 3 *kar*, 20(+?) *seah*

Although the numbers '4' and '13' appear on Ostracon Number 31, only a few faint letters are visible in the first two lines and only traces are visible in the last three lines (Naveh 1979:184). The first line of Ostracon Number 32 contains the number '27' and the third line the number '10' preceded by the signs for wheat (ח) and *seah* (ס). Naveh (1979:182, 193) maintains these two ostraca are also dockets and that the six ostraca described above may be tax payments in kind that were brought to Beersheba.

The rest of the ostraca (Nos. 33-54) are merely name lists or name lists with numerals (Naveh 1979:184, 188). Ostracon Number 36 contains various names and numerals, but no signs indicating the commodities (Naveh 1979:187). In Ostraca Numbers 37 and 38, names are followed by the abbreviation for the weight *mina* or coins (מ) and numerical values (Naveh 1979:194). The amounts in Ostracon Number 37 are one quarter of a *mina* (מר), two and a half *mina* (מ 2 פ) and one *mina* (1 מ) and could refer to amounts paid for something (Naveh 1979:188). Ostracon Number 38 is written on both sides and contains the sign מ in four of the nine lines; in line 2, it is followed by '2'. In Ostracon Number 39, line 3 reads '2 שפ' (barley, 2 *peras*) and line 4 reads '4 שפ' (barley, 4 *peras*) (Naveh 1979:189). Ostracon Number 43 contains some personal names and the sign for wheat (ח) at the end of lines 5 and 6 and could, possibly, represent provisions allocated to the persons listed (Naveh 1979:190). Ostracon Number 44 bears six lines of writing, each ending in a numeral, the total of which adds up to nine which is recorded on the left-hand side of the ostracon (Naveh 1979:190). Naveh (1979:191) has reconstructed the total line as 'total 9 men'. Ostracon Number 45 is a list of names and quantities of barley written in the left-hand column with another two lines in the right-hand column (Naveh 1979:191). The reading of this ostracon is as follows:

*Left column:*

1. . . . . .
2. A Nabataean name
3. Menahem
4. barley, 5 seah
5. . . . (?) barley, 2 seah
6. . . . . .
7. A Phoenician name, probably Abdbaal

*Right column:*

1. the servant of Isis (an Egyptian goddess)
2. [barley], 5 seah

Ostracon Number 47 mentions a quantity of 26 *seahs* of wheat as well as the phrase 'through a merchant', which also appears in Ostracon Number 48 (Naveh 1979:191-192). Ostracon Number 48 has been interpreted by Naveh (1979:192) as 'On the 15th of (month X, a certain amount of wheat was sold to the stores of Beer-sheba) by a merchant'. The third line could read '1 *qab* and a half'. Ostracon Number 50 reads 'give to the house of HPR (Hefer)' in the first line; the rest of the inscription may refer to a quantity of beams of cedar or cypress wood and a quantity of barley. According to Naveh (1979:193), since some of these ostraca were found in pits, they may be have been used as labels for the grain stored in the pits. Furthermore, the dockets and name lists may reflect the administrative nature of the site during the Persian period (Naveh 1979:194).

(n) Idumaea

The provenance of hundreds of ostraca from Idumaea, dating to the fourth century BC, is unknown since they were obtained on the antiquities market (Ephʿal & Naveh 1996:9; Lemaire 2006:413). During the Persian period, Idumaea encompassed southern Judah from Lachish and Marissa almost to Beth-Zur (Stern 2001:443). Of these ostraca, 201 have been published by Ephʿal & Naveh (1996); two of these (Nos. 200 & 201) date to the fifth century BC and the rest to 361-311 BC (Ephʿal & Naveh 1996:7, 10-11). I have included only the ostraca that can be securely dated to the Persian period, thereby excluding those without dates (with the exception of those belonging to the archive of Ḥalfat) and those post-dating 332 BC.

The majority of the ostraca are dockets and concern mainly the cultivation of fields and orchards and include references to raw wheat, barley, flour, crushed barley and wheat, barley groats, straw, wine, olives, oil, livestock, wood, land, money and labourers. Numbers 1-36 (but excluding Nos. 20, 22 and 23) appear to belong to the archive of a certain Ḥalfat who provided goods to a person named Baʿalʿid and have been dated to 360-355 BC; the earliest of these dates to year 45 of Artaxerxes II and the latest to year 4 of Artaxerxes III. Numbers 7

and 10 bear the signature of a person named Zebadel who also inscribed the sherds; Numbers 2, 6 and 28 were inscribed and signed by a certain Shaʿadel; Numbers 15 and 29 by Qausyetaʿ; and Number 33 by Zaydu. Numbers 1, 3 and 52 each bear an illegible signature. The measures used include *kor*, *seah*, *qab*, rope-bags and loads of wood (Ephʿal & Naveh 1996:11-12). No titles are mentioned in the ostraca, but they do refer to 'the house of ...' or to 'the sons of ...'. Ephʿal & Naveh (1996:15) suggest this may reflect tribal units. Many of the ostraca mention the date, usually the day and the month, but also occasionally the year and, in one case (No. 13), the name of Artaxerxes (Ephʿal & Naveh 1996:16).

Ostraca dealing with grain and its by-products are Numbers 1-10, 12-15, 26, 29-31, 33-35, 41-42, 44 and 48-53; oil – Numbers 11, 17 and 32; wine and money – Number 16; straw – Numbers 18-20, 23-24 and 36-38; wood – Number 25; wooden pegs – Number 28; *grgr* – Number 22; animals – Number 46; and unknown – Numbers 21 and 27 (Ephʿal & Naveh 1996:22-90). Only three of these ostraca (Nos. 13, 34 and 44) deal with two commodities; the majority, therefore, concern only one commodity. According to Ephʿal & Naveh (1996:12-13), one ostracon, which bears the word *grgr*, could refer to 'grains', but since it is not followed by a measure, they assume it must have some other meaning in this case.

Lemaire (2006:413-456) also published a number of ostraca dating to the fourth century BC. According to him (2006:414), most of them concern taxes in kind. Some of the ostraca (Nos. P1-P2, P4, P7, P9-P13, P15, W1-W3, W5, Mo2 and Mo6) mention quantities of barley, wheat, timber, barley groats, shrivelled olives, oil and even, perhaps, mice. One ostracon (P6) is inscribed on stone and mentions quantities of barley and wheat (Lemaire 2006:430). Two of the ostraca (P9 and P10) may be labels. Another ostracon (W4) could possibly be a receipt for timber (Lemaire 2006:427-428). An additional ostracon (Mo5) may refer to a record of measurements of vineyards for a land registry (Lemaire 2006:444-446). Ostracon P8 is an accounting memorandum of barley and reads as follows (Lemaire 2006:420-423):

1. As a memorandum: barley of Wahabî upon Qôsnahar,
2. *b*(arley) *s*(*eah*) 15; upon Qôshanan, *b*(arley) 15;
3. upon ʿAdarnî, *b*(arley) 15; upon Qôsdakar,
4. and Baalʿîr, *b*(arley) 15; upon Netyrâ
5. *b*(arley) *s*(*eah*) 8; upon Ahyô, [?] *q*(*ab*?) ?[?]
6. upon ʿAdrâ[?

Various options have been proposed by Lemaire (2006:423) for the purpose of this ostracon: it could be a list of loans of barley made by Wahabî; it could be a list of rent in kind owed to

Wahabî; if Wahabî was a tax-farmer, it could be a list of taxes to be given in kind; or it could be a distribution list of rations issued to Wahabî's workers.

#### *4.7.4.3 Tablets*

(a) Tel Mikhmoret

A fragment of a cuneiform tablet from the Persian period (Figure 4.35), as yet unpublished, was found at the site of Tel Mikhmoret on the Sharon coast (Horowitz, Oshima & Sanders 2002:759; Porath, Paley & Stieglitz 1993:1044). Although it is written in Neo-Babylonian script, it is dated to the fifth year of the reign of Cambyses II (530-522 BC), the year of his campaign in Egypt (see 3.2.3.1), and may be related either to this campaign or to the activities of the Babylonians living in Samaria (Porath et al 1993:1044-1045). All the recorded names are Babylonian and since the tablet was baked, it presumably originated in Babylonia. The text concerns the sale of a slave girl from Babylonia for fifteen silver *sheqels*.

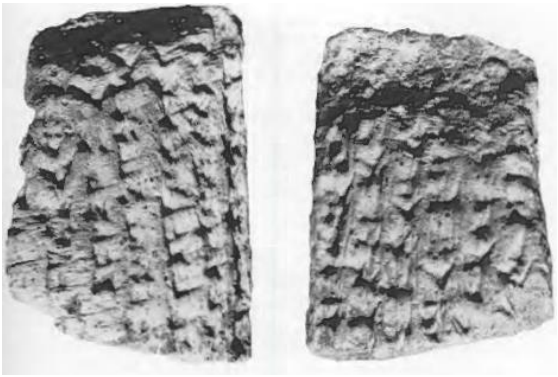


Figure 4.35: Fragmentary clay cuneiform tablet from Tel Mikhmoret (Porath et al 1993:1045)

### 4.7.5 Acknowledgement of debt

In contrast to modern accounting that records an amount owed to or by a person in accordance with the accrual principle,[135] the recording of debts in ancient times appears to have been made in the form of a legal document which stated who owed what and how much to whom. Examples can be seen in tablets from Hadid near Gezer (see 4.7.5.1) and Tell Ḥalaf in Syria (see 4.7.5.2) and in the Wâdi ed-Dâliyeh papyri (see 4.7.5.4).

[135] According to the accrual principle, transactions are recorded as and when they occur and, not necessarily, when cash is received or paid; in other words, if a client purchases an item on credit, the transaction will be recorded in the accounting records at the time of the transaction as an amount owed to the business.

The biblical narratives contain various directives regarding prohibitions on charging interest (Dt 23:20-21; Lv 24:35-37). However, as Neufeld (1954:196) states, this does not imply that these restrictions were adhered to, as can be observed in the admonitions of the prophets and in the evidence discussed below.

#### *4.7.5.1 Hadid*

A tablet from Hadid, a site located close to Gezer that served as an Assyrian centre, is written in cuneiform and is dated to 664/3 BC (Na'aman & Zadok 2000:159, 170; Stern 2001:15-16). It concerns an acknowledgment of debt whereby the debtor pledged his wife and sister in lieu of interest. This is known as an antichretic pledge (Na'aman & Zadok 2000:174-175). The debtor was normally also responsible for the cost of caring for the person given in pledge. Fixed property could also be given in pledge and the creditor was then entitled to enjoy the income from the fixed property in lieu of interest. Once the debt was repaid, the persons/assets given in pledge were returned to the debtor. If the debt was not paid, a clause would usually entitle the creditor to levy an additional amount of interest in kind. Even though the wife and sister of the debtor bore West Semitic names, the use of cuneiform suggests that the creditor was probably a Mesopotamian who may have been a descendant of the deportees who were sent to Samaria by Sargon II after the conquest of Babylonia in 709 BC (Na'aman & Zadok 2000:175-176, 178). The text of the tablet reads as follows (Na'aman & Zadok 2000:170):

l. One mina and 6+2[+x shekels of silver ...]
2. belonging to Ki[ ...]
3. at the disposal of Ši?[ ... ].
4. instead of (paying) the interest for the silver,
5. Ḥammāya his wife and
6. Munaḫimā his sister
7. stay as a pledge.
8. In Ab he will pay the silver.
9. If he does not pay,
10-11. the silver will accrue interest by one third (of the capital).
12. Witness Silimu;
13. witness Šilli-Bēl;
l4. [witness Š]ašmāyu,
15. Egyptian;
l6. witness Padî.
17. Iyyar, day 16,
l8. eponym year of Šarru-lū-dāri (664/63 BC).

*4.7.5.2 Tell Ḥalaf*

Five triangular clay tablets, written in Aramaic and dated to 612 BC, were found at Tell Ḥalaf in Syria (Lipinski 1975:114-116). They belonged to the personal archive of a barley and money lender, El-manāni, son of Śagib. The tablets concern the loan of barley to be repaid at a later date and include provision for interest. They have been translated as follows (Lipinski 1975:118-142):

*No. 1 – Obverse*
1. 5 (*homers* of) barley
2. (belonging) to El-manāni (are debited) against
3. Nabû-dalā and Adad-išmânni.
4. If he does not give (back) that barley
5. on the threshing floor,
6. the barley will
7. increase

*No. 1 – Reverse*
8. by the amount of (its) quantity
9. He shall have to give (back) barley.
10. The witnesses are :
11. Qiruḥ,
12. Zirʿel,
13. Ḥazūg,
14. Riʿadad.

*No. 2 – Obverse*
1. Barley (belonging) to El-ma-
2. nāni (is debited) against Mattay :
3. 2 (*homers*) will increase into 4.
4. In (the month) Seven.

*No. 2 – Reverse*
5. Witness : Padī.
6. Witness : [ʾA]d-lū-ran.
7. Witnesses : Mateʿī
8. And ʾAddī-ʿīd.

*No. 3 – Obverse*
1. 2 [+ ?] (*homers* of) barley
2. (belonging) to El-manāni (are debited) against
3. ʾAdm[……..]
4. ……..
5. …….

*No. 3 – Reverse*
6. [….]*ḫ*xx[…]*r*
7. …….
8. *ly*[……..]
9. *Š*[…….]
10. ……

*No. 4 – Obverse*
1. Barley (belonging) to El- manāni
2. (is lent) to Nūrī-Beʿi[l] : 4? (*homers*)
3. Its increase (is) 1 into [2. On the threshing-floo]r
4. he shall gi[ve (back) the] ba[rley].
5. [Month of] Baʾlaʾ.

*No. 4 – Reverse*
6. Witnesses : [N]aʿiq,
7. Iddin-aḫḫē, Šāṭir,
8. *ʾIddarān, Yarrubān,*
9. Šumma-ekallu, Malīk,
10. Manān.

*No. 5 – Obverse*
1. Barley [(belonging) to El- ma]nān[i],
2. who has given [up to the s]mallest on the [thresh]ing floor.
3. Adad[-išmānn]I has acted for
4. the writer of the receipt and of the tablet.
5. Barley (belonging) to
6. the king,

*No. 5 – Reverse*
7. The mighty one :
8. 7 (*homers*).

Number 4 differs slightly in two respects from Numbers 1 and 2; it is an advance of barley on credit and not a formal acknowledgement of debt and, whereas Numbers 1 and 2 charged interest in the case of non-payment, the borrower was required in this case to pay interest on the amount borrowed (Lipinski 1975:133-134). Since Number 5 does not mention any witnesses, it cannot be a loan or a sale; however, due to its length, it also cannot be regarded as a label (Lipinski 1975:140). It may, therefore, refer to a delivery made to the royal storehouse, perhaps as a payment of taxes.

#### *4.7.5.3 Elephantine papyri*

A Jewish military colony was established at Elephantine in Egypt at the earliest in the seventh century BC and at the latest in the middle of the sixth century BC (Kraeling 1953:42). Kraeling (1953:42, n. 13) surmises that it is possible that part of Manasseh's army, who was required to accompany Ashurbanipal to Egypt (see 2.3.1), may have been left behind to guard the border and could therefore have established the colony. Another possibility is that the Jewish garrison was founded during the reign of Psammetichus I (664-609 BC), an Assyrian protégé, after Ashurbanipal reconquered Egypt in 663 BC and restored Psammetichus to his position as ruler (Kraeling 1953:43). Psammetichus, however, took the opportunity to establish Egypt's independence when Ashurbanipal focused his attention on his problems in Asia Minor. At this time, since they had not had leave for three years, the Egyptian garrison stationed at Elephantine decided to rebel. Despite pleas from Psammetichus, they went over to the Ethiopians and Psammetichus repopulated the garrison with some of the mercenaries from Lydia who had helped him in his bid for independence. Subsequent to this, Psammetichus besieged Ashdod, a siege that lasted for 29 years and which brought the Egyptian army in close contact with Judah from where it could have recruited Jewish mercenaries or negotiated with the Judaean king, probably Manasseh, to supply it with mercenaries (Kraeling 1953:44). These mercenaries may, subsequently, have been stationed at Elephantine. A third possibility is that Jewish mercenaries helped Psammetichus II in his campaign against the Ethiopians in 589 BC and these may have been recruited by him when he campaigned in Palestine the year prior to this (Kraeling 1953:45). Yet a further option is that, after the fall of Jerusalem to the Babylonians, some of the survivors as well as Jewish soldiers may have fled to Egypt. A variation of this theory is that some survivors may have moved to Egypt, where life was not as harsh. However, according to the Book of Jeremiah, there were already Jews in Egypt at this time and it is possible that one such group may already have been living at Elephantine (Kraeling 1953:46).

During the Persian period, the principles of Babylonian law continued to be followed, the most important of which was to ensure the validity of any legal act by recording it in writing in the presence of witnesses who affixed their signatures to a document (Kraeling 1953:49-50). The Aramaic papyri that were discovered at Elephantine date to the fifth century BC and concern the activities of the Jewish garrison that was stationed there under the auspices of the Persian government (Kraeling 1953:41). As such, although the papyri comprise mostly legal documents relating to the transfer or sale of property, marriage, slaves and other matters, those involving loans and outstanding debts may hold some significance for this study.

Porten Papyrus B48 (Cowley 11), dated to circa 487 BC, is a loan contract between Gemariah, son of Ahio, and a creditor (whose name is missing), son of Jathma, for 3½ *sheqel*s at five percent monthly interest, which amounted to seven *hallurs* per month (Figure 4.36) (Porten 1996:257-258).[136] The amount was to be repaid on a monthly basis, together with the interest, from 'my allotment which they will give me from the treasury'. If the interest was not paid, it was to be capitalised. Although there is no due date specified since loan periods were, in many cases, flexible, if the capital and interest were not repaid by 'the first month of the Egyptian calendar [Thoth], royal year 36 [of Darius I]', which fell between 23 December 487 BC and 21 January 486 BC, a penalty of double the outstanding amount would be levied. The one stipulation for the creditor was that he had to issue a receipt to Gemariah for every payment he made (Porten 1996:257-258).

Figure 4.36: Aramaic loan document (B48) (Porten 1996, Pl. 3)

[136] Due to the rearrangement of fragments of the papyrus, Porten (1985:42-43) has offered a revised reading of the document which differs slightly to that of Cowley (1923:32-35).

Porten Papyrus B34 (Cowley 10) concerns another loan contract, this for four silver *sheqels* borrowed by a woman named Jehohen from Meshullam, son of Zaccur, at a monthly interest rate of five percent (Cowley 1923:29-32; Porten 1996:202-204). The document was written on 13 December 456 BC. As with the loan in Papyrus B48, the interest was to be capitalised if it was not paid and Meshullam was entitled to seize any property (house, silver, gold, bronze, iron, slave, barley, emmer or any other food) of Jehohen should she, or her children in the event of her death, fail to repay the loan.

Cowley Papyrus 29 is another loan contract dated by Cowley (1923:106-108) to 409 BC. Despite the fact that many details are uncertain, it refers to a debt owed by the son of Hosea to Yislaḥ, son of Gadol.

Porten Papyrus B46 (Kraeling 11), drawn up during the reign of Artaxerxes II in December 402 BC, concerns an acknowledgement of a debt by means of which Anani, son of Haggai, son of Meshullum, borrowed two *peras* (see n. 133) three *seah* (see 3.2.1.4[b][iii]) of emmer from Paḥnum, son of *Bsʾ* (Kraeling 1953:259-265; Porten 1996:252-254). He promised to pay back 'from the ration that will be given to me from the storehouse of the king', intimating that the repayment was to be made in kind. The penalty for not settling the loan was 'one karsh, refined silver' to be paid within twenty days. In the event of his death occurring before the loan was repaid, his children and *'drng* ('guarantors') were to be held responsible. If the debt was not paid, Paḥnum was entitled to seize enough items, including slaves, utensils, clothing and grain, from Anani's house to pay the debt. An interesting point is that, in the following papyrus (Kraeling 12; Porten B47) which was written on 12 December 402 BC, Anani has enough funds to buy a house, which makes one wonder why he needed the loan in the first place (Kraeling 1953:268).

Due to the combination of two fragments of an Aramaic papyrus, Cowley Papyrus 49 from the Egyptian Museum in Cairo and the other fragment from the Egyptian Museum in Berlin (P 23104), Porten (1985:49-51) was able to reconstruct the text as follows (Figure 4.37):

1. Simchi son of Shasher said to Shelomam son of Galgul, say[ing: I shall not] be able
2. to say to you, "You owe me (?) wheat and barley [and emmer and wool and] linen
3. [and ] anything whereby a man may live ..." And [I shall not be able to say ] to son
4. of yours or daughter, "You owe me (?) some food .[...
5. witness(?)
6. (blank)

Unfortunately, there is no date on the papyrus (Porten 1985:49). According to Porten (1985:51), this document may be either a type of receipt issued by Simchi (the bailee) to Shelomam (the bailor) acknowledging the return of goods deposited with Shelomam or a cancellation of a debt.

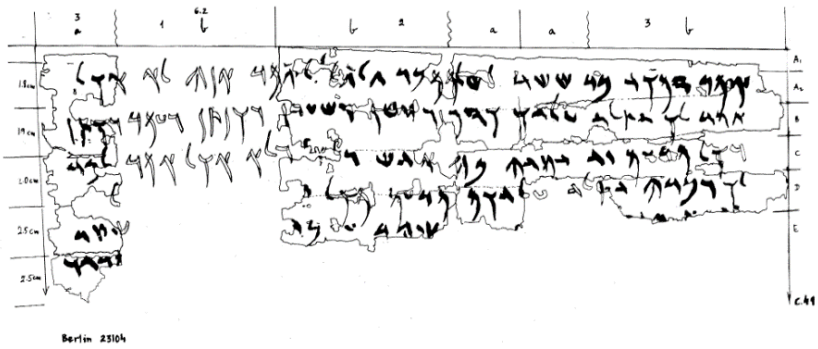



Figure 4.37: Handcopy of Cowley 49 + Berlin P 23104 (Porten 1985:48, Fig. 7)

The recto of Cowley Papyrus 83 contains a column of accounts that has been dated by Cowley (1923:202) prior to 400 BC based on the script. The verso contains a list of names and some lines of accounts, but dates to circa 300 BC. The recto has been translated by Cowley (1923:203) as follows:

1. On the 4th of Tybi
2. Ẓeḥo came to Memphis.
3. On the 5th from Peṭisis
4. on our account 25 ardabs.
5. On the 6th 25 ardabs.
6. On the 7th 25 ardabs.
7. [On] the 8th 2[5] ardabs.
8. On the 9th 2[5] ardabs.
9. On the 10th 25 ardabs.
10. On the 11th 25 ardabs.
11. On the 12th 25 ardabs.
12. On the 13th 25 ardabs.
13. On the 14th 25 ardabs.
14. [On] the 15th 25 ardabs.
15. On the 16th 25 ardabs.
16. On the 17th [25 ardabs].
17. On the 18th 25 [ardabs].
18. [On the 1]9th 25 ardabs.

#### *4.7.5.4 The Wâdi ed-Dâliyeh papyri*

WDSP 10 concerns the transfer of a slave, Bagabarta (a Persian name), son of Eli (a Semitic name), in exchange for a loan of fifteen *sheqels* and is dated to the reign of Artaxerxes, although the full date is illegible (Gropp 2001:97-101, Pl. X). Another name mentioned is Yehoselah, who may be the creditor since he has the right to the slave in perpetuity if the loan is not repaid. Once the loan has been repaid, the slave is to be released back to his owner. One of the witnesses may be '[governor of Samaria, PN] [son of ]Delaiah the prefect' (Gropp 2001:100). If this reading is correct, then the witness may be Sanballat II, son of Delaiah and governor of Samaria during the reign of Artaxerxes II (404-358 BC) (see 3.2.3.1; 3.2.3.3).

Other papyri that may also be pledges in exchange for loans are WSDP 12, 13, 16 and 27; however, these are too fragmentary and only photographs of these fragments are available (Gropp 2001:5, Pls. XIII-XV, XVII, XXV).

## 4.8 CONCLUSION

The emergence of writing in Palestine as a prerequisite for statehood occurred already from the early second millennium BC from where it progressed to the development of different types of scripts used by different cultural groups, culminating in the use of Aramaic as an official language during the Persian period. The role of scribes was essential for recording and verifying information although some of the inscriptions were also made by individuals without formal training. The epigraphic evidence discussed above is not, by any means, exhaustive. However, it does indicate that systems for recording economic transactions existed from the tenth to the fourth centuries BC and that these systems were in use throughout Palestine in both the northern and southern kingdoms. As Nam (2012:125) states, this epigraphic activity reflects the support of 'large-scale centralization necessary for a redistributive economy'. Moreover, the epigraphic material from Egypt and Syria indicate that these regions were closely connected with Palestine during the first millennium BC with regard to administration and trade.

# CHAPTER FIVE

## CONCLUSION

### 5.1 INTRODUCTION

This study has employed an archaeological and epigraphic approach to gain an understanding of the recordkeeping and accounting processes employed in Palestine during the first millennium BC. The purpose was to determine whether these were the result of the socio-economic requirements of the various centralised polities operative in Palestine during this period as well as how these processes developed over the course of several centuries and whether they conform to the definition of accounting as laid out in Chapter One. An historical qualitative approach has also been applied in order to provide the historical and political background of the different political entities that governed the region from the tenth to the fourth centuries BC. To this end, the use of literary sources has been employed, albeit with caution.

Chapters Two and Three deal with the historical background as well as the socio-economic environment of Palestine from the tenth century BC until the end of the Persian period. The objective of these two chapters was to determine whether the factors required for the emergence of statehood, which have been identified as monumental architecture, organised industrial production and the emergence of writing by Finkelstein (1999:39), were in place during this period. The evidence suggests that, during this period, these factors are reflected in the archaeological record. The Babylonian period is, to some extent, an exception, but since the Babylonians deported most of the population and virtually no reconstruction took place, this is not surprising. Other factors pointing toward a centralised administration that were discussed include the levying of taxes, the use of corvée, the establishment of a military force and the role of the temple.

Chapter Four was devoted to discussing the emergence of writing as one of the factors for the emergence of statehood as well as examining the role of the scribe and the epigraphic evidence pertaining to the manner in which accounting transactions were recorded. The evidence suggests that a system for recording transactions did exist and that it was mainly influenced by a central authority.

## 5.2 ACHIEVING THE GOALS OF THIS RESEARCH

The goals set for this study were the following:

- to determine what accounting processes were employed during the first millennium BC in Palestine and how they developed;
- to ascertain whether these processes were employed with the specific objectives of the relevant administration in mind, in other words, whether socio-economic factors influenced these accounting processes; and
- to ascertain whether these processes conform to the various components of the definition of accounting provided in Chapter One, namely:
  - To identify financial information;
  - To measure financial information;
  - To record financial information; and
  - To report financial information.

### 5.2.1 Accounting processes in place in Palestine during the first millennium BC and their development

The number of tablets as well as papyri attesting to financial transactions in Palestine is limited. The most numerous finds related to accounting in Palestine are ostraca, which have been found at many sites throughout the region. The number of ostraca found attest to the common use of potsherds for writing messages and recording transactions (Aharoni 1968c:9-10). These, together with the handful of tablets and papyri, reflect the accounting processes employed and can be used to reconstruct the development of accounting in the region. Consequently, the discussion following Table 5.1 is organised chronologically.

It must be borne in mind that many of the artefacts discussed are fragmentary and, as such, it is difficult, if not impossible, to determine what the purpose of each specific fragment was. I have deemed it simpler to first summarise the information in tabular form (see Table 5.1)[137] in order to determine what information that would comply with normal accounting requirements

[137] In order to clearly differentiate between the different types of epigraphic evidence provided in Table 5.1, I have used different colours: tablets – light orange; papyri – light grey; and ostraca – white.

is available. These would include the date, name (in the case of a debt), item, quantity or amount and the type of transaction.

| Period | Site | Script | Date | Personal or place name(s)[138] | Unit | Item(s) | Qty | Total | Issue (I)/ Receipt (R)/ Record (r) |
|---|---|---|---|---|---|---|---|---|---|
| Tenth-eighth centuries BC<br>*Ostraca* | | | | | | | | | |
| 10th BC | Arad (76) | Hebrew | - | √ | *ḥeḳat* | grain | √ | - | ? |
| | Arad (79) | Hebrew | - | √ | *bath* | - | √ | - | ? |
| 9th BC | Arad (67) | Hebrew | - | √ | - | - | √ | - | ? |
| | Arad (72) | Hebrew | - | √ | - | - | √ | - | ? |
| 8th BC | Arad (60) | Hebrew | - | √ | *ḥeḳat* | grain | √ | - | I (?) |
| | Arad (42) | Hebrew | - | √ | *lethech* | - | - | - | R |
| | Arad (49) | Hebrew | - | √ | - | - | √ | - | offerings for temple (?) |
| | Samaria (9th & 10th) | Hebrew | Regnal years | √ | *nebel* | oil, wine | √ | - | R |
| | Samaria (15th) | Hebrew | Regnal years | √ | - | men (?) | - | - | R |
| | Barley Letter | Hebrew | - | √ | - | barley | √ | - | I |
| | Tell Qasîle | Hebrew | - | √ | - | oil | √ | - | I |
| | Tell Qasîle | Hebrew | - | √ | *sheqels* | gold | √ | - | I |
| Assyrian period<br>*Tablets, papyri and ostraca* | | | | | | | | | |
| Uncertain | Samaria (tablet) | Cuneiform | Day of month | √ | - | oxen, sheep | √ | - | I |
| Early 8th BC[139] | Tell Halaf (2) (tablet) | Cuneiform | - | √ | - | sheep | √ | √ | r (?) |
| | Tell Halaf (3) (tablet) | Cuneiform | - | √ | - | sinews, daggers, ornaments, clothes | √ | - | I |
| | Tell Halaf (4) (tablet) | Cuneiform | - | √ | - | donkeys | √ | √ | r (?) |
| | Tell Halaf (5) (tablet) | Cuneiform | - | √ | - | sheep | √ | √ | r (affected & healthy animals) |
| 8th BC | Jerusalem | Hebrew | - | - | - | ? | √ | - | tithe |
| Late 8th BC | Jerusalem | Hebrew | - | - | - | oil | √ | - | I/R (?) |
| Mid-8th-mid-7th BC | Tell Keisan (tablet) | Cuneiform | - | √ | *ninda* | bread | √ | - | I |
| Early 7th BC | Hadid (tablet) | Cuneiform | Regnal year | √ | *mina* | wife & sister given as pledge | √ | - | loan (of silver) |
| Early 7th BC | Murabbaʿât Papyrus | Hebrew | - | √ | *seah* | - | √ | - | I/r (?) |
| 7th BC | Tell el-Farʿah (S) | Aramaic | - | √ | - | expenses | - | - | r |
| | Tell Jemmeh | Philistine | - | √ | *seah* (?) | wheat (?) | √ | - | ? |
| | Tell Jemmeh | Aramaic | - | - | *homer* | grain (?) | ? | - | I |

[138] The names could refer either to the receiver or issuer of the commodities.
[139] Although these tablets date to the early eighth century BC, they are included in the Assyrian period since the site of Tell Halaf in Syria was an Assyrian province from this time.

| Period | Site | Script | Date | Personal or place name(s) | Unit | Item(s) | Qty | Total | Issue (I)/ Receipt (R)/ Record (r) |
|---|---|---|---|---|---|---|---|---|---|
| Assyrian period *(cont'd)* | | | | | | | | | |
| Late 7th BC | Tell Halaf (tablets 1-3) | Aramaic | - | √ | *homer* | barley | √ | - | loan |
| | Tell Halaf (tablet 4) | Aramaic | - | √ | *homer* | barley | √ | - | advance on credit |
| | Tell Halaf (tablet 5) | Aramaic | - | √ | *homer* | barley | √ | - | taxes (?) |
| | Meẓad Ḥashavyahu (3 & 4) | Hebrew | - | - | - | - | √ | - | ? |
| | Meẓad Ḥashavyahu (6) | Hebrew | - | √ | *sheqel* | silver | √ | - | donation/loan (?) |
| | Jerusalem | Hebrew | - | - | - | oil, grain | √ | - | ? |
| | Ashkelon | Hebrew | - | √ | - | grain | - | - | ? |
| | Arad (31) | Hebrew | - | √ | *ephah* | wheat | √ | √ | I |
| | Arad (34) | Hebrew | - | - | *ḥeḳat*, pot | barley, wheat, wine | √ | - | r (?) |
| | Arad (33) | Hebrew | - | - | *lethech*, *ḥeḳat*, *seah* | wheat | √ | - | r |
| 7th-6th BC | Jerusalem | Hebrew | - | ? | - | grain (?) | √ | - | r (?) |
| | Arad (1) | Hebrew | - | √ | *bath*, *homer* | wine, flour | √ | - | I |
| | Arad (2-4, 6-14, 16, 18, 24, 29) | Hebrew | - | √ | *bath*, *sheqels*, *lethech*, *homer* | wine, grain, bread, oil, flour, vinegar, silver, men | √ | - | I |
| | Arad (17) | Hebrew | Day of month | √ | - | oil | √ | √ | I |
| | Arad (5) | Hebrew | -<br>- | √<br>√ | -<br>*bath* | flour<br>- | -<br>- | -<br>- | I<br>R |
| | Arad (25) | Hebrew | - | √ | *ḥeḳat* | barley | √ | - | R |
| | Ḥorvat ʿUza | Edomite | - | √ | - | dough (?) | - | - | I |
| Early 6th BC | Tel Seraʿ (A1032) | Aramaic | - | √ | - | silver, olives, aloes (?) | - | - | I/R (?) |
| | Lachish (XIX) | Hebrew | - | √ | - | - | √ | - | census (?) |
| | Lachish (XX) | Hebrew | Regnal year (?) | ? | - | ? | - | - | ? |
| Babylonian period | | | | | | | | | |
| Early 6th BC | Sefire (tablet) | Aramaic | Regnal year | √ | - | - | - | - | sale (for 27 pieces of silver) |
| Persian period<br>*Papyri, ostraca and tablets* | | | | | | | | | |
| Late 6th BC | el-Hibeh (papyrus) | Aramaic | 7th year of Darius | √ | arouras | field | √ | √ | joint venture |
| Early 5th BC | Elephantine (Pap. B48+B34) | Aramaic | Regnal year | √ | *sheqels*, *hallurs* | silver | √ | - | loan |

| Period | Site | Script | Date | Personal or place name(s) | Unit | Item(s) | Qty | Total | Issue (I)/ Receipt (R)/ Record (r) |
|---|---|---|---|---|---|---|---|---|---|
| Persian period (*cont'd*) | | | | | | | | | |
| Early 5th BC | Elephantine (Pap. 29) | Aramaic | Regnal year | √ | ? | ? | ? | - | loan |
| | Elephantine (Pap. B46) | Aramaic | Regnal year | √ | *peras'* | emmer | √ | - | loan |
| | Elephantine (Pap. 49) | Aramaic | - | √ | - | wheat, barley, emmer, wool, linen | - | - | R or cancellation of debt |
| | Elephantine (Pap. 83) | Aramaic | Days of month | √ | *ardabs* | - | √ | - | column of accounts |
| Early-mid 5th BC | Lachish | Aramaic | - | - | *qab* | donkeys, barley | √ | - | I/R (?) |
| Mid-5th BC | Ashdod | Aramaic (docket ?) | - | √ | jar | wine | - | - | I/R (?) |
| Late 5th BC | Tel Mikhmoret (tablet) | Cuneiform | Regnal year | √ | - | slave | √ | - | sale (for 15 *sheqels*) |
| | Tell el-Farʿah (S) | Aramaic | - | - | *kor* | barley to sow a field | √ | - | r |
| Late 5th-early 4th BC | Tell el-Kheleifeh (2069) | Aramaic | - | - | jar | wine | √ | - | R (?) |
| | Tell el-Kheleifeh (2071) | Aramaic | - | √ | - | grain (?) | - | - | R (?) |
| Early 4th BC | Wâdi ed-Dâliyeh (Pap. 10) | Aramaic | Regnal year | √ | *sheqels* | slave given as pledge | - | - | loan (of 15 *sheqels*) |
| 4th BC | Tell el-Farʿah (S) | Aramaic | - | √ | *kor, seah* | barley, ? | √ | - | I (?) |
| | Beersheba (27-32) | Aramaic (dockets) | Day of month | √ | *seah, qab,* | barley, wheat | √ | - | taxes (?) |
| | Beersheba (36) | Aramaic | - | √ | - | - | √ | - | ? |
| | Beersheba (37-38) | Aramaic | - | √ | *mina* | - | √ | - | amounts paid (?) |
| | Beersheba (39) | Aramaic | - | √ | *peras'* | barley | √ | - | ? |
| | Beersheba (43) | Aramaic | - | √ | - | wheat | - | - | I (?) |
| | Beersheba (44) | Aramaic | - | √ | - | men (?) | √ | √ | ? |
| | Beersheba (45) | Aramaic | - | √ | *seah* | barley | √ | - | ? |
| | Beersheba (47) | Aramaic | - | - | *seah* | wheat | √ | - | sale (?) |
| | Beersheba (48) | Aramaic | Day of month | - | *qab* | wheat (?) | ? | - | sale (?) |
| | Beersheba (50) | Aramaic | - | √ | *seah (?)* | wood, barley | √ | - | I |
| 4th BC | Idumaea (1-15, 17, 27, 41, 49-53) | Aramaic | Regnal years | √ | *kor, seah, qab* | barley, wheat, flour, oil | √ | - | I, R (51) |
| | Idumaea (16, 19, 22, 24, 28, 31, 33, 35, 37-38, 42, 46) | Aramaic | Day of month | √ | sacks, baskets, *seah, qab, kor* | wine, pegs, straw, *grgr*, wheat, barley, animals | √ | - | I |

| Period | Site | Script | Date | Personal or place name(s) | Unit | Item(s) | Qty | Total | Issue (I)/ Receipt (R)/ Record (r) |
|---|---|---|---|---|---|---|---|---|---|
| Persian period *(cont'd)* | | | | | | | | | |
| 4th BC | Idumaea (16, 19, 22, 24, 28, 31, 33, 35, 37-38, 42, 46) | Aramaic | Day of month | √ | sacks, baskets, *seah*, *qab*, *kor* | wine, pegs, straw, *grgr*, wheat, barley, animals | √ | - | I |
| | Idumaea (18, 20-21, 23, 25-26, 29-30, 32, 34, 36) | Aramaic | - | √ | sacks, baskets, load, *seah*, *kor*, *qab* | straw, wood, flour, wheat, oil, barley | √ | - | I |
| | Idumaea (44, 48) | Aramaic | Day of month and/or year | √ | *seah*, *qab*, | flour, wheat | √ | - | ? |
| | Idumaea (P1, P2, P4, P15, W2) | Aramaic | Regnal year | √ | *seah*, *kor*, *qab* | barley, oil, timber | √ | - | ? |
| | Idumaea (P7) | Aramaic | Day of month | √ | - | timber | √ | - | r (?) |
| | Idumaea (Mo6) | Aramaic | Day of month | √ | *seah*, *qab* | oil | √ | - | ? |
| | Idumaea (W4) | Aramaic | - | √ | - | timber | √ | - | R (?) |
| | Idumaea (P9, P10) | Aramaic | - | √ | *seah*, *qab* | oil, mice (?) | √ | - | labels (?) |
| | Idumaea (Mo5) | Aramaic | - | √ | *seah* | vineyard | √ | - | r (?) |
| | Idumaea (P8, P11, P12, P13, Mo2, W1, W3, W5) | Aramaic | - | √ | *seah*, *qab*, *kor* | barley, barley groats, olives, wheat, timber | √ | - | ? |
| | Idumaea (P6) – stone | Aramaic | Day of month | √ | *seah* | barley, wheat | √ | - | I/R (?) |
| Mid-4th BC | Tel Seraʿ (A5607) | Aramaic | - | √ | *bath* | - | √ | - | ? |
| | Hebron | Aramaic (docket) | 2nd year of Artaxerxes III | √ | *seah* | barley | √ | - | taxes (?) |
| | Arad (1-13, 15-17, 20, 22, 24-25, 27, 30, 36) | Aramaic | Day of month | √ | *seah*, *qab* | barley, flour | √ | - | I |
| 2nd half of 4th BC | Ketef Yeriḥo (papyrus) | Aramaic | - | √ | *sheqels*, *rib ʿīn*, *mā ʿāt* | - | √ | √ | loans/list of taxes (?) |
| Late 4th BC | Nebi Yunis | Aramaic | - | √ | *sheqels* | silver (?) | ? | - | donation |
| | Tell Jemmeh (1-6) | Aramaic | Day of month | √ | *qab*, *seah*, *kor* | barley, wheat, wine | √ | On No. 3 | taxes (?) |
| | Tel ʿIra | Aramaic | - | √ | *seah* | barley | √ | - | ? |

Table 5.1: Collation of epigraphic material

*5.2.1.1 Tenth-eighth centuries BC*

It appears that only ostraca were used to record information during the period that covers the reigns from David to Hezekiah of Judah and Hoshea of Israel. The most extensive archives are those from Arad and Samaria, which were written in Hebrew script. No dates were recorded on any of the Arad Ostraca from this period; however, names and quantities appear on all of them. These comprise either issues or receipts of grain and, possibly, other unknown commodities. One of the ostraca (No. 49) may have concerned offerings for the temple at the site. Taking into consideration that throughout this period, a fortress, rebuilt in subsequent periods, as well as storehouses were located at Arad and despite bearing only the minimum amount of information, the ostraca reflect a practice of recording transactions of goods being received and redistributed to individuals.

With one or two exceptions, all the Samaria Ostraca bear the regnal years of a king. If, as Franklin (2004:196; 2008:51) asserts, the Ostraca House was built during Building Period II, which she attributes, at least, partly to Jehu, the rest of this building period must be attributed to those following him, which would be any one of Jehoahaz, Jehoash and Jeroboam II (see 2.3.2.4). Since Kaufman (1982:231) has determined that the ostraca are older than the building and have been dated by him to the second quarter of the eighth century BC (see 4.7.1.2[a]), this must then imply that the Ostraca House must have been built, at the very least, during the latter part of Jeroboam's reign, in other words, after year fifteen of his reign. This also allows sufficient time for the modifications to be made to the building and for its destruction in 722/721 BC (Kaufman 1982:232). Rainey (1988:69-71) and Aharoni's (1968a:323-324) suggestion to attribute the ostraca to Jehoash/Jeroboam is not improbable since the building could still have been constructed during Jeroboam's reign and remodelled at a later stage. Dating the ostraca to the time of Jehoahaz or to Jehoahaz/Jehoash would suggest that the construction and modifications of the building could also have been carried out before its destruction. The final answer, however, must either be left to the experts for further consideration or await possible additional information. Nevertheless, other information found on the ostraca are names and quantities of old wine and fine oil that were received by the royal storehouses at Samaria; however, only the ostraca from years nine and ten record the commodities, which leaves Shea's (1985:18) suggestion open for consideration (see 4.7.1.2[b]). Irrespective of the intended use for these commodities, the ostraca record the necessary information for accounting purposes, such as what was received, when and how much was received and from whom it was received. As Crowfoot et al (1957:9) state, it is

possible that these ostraca were merely temporary records to be summarised on another document at a later stage.

The three remaining ostraca from this period, the Barley Letter, found near a shrine located outside the city of Samaria, and two ostraca from Tell Qasîle, located on the Phoenician coast, do not bear any dates, but do contain information regarding what and how much was issued and to whom.

#### *5.2.1.2 The Assyrian period (eighth-early sixth centuries BC)*

The cuneiform tablets from the archive of Mannu-ki-mat-Assur, the Assyrian governor at Tell Halaf in Syria, bear no dates, but have names and quantities on all four the tablets discussed as well as total quantities on three of the tablets. These three tablets appear to be, possibly, inventory lists of animals, while the fourth is an issue of miscellaneous items to certain individuals. A tablet from Samaria bears the day and month, names and quantities and, since an Assyrian governor is mentioned, may comprise either a delivery of animals to him or a payment of tax. The Tell Keisan tablet records quantities of rations, using an Assyrian measure, that were issued to specified individuals, but bears no date. The last cuneiform tablet from this period is from Hadid and comprises an antichretic pledge whereby the debtor pledges an asset in lieu of interest. A penalty clause is also included. Though in reality a legal document, it also contains information that could be used for accounting purposes, such as the date, the names of the debtor and the creditor (who may be Mesopotamian) and the amount borrowed. These tablets attest to the use of cuneiform used by the Assyrian administration and, possibly, Mesopotamian immigrants in Syria-Palestine during the eighth and early seventh centuries BC. A single papyrus from the Assyrian period (early seventh century BC) is the Murabbaʿât Papyrus, written in Hebrew, which bears no date and could be either a record of quantities of an unnamed commodity held by the persons listed or, more likely, an issue of that commodity to those individuals. Other tablets from Tell Halaf (late seventh century BC) are written in Aramaic and also belong to an archive, that of El-manāni, a barley and money-lender. They contain the names of debtors and quantities of barley, but no dates. Three comprise loans, one is an advance on credit and the other, possibly, a payment of tax in kind and further demonstrate the manner in which accounting was conducted in Assyrian centres.

The ostraca representing accounting entries from the Assyrian period in Palestine date from the seventh century BC up to the end of the period, circa 627 BC. With the exception of a handful that were written in Aramaic and two in the Philistine and Edomite scripts, most were written in Hebrew. Their geographical distribution includes Philistia (Tell el-Farʿah South, Tell Jemmeh, Ashkelon and Tel Seraʿ), Judah (Jerusalem, Meẓad Ḥashavyahu, Arad and Lachish) and the Negev (Ḥorvat ʿUza). Tell el-Farʿah (South), Tell Jemmeh and Tel Seraʿ were part of the kingdom of Gaza and, together with Ashkelon, were semi-autonomous as long as they towed the line with Assyria (see 3.2.1.2[c]). Based on a considerable increase in size, Jerusalem was, by all accounts, a flourishing city under the control of the Judaean kings, having escaped destruction by the Assyrians (see 2.3.2.6; 3.2.1.1). Arad and Ḥorvat ʿUza were Judaean fortresses prior to and during the Assyrian period that were erected to protect the border of Judah against the Edomites (see 2.3.2.9; 4.7.2.1[g]). Meẓad Ḥashavyahu was a fortress erected, most probably, by Josiah just prior to his fatal clash with Pharaoh Necho (see 4.7.2.1[d]). During the early sixth century BC, Lachish Level II was a much smaller settlement that the previous extensive settlements and, based on the Lachish Letters, most probably served mainly as a Judaean military post (see 2.3.2.8; 4.7.2.1[i]). Only one of the ostraca (Lachish XX) bears part of a date and most bear names and quantities or amounts supplied, received, lent or paid as tax. An ostracon from Tell el-Farʿah South is a record of expenses.

#### *5.2.1.3 The Babylonian period (sixth century BC)*

In line with the character of archaeological sites, the Babylonian period in Palestine has not yielded close to the same amount of epigraphic evidence that can be used to establish what processes were in place to record economic data. The only specimen I was able to obtain was the Sefire tablet from Syria. This records the sale of some unknown commodity for the price of 27 pieces of silver during the 34$^{th}$ regnal year of Nebuchadnezzar.

#### *5.2.1.4 The Persian period (late sixth-late fourth centuries BC)*

The Persian period has yielded the most epigraphic evidence comprising ostraca, tablets and papyri. Beginning with the late sixth century BC, the Bauer-Meissner Papyrus from el-Hibeh in Egypt is written in Aramaic and contains information regarding a joint venture between a Palestinian and an Egyptian. It bears the date and the names of the two parties involved. Modern joint venture transactions are recorded in the accounting records of each party

whereby the net effect of income earned and expenses incurred are recorded against a joint venture control account. Though this papyrus comprises only the legal agreement between the two parties, it highlights the fact that joint ventures have been in practice since ancient times. The Elephantine papyri from the early fifth century BC, also written in Aramaic, mainly comprise loans or cancellations thereof. Four of the six papyri discussed in Chapter Four bear dates and one, which is a list of accounts (Papyrus 83), records specific days of a specific month. Three of the four loan agreements provide the necessary information required to make accounting entries, such as the debtor and the creditor, the amount of silver or quantity of emmer borrowed, the rate or amount of repayment and the rate of interest, which was to be capitalised if it was not paid. Furthermore, one of the agreements stipulated that the creditor was to provide receipts to the debtor for payments made. Papyrus 49, which records either the cancellation of a debt or the return of goods taken as security for a debt, states the debtor and the creditor and the items borrowed or returned. The Tell Mikhmoret cuneiform tablet dates to the reign of Cambyses II (late fifth century BC), although it probably originated in Babylonia and is written in Neo-Babylonian script. Accounting information includes the amount of the sale and the 'item' sold, a slave girl. The early fourth century BC papyrus from the Wâdi ed-Dâliyeh provides a date during the reign of Artaxerxes, probably the II, and concerns a loan for which a slave is given as security. Eli is, most likely, the debtor and Yehoselah, the creditor. A fourth century BC papyrus from Ketef Yeriḥo reflects a typical loan account, recording amounts lent on one side and amounts repaid on the reverse, although Carter (1999:166) suggests it may be a tax roster, also indicating amounts owing and amounts already paid.

All ostraca from the Persian period were written in Aramaic. Fifth-early fourth century BC ostraca include one ostracon from Lachish, a docket from Ashdod and ostraca from Tell el-Farʿah (South) and Tell el-Kheleifeh. No dates are recorded on these ostraca; however, other information, such as items and quantities appear on most of them. Nevertheless, it is difficult to ascertain whether these ostraca concern receipts or issues of the specific items. The ostracon from Ashdod is either a docket detailing a delivery of wine or a jar label and one of the ostraca from Tell el-Farʿah (South) records amounts of barley required for sowing two fields. The numerous fourth century BC ostraca include those from Beersheba and Idumaea. Six of the ostraca from Beersheba are dockets regarded by Naveh (1979:182, 193) as tax payments received. They mention, in most cases, the day of the month on which the transaction was recorded as well as items and quantities received. The other ostraca from Beersheba do not bear any dates, but for the most part, mention the items and quantities either

received or issued. Two ostraca (Nos. 37 and 38) concern amounts of silver received from the persons listed and may represent invoices for items sold. Since another two ostraca (Nos. 47 and 48) mention the phrase 'through a merchant' together with quantities of wheat, they, most likely, refer to a sale. In many cases, the ostraca from Idumaea contain dates, the names of the issuer/seller and receiver/buyer as well as items and quantities received or issued/sold. Thirty-three of the ostraca belong to the archive of Ḥalfat who issued goods to Baʿalʿid and an additional three concern issues from Zabdi to Baʿalʿid. One ostracon (P7) may represent an inventory record of timber and another (Mo5) a record of land measurements. The only information available on an ostracon from Tel Seraʿ in Philistia is names against which quantities measured in *bath* are written. A docket from Hebron, dated by Naveh (1985b:118) to the second year of Artaxerxes III, may refer to a receipt of taxes. The Arad ostraca from the fourth century BC all contain dates (days and months) and the names of persons who received quantities of barley or flour. The ostracon from Nebi Yunis records a donation of money; the ostraca from Tell Jemmeh represent barley, wheat and wine, possibly, received as tax payments; and the ostracon from Tel ʿIra mentions only a quantity of barley belonging to or issued by the person named.

### 5.2.2 The development of the accounting processes in Palestine

According to Glautier (1983:57), strong forms of centralised power looked to the concept of control as the central purpose of accounting as opposed to that of modern accounting, which, although control is an important issue, is focused on monetary measurement. This is reflected in the fact that recordkeeping and accounting processes were developed prior to the existence of money. The centralised polities that existed in Palestine during the period under discussion were the United and Divided Monarchies and the Assyrians, Babylonians and Persians.

Prior to the Assyrian period in Palestine, evidence for accounting processes are reflected mainly in the Arad Ostraca from Judah and the Samaria Ostraca from Israel. Both groups reflect the influence of centralised administrations even, as with Arad, in centres located far from the capital. Throughout this period, Arad was a Judaean military fortress with a temple and storehouses, while Samaria was established as the capital of the northern kingdom from the time of the division of the Monarchy. The ostraca reveal the need of the central authorities to maintain control of issues and receipts from and to the royal storehouses as well as to retain control of its subjects.

During the Assyrian period, the number of artefacts increased substantially. Cuneiform artefacts date to the early part of the Assyrian period, while Aramaic and Hebrew artefacts date to the latter part. The influence of the Assyrian regime can be observed at sites that were Assyrian administrative centres, such as Tell Halaf, Tell Keisan and Hadid, or Assyrian fortresses, such as Tell Jemmeh and Tel Seraʿ. An Assyrian garrison was also stationed at Tell el-Farʿah (South). Sites that were under Judaean control include the fortress sites of Meẓad Ḥashavyahu, Arad and Ḥorvat ʿUza as well as the settlement at Lachish. This is, perhaps, reflected in the type of script used; in most cases, sites under Assyrian control initially used cuneiform and later Aramaic, whereas sites under Judaean control continued to use Hebrew. Even though a central authority was not the initiator of some of the transactions, its influence and its involvement can be detected in the manner in which transactions were recorded.

Unfortunately, on the basis of the evidence from the Babylonian period, nothing can be deduced regarding the accounting processes and how these were influenced by the Babylonian authorities.

The Persian period in Palestine yielded more artefacts than the other periods combined. With the exception of one tablet from Tell Mikhmoret which was written in cuneiform, all the artefacts were written in Aramaic. This attests that Aramaic was the *lingua franca* during the Persian period (Stern 2001:362). Persian-period fortresses or garrisons were located at Elephantine, Ashdod, Tell el-Farʿah (South), Tell el-Kheleifeh, Tel Seraʿ, Arad and Tell Jemmeh. Lachish, Arad and Tell el-Kheleifeh all formed part of Idumaea during the Persian period. Based on the public building/palace at Lachish, the site, most likely, served as an administration centre, while Arad served as a way station in order to maintain control over the trade routes and Tell el-Kheleifeh served as a trading post. The involvement of the Persian authorities in the administration of Palestine is, therefore, amply demonstrated and their influence on accounting processes can also be observed in the artefacts found at the above-mentioned sites.

It appears that the accounting processes in Palestine, more or less, followed the same pattern throughout the period under discussion, increasing in quantity and the type of information recorded. During the early period of the Monarchy, only ostraca were used and these were written in Hebrew. The Assyrians introduced cuneiform and tablets, although this occurred mainly in Syria; sites in Palestine continued to use ostraca. On the basis of the Murabbaʿât Papyrus, papyrus was, probably, also used, but no other evidence has yet been found. For the

most part, ostraca continued to be written in Hebrew, although the Philistine and Edomite scripts were also used at sites in or near those regions. The Aramaic script also appears on epigraphic material from Palestine during this period. During the Persian period, with one or two exceptions, all epigraphic material was written in Aramaic. The number and types of commodities recorded on the artefacts increased over the period, beginning with grain, wine and oil and progressing to include animals, clothing, ornaments, wood, silver, slaves, men and land measurements. The purposes for which these records were written, where these can be determined, range from simple receipts and issues prior to the Assyrian period to inventory lists, loans, sales, leases, account records, donations and the receipt of taxes from the Assyrian period onwards. It appears, therefore, that with the introduction of each new regime (the Babylonians excepted), the recording of accounting information took the new aspects thereof into consideration.

It is unfortunate that, other than inscriptions and other epigraphic material produced by the Assyrians, Babylonians and Persians as well as the biblical record, there is no archaeological or epigraphic material from Palestine that refers to the tributes paid by the Judaean and Israelite kings.

### 5.2.3 Conformation to the definition of accounting

The definition of accounting as laid out in Chapter One is as follows:

- To select relevant information (‘to gather/pick/sort’);
- To perform calculations (‘to count/calculate/number’);
- To record the information (for others ‘to read’); and
- To give account (‘to say’).

The above discussion shows that specific information was selected. In many cases, not all the information is legible or it is absent. This can be due to a number of factors: only fragmented pieces have been preserved; time and environmental factors have reduced the legibility of the writing; and the amount of information recorded was deemed at the time to be sufficient for the immediate purpose since the authors of these documents would not have thought of their importance for the far distant future. The recording of amounts or quantities or performing calculations can also be observed on the various artefacts; the majority contain quantities issued, received or counted and a handful also record totals aggregated. The information selected was recorded on various mediums for others to read and, as already mentioned, it was

most likely sufficient for the purpose a specific artefact was to serve. It is, however, more difficult to determine whether the last component of the definition has been achieved, namely, to give account or to report on the information. Unfortunately, there is no archaeological evidence to provide an answer. The opinions of Reisner et al (1924:231-232) and Rainey (1979:91) regarding the Samaria Ostraca can also be applied to the other evidence, namely, that many of these artefacts, particularly the ostraca, could have been temporary notes that were meant to be summarised at a later stage on papyrus, which is not as conducive to preservation as clay.

### 5.2.4 Summary of contributions to the field of study

The primary aim of this dissertation, as stated in Chapter One, was to conduct a study of the accounting processes adopted in Palestine from the beginning of the first millennium BC until the end of Persian rule in the region and to determine the development of these processes during this period. Based on the evidence provided by this study to address the goals of this research, this study discloses the accounting processes that were employed during the first millennium BC in Palestine and how these developed to accommodate the particular needs and requirements of the various polities and the concomitant commerce that arose as a result thereof. These processes were, therefore, employed with specific objectives in mind, mainly to ensure that the concept of control was maintained. Furthermore, with the exception of the fourth component of the definition of accounting for which I was unable to obtain definitive evidence, the accounting processes applied during the first millennium BC in Palestine conform to the stated definition of accounting.

### 5.2.5 Possibilities for future research

Due to limitations in scope and length, the archaeological and epigraphic evidence discussed in this study regarding the different accounting processes adopted in Palestine during the first millennium BC is not, by any means, exhaustive. Furthermore, the study focuses on a limited time period. Future studies may include additional evidence in the form of ostraca, tablets and papyri not included here as well as expanding the period covered by this study.

# ABBREVIATIONS

| | |
|---|---|
| *AASOR* | *Annual of the American Schools of Oriental Research* |
| *ABD* | *Anchor Bible Dictionary.* Edited by DN Freedman, 1992 |
| *AHJ* | *Accounting Historians Journal* |
| *AJA* | *American Journal of Archaeology* |
| *AJT* | *American Journal of Theology* |
| *Arch* | *Archaeology* |
| *AUSS* | *Andrews University Seminary Studies* |
| *BA* | *Biblical Archaeologist* |
| *BAR* | *Biblical Archaeology Review* |
| *BAR-IS* | *British Archaeological Reports (International Series)* |
| *BASOR* | *Bulletin of the American Schools of Oriental Research* |
| *BAT* | *Biblical Archaeology Today* |
| *BZAW* | *Beihefte zur Zeitschrift fur die alttestamentliche Wissenschaft* |
| *DB* | *Dictionary of the Bible.* Edited by JM Hastings, 1950 |
| *DMOA* | *Documenta et Monumenta Orientis Antiqui* |
| *EAEHL* | *Encyclopaedia of Archaeological Excavations in the Holy Land.* Edited by M Avi-Yonah & E Stern, 1978 |
| *EI* | *Eretz-Israel, Archaeological, Historical and Geographical Studies* |
| *ESI* | *Excavations and Surveys in Israel* |
| *HTR* | *Harvard Theological Review* |
| *IEJ* | *Israel Exploration Journal* |
| *IMJ* | *Israel Museum Journal* |
| *INJ* | *Israel Numismatic Journal* |
| *JAMT* | *Journal of Archaeological Method and Theory* |
| *JAOS* | *Journal of the American Oriental Society* |
| *JBL* | *Journal of Biblical Literature* |
| *JCS* | *Journal of Cuneiform Studies* |
| *JEA* | *Journal of Egyptian Archaeology* |
| *JANESCU* | *Journal of the Ancient Near Eastern Society of Columbia University* |
| *JNES* | *Journal of Near Eastern Studies* |
| *JPOS* | *Journal of the Palestine Oriental Society* |
| *JQR* | *Jewish Quarterly Review* |
| *JRAS* | *Journal of the Royal Asiatic Society of Great Britain and Ireland* |
| *JSOT* | *Journal for the Study of the Old Testament* |
| *JSOTSup* | *Journal for the Study of the Old Testament Supplement* |
| *NEA* | *Near Eastern Archaeology* |
| *NEAEHL* | *New Encyclopaedia of Archaeological Excavations in the Holy Land*, Vol. 2. Edited by E Stern, 1993a |
| *NEAEHL* | *New Encyclopaedia of Archaeological Excavations in the Holy Land*, Vol. 3. Edited by E Stern, 1993b |
| *PEQ* | *Palestine Exploration Quarterly* |
| *PJb* | *Pälastina Jahrbuch* |
| *QDAP* | *Quarterly of the Department of Antiquities of Palestine* |
| *RSR* | *Religious Studies Review* |
| *TA* | *Tel Aviv* |
| *TAR* | *The Accounting Review* |
| *UF* | *Ugarit-Forschungen* |
| *VT* | *Vetus Testamentum* |
| *VTSup* | *Vetus Testamentum Supplement* |
| *Yediot* | *Bahaqirat Eretz-Israel Weatiqoteha (Bulletin of the Israel Exploration Society)* |
| *ZA* | *Zeitschrift für Assyriologie und Vorderasiatische Archaologie* |
| *ZDPV* | *Zeitschrift des Deutschen Pälastina-Vereins* |

# BIBLIOGRAPHY


AAA (American Accounting Association). 1966. *A statement of basic accounting theory*. Evanston: American Accounting Association.

Adams, C 2001. *For good and evil: the impact of taxes on the course of civilization*. 2nd ed. Lanham: Madison.

Aharoni, Y 1956. Excavations at Ramath Raḥel, 1954: preliminary report. *IEJ* 6(3), 137-157.

Aharoni, Y 1958. The Negeb of Judah. *IEJ* 8(1), 26-38.

Aharoni, Y 1961. Excavations at Ramat Rahel. *BA* 24(4), 97-118.

Aharoni, Y 1962. *Excavations at Ramat Rahel: Seasons 1959 and 1960*. Rome: Centro di studi Semitici.

Aharoni, Y 1965. The citadel of Ramat Rahel. *Arch* 18(1), 15-25.

Aharoni, Y 1966a. Hebrew ostraca from Tel Arad. *IEJ* 16(1), 1-7.

Aharoni, Y 1966b. The use of hieratic numerals in Hebrew ostraca and the shekel weights. *BASOR* 184, 13-19.

Aharoni, Y 1968a. *The land of the Bible: a historical geography*. London: Burns and Oates.

Aharoni, Y 1968b. Trial excavation in the 'Solar Shrine' at Lachish: preliminary report. *IEJ* 18(3), 157-169.

Aharoni, Y 1968c. Arad: its inscriptions and temple. *BA* 31(1), 1-32.

Aharoni, Y 1970. Three Hebrew ostraca from Arad. *BASOR* 197, 16-42.

Aharoni, Y 1972. The stratification of Israelite Megiddo. *JNES* 31(4), 302-311.

Aharoni, Y 1974a. The building activities of David and Solomon. *IEJ* 24(1), 13-16.

Aharoni, Y 1974b. Excavations at Tel Beer-Sheba: preliminary report of the fourth season, 1972. *TA* 1(1), 34-42.

Aharoni, Y 1975. Excavations at Tel Beer-Sheba: preliminary report of the fifth and sixth seasons, 1973-1974. *TA* 2(4), 146-168.

Aharoni, Y 1981. *Arad inscriptions*. Jerusalem: Israel Exploration Society.

Aharoni, M & Aharoni, Y 1976. The stratification of Judahite sites in the 8th and 7th centuries B.C.E. *BASOR* 224, 73-90.

Aharoni, Y & Amiran, R 1958. A new scheme for the sub-division of the Iron Age in Palestine. *IEJ* 8(3), 171-184.

Aharoni, Y & Amiran, R 1964. Arad: a biblical city in southern Palestine. *Arch* 17(1), 43-53.

Aharoni, M & Rainey, AF 1985. On 'The Israelite fortress at Arad'. *BASOR* 258, 73-74.

Ahlström, GW 1978. Wine presses and cup-marks of the Jenin-Megiddo survey. *BASOR* 231, 19-49.

AICPA (American Institute of Certified Public Accountants). 1953. *Accounting terminology bulletin No. 1: review and résumé*. New York: American Institute of Certified Public Accountants.

Albright, WF 1933. A new campaign of excavation at Gibeah of Saul. *BASOR* 52, 6-12.

Albright, WF 1936a. A supplement to Jeremiah: the Lachish Ostraca. *BASOR* 61, 10-16.

Albright, WF 1936b. Ostracon C1101 of Samaria. *PEQ* 68(4), 211-215.

Albright, WF 1938. The oldest Hebrew letters: the Lachish Ostraca. *BASOR* 70, 11-17.

Albright, WF 1939. A reëxamination of the Lachish Letters. *BASOR* 73, 16-21.

Albright, WF 1941. The Lachish Letters after five years. *BASOR* 82, 18-24.

Albright, WF 1942. A votive stele erected by Ben-Hadad I of Damascus to the God Melcarth. *BASOR* 87, 23-29.

Albright, WF 1943a. The excavation of Tell Beit Mirsim, Vol. III: the Iron Age. *AASOR* 21-22. New Haven: American Schools of Oriental Research.

Albright, WF. 1943b. The Gezer Calendar. *BASOR* 92, 16-26.

Albright, WF 1953. New light from Egypt on the chronology and history of Israel and Judah. *BASOR* 130, 4-11.

Albright, WF 1958. Recent progress in Palestinian archaeology: Samaria-Sebaste III and Hazor I. *BASOR* 150, 21-25.

Albright, WF 1964. The Beth-Shemesh tablet in alphabetic cuneiform. *BASOR* 173, 51-53.

Amiran, R & Eitan, A 1970. Excavations in the courtyard of the Citadel, Jerusalem, 1968-1969 (preliminary report). *IEJ* 20(1/2), 9-17.

Astour, MC 1971. 841 B.C.: the first Assyrian invasion of Israel. *JAOS* 91(3), 383-389.

Avigad, N 1958. New light on the MṢH seal impressions. *IEJ* 8(2), 113-119.

Avigad, N 1961. The Jotham seal from Elath. *BASOR* 163, 18-22.

Avigad, N 1965. Seals of exiles. *IEJ* 15(4), 222-232.

Avigad, N 1966. An Aramaic Inscription on the Tell Dan Bowl. *Yediot* 30, 209-212 (Hebrew).

Avigad, N 1968. A sculptured Hebrew stone weight. *IEJ* 18(3), 181-187.

Avigad, N 1970. Excavations in the Jewish Quarter of the Old City of Jerusalem, 1970 (Second Preliminary Report). *IEJ* 20(3/4), 129-140.

Avigad, N 1972. Two Hebrew inscriptions on wine-jars. *IEJ* 22(1), 1-9.

Avigad, N 1976a. Bullae and seals from a post-exilic Judean archive. *Qedem* 4, 1-36.

Avigad, N 1976b. *Archaeological discoveries in the Jewish Quarter of Jerusalem: Second Temple period*. Jerusalem: Israel Exploration Society.

Avigad, N 1979. Hebrew epigraphic sources, in Malamat (1979b:20-43).

Avigad, N 1983. *Discovering Jerusalem.* Nashville: Nelson.

Avigad, N 1990. Two Hebrew 'fiscal' bullae. *IEJ* 40(4), 262-266.

Avigad, N 1997. *Corpus of West Semitic stamp seals*. Jerusalem: The Israel Academy of Sciences and Humanities.

Avi-Yonah, M 1954. The walls of Jeremiah – a minimalist view. *IEJ* 4(3/4), 239-248.

Avi-Yonah, M 1971. The newly-found wall of Jerusalem and its topographical significance. *IEJ* 21(2/3), 168-169.

Avi-Yonah, M & Stern, E 1978. *Encyclopaedia of Archaeological Excavations in the Holy Land.* Oxford: Oxford University Press.

Baramki, J 1943. A hoard of silver coins of Sidon and Alexander from Khirbet el Kerak. *QDAP* 2, 86-90.

Barkay, G 1981. Iron Age gerah weights. *EI* 15, 288-296 (in Hebrew with English summary).

Barkay, G 1993. The redefining of archaeological periods: does the date 588-586 B.C.E. indeed mark the end of the Ion Age culture? *BAT* II, 106-109.

Barkay, R 1984-5. An archaic Greek coin from the 'Shoulder of Hinnom' excavations in Jerusalem. *INJ* 8, 1-5.

Barnett, RD 1958. The siege of Lachish. *IEJ* 8(3), 161-164.

Barnett, RD, Leveen, J & Moss, C 1948. A Phoenician inscription from Eastern Cilicia. *Iraq* 10(1), 56-71.

Bedford, P 2001. *Empire and exploitation: the Neo-Assyrian Empire*. Paper presented at the Social Science History Institute, Stanford University, Stanford, 21-22 May. From: https://ia800302.us.archive.org/8/items/Bedford2001EmpireAndExploitationTheNeo-assyrianEmpire2001/Bedford2001EmpireAndExploitationTheNeo-assyrianEmpire.pdf (accessed 11 December 2014).

Beebe, HK 1968. Ancient Palestinian dwellings. *BA* 31(2), 37-58.

Beit-Arieh, I & Cresson, B 1985. An Edomite ostracon from Ḥorvat ʿUza. *TA* 12(1), 96-101.

Beit-Arieh, I & Cresson, B 1991. Ḥoryat ʿUza: a fortified outpost on the eastern Negev border. *BA* 54(3), 126-135.

Ben-Ami, D 2012. The Iron Age II (strata VIII-VII), in Ben-Tor, Ben-Ami & Sandhaus (2012:154-285).

Ben-Tor, A, Ben-Ami, D & Sandhaus, D (eds) 2012. *Hazor VI: the 1990-2009 excavations – the Iron Age.* Jerusalem: Israel Exploration Society.

Betlyon, JW 1982. *The coinage and mints of Phoenicia: the pre-Alexandrine period*. Harvard Semitic Series, 26. Chicago: Scholars.

Betlyon, JW 2005. A people transformed Palestine in the Persian period. *NEA* 68(1/2), 4-58.

Bible. 1976. *The Holy Bible: Old and New Testaments in the King James Version*. Nashville: Thomas Nelson.

Bible, 1990. *The Thompson Chain Reference Bible: New International Version.* Indianapolis: BB Kirkbride.

Bijovsky, G 2009. The Levant, in Amandry, M & Bateson, D (eds), *A survey of numismatic research: 2002-2007*. Special Publication 15. Glasgow: International Association of Professional Numismatists, 1-51.

Biran, A 1974a. Tel Dan. *BA* 37(2), 26-51.

Biran, A 1974b. Notes and news: Tel Dan. *IEJ* 24(3/4), 262-264.

Biran, A & Cohen, R 1979. Notes and News: Tel 'Ira. *IEJ* 29(2), 124-125.

Biran, A & Naveh, J 1993. An Aramaic stele fragment from Tel Dan. *IEJ* 43(2/3), 81-98.

Birnbaum, S 1942. The dates of the Gezer tablet and of the Samaria Ostraca. *PEQ* 74(2), 104-108.

Birnbaum, S 1957. The sherds, in Crowfoot, Crowfoot & Kenyon (1957:9-33).

Blakely, JA & Hardin, JW 2002. Southwestern Judah in the late eighth century B.C.E. *BASOR* 326, 11-64.

Bliss, JF 1894. *A mound of many cities*. New York: MacMillan.

Blue Letter Bible 2015. *Peras'.* From: http://www.blueletterbible.org/lang/Lexicon/Lexicon.cfm?strongs=H6537&t=KJV (accessed 30 June 2015).

Borowski, O 1995. Hezekiah's reforms and the revolt against Assyria. *BA* 58(3), 148-155.

Bright, J 2000. *A history of Israel.* 4th ed. Kentucky: Westminster John Knox.

British Museum [sa]. *Weight*. From: http://www.britishmuseum.org/research/collection_online/collection_object_details.aspx?objectId=367895&partId=1&people=93650&peoA=93650-3-12&sortBy=imageName&view=list&page=2 (accessed 23 January 2015).

Broshi, M 1974. The expansion of Jerusalem in the reigns of Hezekiah and Manasseh. *IEJ* 24(1), 21-26.

Broshi, M 2001. *Bread, wine, walls and scrolls.* Sheffield: Sheffield Academic.

Buchanan, BW 1954. Lachish III: the Iron Age by O. Tufnell. *AJA* 58(4), 335-339.

Bunimovitz, S, Lederman, Z & Manor, DW 2009. The archaeology of border units: renewed excavations at Tel Beth-Shemesh, Part 1: the Iron Age. *NEA* 72(3), 114-142.

Business Dictionary 2015. Taxation. From: http://www.businessdictionary.com/definition/taxation.html (accessed 11 July 2015).

Cahill, JM 1995. Rosette stamp seal impressions from ancient Judah. *IEJ* 45(4), 230-252.

Cahill, JM 1997. A rejoinder to "Was the Siloam Tunnel built by Hezekiah?". *BA* 60(3), 184-185.

Cahill, JM 1998. David's Jerusalem: fiction or reality? It is there: the archaeological evidence proves it. *BAR* 24(4). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=24&Issue=4&ArticleID=2&UserID=2391 (accessed 12 June 2015).

Cahill, JM 2003. Jerusalem at the time of the United Monarchy: the archaeological evidence, in Vaughn & Killebrew (2003:13-80).

Carter, CE 1999. *The emergence of Yehud in the Persian period: a social and demographic study*. Sheffield: Sheffield Academic.

Center for Online Judaic Studies. 2014. *Arad ostraca, c. 600 BCE*. From: http://cojs.org/arad_ostraca-_c-_600_bce/ (accessed 18 April 2014).

Center for Online Judaic Studies. 2014. *Samaria ostraca, 8th century BCE*. From: http://cojs.org/samaria_ostraca-_8th_century_bce/ (accessed 18 April 2014).

Chambon, A 1993. s v 'Far'ah, Tell el- (North)', in *NEAEHL* 2:439-440.

Chiera, E 1938. *They wrote on clay.* Chicago: The University of Chicago Press.

Clackson, J & Horrocks, G 2007. *The Blackwell history of the Latin language*. Chichester: Wiley-Blackwell.

Cogan, M 1974. *Imperialism and religion: Assyria, Judah and Israel in the eighth and seventh centuries B.C.E*. Montana: Scholars.

Cogan, M 2000. Cyrus: Cyrus Cylinder, in Hallo, WW (ed), *The context of Scripture, Vol. II: monumental inscriptions from the Biblical world*. Leiden: Brill, 314-316.

Cohen, R 1985. The fortresses King Solomon built to protect his southern border: string of desert fortresses uncovered in central Negev. *BAR* 11(3). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=11&Issue=3&ArticleID=3&UserID=2391 (accessed 2 January 2015).

Cohen, Y 2008. Cuneiform in Canaan: cuneiform sources from the land of Israel in ancient times by Horowitz, W & Oshima, T. *BASOR* 349, 83-86.

Cook, HJ 1964. Pekah. *VT* 14(2), 121-135.

Cornelius, L 2012. The dating of the Siloam Tunnel: an explanation and critical analysis of current interpretation. Unpublished Honn BA [Bib. Arch.] article, Unisa, Pretoria.

Cowley, A 1923. *Aramaic papyri of the fifth century B.C.* Oxford: Oxford University Press.

Cowley, A 1929. Two Aramaik ostraca. *JRAS* 1, 107-112.

Crenshaw, JL 1985. Education in Ancient Israel. *JBL* 104(4), 601-615.

Crenshaw, JL 1998. *Education in Ancient Israel: across the deadening silence*. New York: Doubleday.

Cross, FM (Jr) 1955. Archaeological news: Geshem, the Arabian, enemy of Nehemiah. *BA* 18(2), 46-47.

Cross, FM (Jr) 1956. Lachish Letter IV. *BASOR* 144, 24-26.

Cross, FM (Jr) 1962a. Epigraphical notes on Hebrew documents of the eighth-sixth centuries B.C.: III. The inscribed jar handles from Gibeon. *BASOR* 168, 18-23.

Cross, FM (Jr) 1962b. Epigraphical notes on Hebrew documents of the eighth-sixth centuries B.C.: II. The Murabba'ât Papyrus and the letter found near Yabneh-yam. *BASOR* 165, 34-46.

Cross, FM (Jr) 1963. The discovery of the Samaria papyri. *BA* 26(4), 109-121.

Cross, FM (Jr) 1964. An ostracon from Nebī Yūnis. *IEJ* 14(3), 185-186.

Cross, FM (Jr) 1968. The Canaanite cuneiform tablet from Taanach. *BASOR* 190, 41-46.

Cross, FM (Jr) 1969. Judean stamps. *EI* 9, 20-27.

Cross, FM (Jr) 1973. Notes on the Ammonite inscription from Tell Sīrān. *BASOR* 212, 12-15.

Cross, FM (Jr) 1974. The papyri and their historical implications, in Lapp, PW & Lapp, NL (eds) 1974, Discoveries in the Wâdi ed-Dâliyeh. *AASOR* 41, 17-32.

Cross, FM (Jr) 1975. Ammonite ostraca from Heshbon: Heshbon Ostraca IV-VIII. *AUSS* 13, 1-20.

Cross, FM (Jr) 1980. Newly found inscriptions in Old Canaanite and early Phoenician scripts. *BASOR* 238, 1-20.

Cross, FM (Jr) 2001. A fragment of a monumental inscription from the City of David. *IEJ* 51(1), 44-47.

Cross, FM (Jr) 2003. *Leaves from an epigrapher's notebook*. Winona Lake: Eisenbrauns.

Cross, FM (Jr) & Freedman, DN 1952. *Early Hebrew orthography: a study of the epigraphic evidence.* New Haven: American Oriental Society.

Cross, FM (Jr) & Freedman, DN 1953. Josiah's revolt against Assyria. *JNES* 12(1), 56-58.

Crowfoot, JW & Crowfoot, GM 1933. The ivories from Samaria. *PEQ* 65(1), 7-26.

Crowfoot, JW & Crowfoot, GM 1938. *Early ivories from Samaria*. London: Palestine Exploration Fund.

Crowfoot, JW, Crowfoot, GM & Kenyon, KM 1957. *The objects from Samaria*. London: Palestine Exploration Fund.

Crowfoot, JW, Kenyon, KM & Sukenik, EL 1942. *The buildings at Samaria*. London: Dawsons.

Currid, JD 1991. The re-stratification of Megiddo during the United Monarchy. *ZDPV (1953-)* 107, 28-38.

Currid, JD 1999. *Doing archaeology in the land of the Bible*. Grand Rapids: Baker Books.

Curtis, EL 1905. s v 'Chronology of the OT', in *DB* 1905:397-403.

Dar, S 1992. s v 'Samaria: archaeological survey of the region', in *ABD* 5:926-931.

Davies, GI 1995. Were there schools in ancient Israel?, in Day, J, Gordon, RP & Williamson, HGM (eds), *Wisdom in ancient Israel*. London: Cambridge University Press, 199-211.

Dearman, JA 1989. On record-keeping and the preservation of documents in ancient Israel. *Libraries & culture* 24(3), 344-356.

Demsky, A 1966. The houses of Achzib: a critical note on Micah 1:14b. *IEJ* 16(3), 211-215.

Demsky, A 1977. A Proto-Canaanite abecedary dating from the period of the Judges and its implications for the history of the alphabet. *TA* 4(1-2), 14-27.

Dever, WG 1967. Excavations at Gezer. *BA* 30(2), 47-62.

Dever, WG 1986. Late Bronze Age and Solomonic defenses at Gezer: new evidence. *BASOR* 262, 9-34.

Dever, WG 1997. Archaeology and the age of Solomon: a case-study in archaeology and historiography, in Handy, LK (ed), *The age of Solomon: scholarship at the turn of the millennium.* Leiden: Brill, 217-251.

Dever, WG 2002. *What did the biblical writers know and when did they know it?* Grand Rapids: Wm. B. Eerdmans.

Dever, WG, Lance, HD, Bullard, RG, Cole, DP, Furshpan, AM, Holladay, JS (Jr), Seger, JD & Wright, RB 1971. Further excavations at Gezer, 1967-1971. *BA* 34(4), 93-132.

Diringer, D 1943. On ancient Hebrew inscriptions discovered at Tell ed-Duweir (Lachish): the Lachish ostraca no. XIX-XXI. *PEQ* 75(2), 89-99.

Diringer, D 1949. The royal jar-handle stamps of ancient Judah. *BA* 12(4), 69-86.

Diringer, D 1958. Weights, in Thomas, DW (ed), *Documents from Old Testament times*. London: Thomas Nelson & Sons, 227-230.

Dobbs-Allsopp, FW, Roberts, JJM, Seow, CL & Whitaker, RE 2005. *Hebrew inscriptions*. New Haven: Yale University Press.

Dothan, M 1978. s v 'Tel Mor', in *EAEHL* 3:889-890.

Dothan, T 1963. Spinning-bowls. *IEJ* 13(2), 97-112.

Dougherty, RP 1921. Ancient Teimâ and Babylonia. *JAOS* 41, 458-459.

Dubovský, P 2006. Tiglath-pileser III's campaigns in 734-732 B.C.: historical background of Isa 7; 2 Kgs 15-16 and 2 Chr 27-28. *Biblica* 87, 153-170.

Duncan, JG 1931. *Biblical history: recent archaeology in Palestine and its bearing on the Old Testament historical narratives, Vol. II: the Croall lectures for 1928-29 amplified.* New York: MacMillan.

Eissfeldt, O 1943. Israelitische-philistäische grenzverschiebungen von David bis auf die Assyrerzeit. *ZDPV (1878-1945)* 66(2), 115-128.

Eitam, D 1979. Olive presses of the Israelite period. *TA* 6(3-4), 146-155.

Elat, M 1979a. Trade and commerce, in Malamat (1979b:173-186).

Elat, M 1979b. The monarchy and the development of trade in ancient Israel, in Lipinski, E (ed), *State and temple economy in the ancient Near East, Vol. 2*. Orientalia Lovaniensia Analecta 6. Leuven: Departement Orientalistiek, 527-546.

Encyclopaedia Biblica 1903. Omri. From: http://en.wikisource.org/wiki/Encyclopaedia_Biblica/Old_Christian_Literature-Onions#OMRI (accessed 9 May 2015).

Encyclopaedia Britannica Online Academic Edition 2015. Babylon. From: http://0-academic.eb.com.oasis.unisa.ac.za/EBchecked/topic/47575/Babylon (accessed 23 January 2015).

Ephʿal, I 1979a. Israel: fall and exile, in Malamat (1979b:180-191).

Ephʿal, I 1979b. Assyrian dominion in Palestine, in Malamat (1979b:276-289).

Ephʿal, I & Naveh, J 1996. *Aramaic ostraca of the 4th century BC from Idumaea*. Jerusalem: Magnus.

Eshel, H 2007. The governors of Samaria in the fifth and fourth centuries B.C.E., in Lipschits, O, Knoppers, G & Albertz, R (eds), *Judah and the Judeans in the fourth century B.C.E.* Winona Lake: Eisenbrauns, 223-234.

Eshel, H & Misgav, H 1988. A fourth century B.C.E. document from Ketef Yeriḥo. *IEJ* 38(3), 158-176.

Fales, FM 1979. Studies on Neo-Assyrian texts: joins and collations to the Tell Halaf documents. *ZA* 69(2), 192-216.

Fantalkin, A 2005. A group of iron age wineries from ancient Jaffa (Joppa), in Sass, B & Roll, I (eds), *Salvage Excavation Reports* 2. Tel Aviv: Institute of Archaeology, Tel Aviv University, 3-26.

Faust, A 2010. The large stone structure in the City of David: a reexamination. *ZDPV (1953-)* 126(2), 116-130.

Feig, N 2003. Excavations at Beit Ṣafafa: Iron Age II and Byzantine agricultural installations south of Jerusalem. *ʻAtiqot* 44, 191-238.

Finkelstein, I 1981. The date of Gezer's outer wall. *TA* 8(2), 136-145.

Finkelstein, I 1986. The Iron Age sites in the Negev highlands: military fortresses or nomads settling down? *BAR* 12(4). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=12&Issue=4&ArticleID=4&UserID=2391 (accessed 2 January 2015).

Finkelstein, I 1999. State formation in Israel and Judah: a contrast in context, a contrast in trajectory. *NEA* 62(1), 35-52.

Finkelstein, I 2008. Jerusalem in the Persian (and Early Hellenistic) Period and the wall of Nehemiah. *JSOT* 32(4), 501-520.

Finkelstein, I 2011. The "Large Stone Structure" in Jerusalem: reality versus yearning. *ZDPV* 127(1), 1-10.

Finkelstein, I 2012. The Great Wall of Tell en-Nasbeh (Mizpah): the first fortifications in Judah, and 1 Kings 15:16-22. *VT* 62, 14-28.

Finkelstein, I & Na'aman, N 2004. The Judahite Shephelah in the late 8th and early 7th centuries BCE. *TA* 31(1), 60-79.

Finkelstein, I & Na'aman, N (eds) 2011. *The fire signals of Lachish: studies in the archaeology and history of Israel in the Late Bronze Age, Iron Age, and Persian period in honor of David Ussishkin*. Winona Lake: Eisenbrauns.

Finkelstein, I & Silberman, NA 2006. *David and Solomon: in search of the Bible's sacred kings and the roots of Western tradition*. New York: Free Press.

Finkelstein, I, Singer-Avitz, L, Herzog, Z & Ussishkin, D 2007. Has King David's palace in Jerusalem been found? *TA* 34(2), 142-164.

Frankfort, H 1996. *The art and architecture of the ancient Orient*. New Haven: Yale University Press.

Franklin, N 2004. Samaria: from the bedrock to the Omride palace. *Levant* 36, 189-202.

Franklin, N 2006. Revealing stratum V at Megiddo. *BASOR* 342, 95-111.

Franklin, N 2007. Response to David Ussishkin. *BASOR* 348, 71-73.

Franklin, N 2008. Trademarks of the Omride builders?, in Fantalkin, A & Yasur-Landau, A (eds), *Bene Israel: studies in the archaeology of Israel and the Levant during the Bronze and Iron Ages in honour of Israel Finkelstein.* Culture and history of the ancient Near East, 31. Leiden: Brill, 45-54.

Freedman, DN 1992. *Anchor Bible Dictionary*. New Haven: Yale University Press.

Fritz, V & Davies, PR (eds) 1996. *The origins of the ancient Israelite states*. JSOTSup 228. Sheffield: Sheffield Academic.

Frumkin, A, Shimron, A & Rosenbaum, J 2003. Radiometric dating of the Siloam Tunnel, Jerusalem. *Nature* 425, 169-171.

Gadd, CJ 1954. Inscribed prisms of Sargon II from Nimrud. *Iraq* 16(2), 173-201.

Gadot, Y 2012. Appendix: the metal industry at Hazor, in Ben-Tor, Ben-Ami & Sandhaus (2012:541).

Galil, G. 1996. *The chronology of the kings of Israel and Judah*. Leiden: Brill.

Gallagher, WR 1999. *Sennacherib's campaign to Judah: new studies.* Leiden: Brill.

Garbutt, D 1984. The significance of ancient Mesopotamia in accounting history. *AHJ* 11(1), 83-101.

Gardiner, AH 1916. The Egyptian origin of the Semitic alphabet. *JEA* 3(1), 1-16.

Gelinas, MM 1995. United Monarchy – Divided Monarchy: fact or fiction?, in Holloway, SW & Handy, LK (eds), The pitcher is broken: memorial essays for Gösta W. Ahlstrom. *JSOTSup* 190, 227-237.

Geva, H 1979. The western boundary of Jerusalem at the end of the Monarchy. *IEJ* 29(2), 84-91.

Geva, H 1983. Excavations in the Citadel of Jerusalem, 1979-1980: preliminary report. *IEJ* 33(1/2), 55-71.

Geva, H 2006. Another view: small city, few people. From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=32&Issue=3&ArticleID=11&UserID=2391 (accessed 14 June 2015).

Gibson, JCL 1971. *Textbook of Syrian Semitic inscriptions, Vol. I: Hebrew and Moabite inscriptions*. Oxford: Clarendon.

Gibson, JCL 1975. *Textbook of Syrian Semitic inscriptions, Vol. II: Aramaic inscriptions*. Oxford: Clarendon.

Ginsberg, HL 1940. Lachish ostraca new and old. *BASOR* 80, 10-13.

Gitler, H & Tal, O 2014. A hoard of Tyrian and Athenian coins from Dalton, Israel, in Lemaire, A (ed), *Phéniciens d'orient et d'occident: mélanges Josette Elayi*. Paris: J. Maisonneuve, 243-249.

Glautier, MWE 1983. Searching for accounting paradigms. *AHJ* 10(1), 51-68.

Glueck, N 1940a. The third season of excavation at Tell el-Kheleifeh. *BASOR* 79, 2-18.

Glueck, N 1940b. Ostraca from Elath. *BASOR* 80, 3-10.

Glueck, N 1959. A seal weight from Nebi Rubin. *BASOR* 153, 35-38.

Glueck, N 1965. Ezion-geber. *BA* 28(3), 69-87.

Goodspeed, GS 1897. A sketch of Assyrian history, with special reference to Palestine, from the division of the kingdom. *The Biblical World*, 9(6), 401-414.

Gordon, CH 1937. Lachish Letter IV. *BASOR* 67, 30-32.

Gordon, CH 1938. Notes on the Lachish Letters. *BASOR* 70, 17-18.

Gordon, CH 1945. Lachish Letter IV. *BASOR* 97, 22-25.

Gordon, CH 1948. Phoenician inscriptions from Karatepe. *JQR* 39(1), 41-50.

Gordon, CH 1949. Azitawadd's Phoenician inscription. *JNES* 8(2), 108-115.

Graham, JA 1978. New light on the fortress: periods I and II, in Lapp, NL (ed), The third campaign at Tell el-Ful: the excavations of 1964. *AASOR* 45, 23-27.

Grant, E 1932. *Ain Shems excavations (Palestine)*, Part 2. Haverford: Haverford College.

Grant, E & Wright, GE. 1939. *Ain Shems excavations (Palestine)*, Part 5 (Text). Haverford: Haverford College.

Grayson, AK 1975. *Assyrian and Babylonian Chronicles*. New York: JJ Augustin.

Greenberg, R 2009. Towards an inclusive archaeology in Jerusalem: the case of Silwan/The City of David. *Public archaeology* 8(1), 35-50.

Greenfield, JC 1985. A group of Phoenician city seals. *IEJ* 35(2/3), 129-134.

Grena, GM 2002. The lmlk research website. From: http://www.lmlk.com (accessed 30 September 2014).

Gropp, DM 2001. *Wadi Daliyeh II: the Samaria papyri from Wadi Daliyeh*. Oxford: Oxford University Press.

Handy, LK 1997. *The age of Solomon: scholarship at the turn of the millennium*. Leiden: Brill.

Harding, GL 1950. An Iron Age tomb at Meqabelein. *QDAP* 14, 44-48.

Harl, KW 1998. *Athenian Empire: 480-404 B.C.: Greek coinage and measures – Greek currency in the Classical Age.* History/Classics 310. Unpublished lecture handout, Tulane University, New Orleans. From: http://www.tulane.edu/~august/H310/handouts/Coinage.htm (accessed 30 January 2015).

Hastings, J 1950. s v 'Israel', in *DB* 1950:393-417.

Hastings, J (ed) 1950. *Dictionary of the Bible.* Edinburgh: T. & T. Clark.

Hendel, RS 1996. The date of the Siloam Inscription: a rejoinder to Rogerson and Davies. *BA* 59(4), 233-237.

Herr, LG 1992. Epigraphic finds from Tell el-'Umeiri during the 1989 season. *AUSS* 30, 193.

Herr, LG 1993. The Madaba Plains projects. *Syria* 70(1/2), 231-235.

Herzog, Z 1992. Administrative structures in the Iron Age, in Kempinsky, A & Reich, R (eds), *The architecture of ancient Israel: from the prehistoric to the Persian periods*. Jerusalem: Israel Exploration Society, 223-230.

Herzog, Z, Aharoni, M, Rainey, AF & Moshkovitz, S 1984. The Israelite fortress at Arad. *BASOR* 254, 1-34.

Hess, RS 2006. Writing about writing: abecedaries and evidence for literacy in ancient Israel. *VT* 56(3), 342-346.

Holladay, JS (Jr) 1976. Of sherds and strata: contributions towards an understanding of the archaeology of the Divided Monarchy, in Cross, FM (Jr), Lemke, WE & Miller, PD (Jr) (eds), *Magnalia Dei, the mighty acts of God: essays on the Bible and archaeology in memory of G. Ernest Wright.* New York: Doubleday, 253-293.

Horn, SH 1966. Did Sennacherib campaign once or twice against Hezekiah? *AUSS* 4, 1-28.

Horowitz, W, Oshima, T & Sanders, S 2002. A bibliographical list of cuneiform inscriptions from Canaan, Palestine/Philistia, and the Land of Israel. *JAOS* 122(4), 753-766.

Hudson, M 1999. From sacred enclave to temple to city. From: http://michael-hudson.com/1999/03/from-sacred-enclave-to-temple-to-city/ (accessed 12 June 2015).

Hughes, GR, Nelson, HH, Parker, RA, Caminos, RA, Nims, CF, Schott, S & Seele, KC 1954. *Reliefs and inscriptions at Karnak, Vol. III: the Bubastite Portal*. Chicago: University of Chicago Press.

Hughes, J 1990. *Secrets of the times: myth and history in biblical chronology*. JSOTSup 66. Sheffield: Sheffield Academic.

Inge, CH 1938. Excavations at Tell ed-Duweir. *PEQ* 70(4), 240-256.

Interactive Bible. c2011. Bible maps: the divided kingdoms 900-722 BC. From: http://www.bible.ca/maps/maps-divided-kingdom.htm (accessed 11 September 2015).

Interactive Bible. c2011. Bible maps: successive world kingdoms: Persia, Babylon, Assyria 640-500 BC. From: http://www.bible.ca/maps/maps-near-east-500BC.htm (accessed 11 December 2014).

James, P 2007. The renewed excavations at Lachish (1973-1994) by Ussishkin, D. *PEQ* 139(3), 213-217.

Jensen, LB 1963. Royal purple of Tyre. *JNES* 22(2), 104-118.

Johns, CHW 1905. The new cuneiform tablet from Gezer. *PEQ* 37(3), 206-210.

Johns, CN 1933. Excavations at ‘Atlit (1930-1931): the south-eastern cemetery. *QDAP* 2, 41-104.

Jose, ML & Moore, CK 1998. The development of taxation in the Bible: improvements in counting, measurement, and computation in the ancient Middle East. *AHJ* 25(2), 63-80.

Katz, H 1998. A note on the date of the ‘Great Wall’ of Tell en-Naṣbeh. *TA* 25(1), 131-133.

Kaufman, IT 1982. The Samaria ostraca: an early witness to Hebrew writing. *BA* 45(4), 229-239.

Keel, O & Mazar, A 2009. Iron Age seals and seal impressions from Tel Reḥov, in Aviram, J, Ben-Tor, A, Ephʿal, I, Gitin, S & Reich, R (eds), *Eretz-Israel: archaeological, historical and geographical studies,* Vol. 29. Jerusalem: Israel Exploration Society, 57-69.

Kelso, JL 1968. The excavations at Bethel (1934-1960). *AASOR* 39. Cambridge: American Schools of Oriental Research.

Kempinsky, A 1972. Gezer I, preliminary report of the 1964-66 seasons by Dever, WG, Lance, HD, Wright, GE & Schaffer, A. *IEJ* 22(2/3), 183-186.

Kempinsky, A 1976. Gezer II, preliminary report of the 1967-70 seasons in Fields I and II by Dever, WG, Lance, HD, Bullard, RG, Cole, DP & Seger, JD. *IEJ* 26(4), 210-214.

Kennedy, J 1898. The early commerce of Babylon with India – 700-300 B.C. *JRAS*, 241-288.

Kenyon, KM 1957a. The evidence of the Samaria pottery and its bearing on finds at other sites, in Crowfoot, JW, Crowfoot, GM & Kenyon, KM (eds), *The objects from Samaria.* London: Palestine Exploration Fund, 198-209.

Kenyon, KM 1957b. *Digging up Jericho*. London: Ernest Benn.

Kenyon, KM 1963. Excavations in Jerusalem, 1962. *PEQ* 95(1), 7-21.

Kenyon, KM 1964. Excavations in Jerusalem, 1963. *PEQ* 96(1), 7-18.

Kenyon, KM 1967. Jericho. *Arch* 20(4), 268-275.

Kenyon, KM 1968. Excavations in Jerusalem, 1967. *PEQ* 100(2), 97-109.

Kenyon, KM 1974. *Digging up Jerusalem.* London: Ernest Benn.

Kindler, A 1967. The mint of Tyre – the major source of silver coins in Palestine. *EI* 8, 318-324.

King, PJ & Stager, LE 2001. *Life in biblical Israel.* London: Westminster John Knox.

Kitchen, KA 1986. Egypt and Israel during the first millennium BC. *VTSup* 40, 107-123.

Kletter, R 1991. The inscribed weights of the kingdom of Judah. *TA* 18(2), 121-163.

Kletter, R 1998. *Economic keystones: the weights system of the kingdom of Judah*. Sheffield: Sheffield Academic.

Kletter, R 2009. Comment: computational intelligence, lmlk storage jars and the bath unit in Iron Age Judah. *JAMT* 16(4), 357-365.

Kletter, R 2014. Vessels and measures: the biblical liquid capacity system. *IEJ* 64(1), 22-37.

Klingbeil, GA 1995. The Aramaic ostracon from Lachish: a new reading and interpretation. *AUSS* 33(1), 77-84.

Knauf, EA 2011. Inside the walls of Nehemiah’s Jerusalem: Naboth’s vineyard, in Finkelstein & Na’aman (2011:185-194).

Kochavi, M 1968a. The excavations at Tell Zeror. *Qadmoniot* 4, 128-130 (in Hebrew).

Kochavi, M 1968b. The excavations at Tell Deir ʿAlla. *Qadmoniot* 4, 130-131 (in Hebrew).

Kochavi, M 1974. Khirbet Rabûd = Debir. *TA* 1(1), 2-33.

Kochavi, M 1977. An ostracon of the period of the Judges from ʿIzbet Sartah. *TA* 4(1-2), 1-13.

Koren, ZC 2014. Setting the archaeo-chemical record straight regarding Tyrian purple pigments and dyes. 2014 ASOR Annual Meeting, San Diego, 19-22 November 2014. From: http://asorblog.org/2015/04/24/setting-the-archaeo-chemical-record-straight-regarding-tyrian-purple-pigments-and-dyes/ (accessed 16 July 2015). [PowerPoint presentation].

Kraeling, EG 1953. *The Brooklyn Museum of Aramaic papyri: new documents of the fifth century B.C. from the Jewish colony at Elephantine*. New Haven: Yale University Press.

Kutscher, EY 1982. *A history of the Hebrew language*. Jerusalem: Magnes.

Lambert, C 1932. A hoard of Phoenician coins. *QDAP* 1, 10-20.

Lambert, C 1933. Egypto-Arabian, Phoenician and other coins of the fourth century B.C. found in Palestine. *QDAP* 2, 1-10.

Lance, BD 1971. The royal stamps and the kingdom of Josiah. *HTR* 64(2/3), 315-332.

Lapp, PW 1960. Late royal seals from Judah. *BASOR* 158, 11-22.

Lemaire, A 2006. New Aramaic ostraca from Idumea and their historical interpretation, in Lipschits & Oeming (2006:413-456).

Lemche, NP 1997. Clio is also among the muses! Keith W Whitelam and the history of Palestine: a review and a commentary, in Grabbe, LL (ed), *Can a 'history of Israel' be written?* Sheffield: Sheffield Academic, 123-155.

Le Roux, M 2008. Ancient Near Eastern influence in sub-Saharan Africa. *Ekklesiastikos Pharos* 90, 1-20.

Le Roux, M & Vermaak, PS (eds) 2013. *A guide to the successful completion of your Master's or Doctoral research article*. Unpublished guidelines, Unisa, Pretoria.

Levine, LD 1972. *Two Neo-Assyrian stelae from Iran*. Toronto: Royal Ontario Museum.

Levy, MA 1869. *Siegel und Gemmen*. Breslau: Schletter'schen.

Lewy, J 1927. *Die chronologie der könige von Israel und Juda*. Giessen: A. Töpelmann.

Lindenberger, JM 2003. *Ancient Aramaic and Hebrew letters*. Atlanta: Society of Biblical Literature.

Lipinski, E 1975. *Studies in Aramaic inscriptions and onomastics I*. Orientalia Lovaniensia Analecta, 1. Leuven: Leuven University Press.

Lipinski, E 1994. *Studies in Aramaic inscriptions and onomastics II*. Orientalia Lovaniensia Analecta, 57. Leuven: Peeters.

Lipinski, E 2004. *Itineraria Phoenicia*. Orientalia Lovaniensia Analecta, 127. Leuven: Peeters.

Lipschits, O 2005. *The fall and rise of Jerusalem*. Winona Lake: Eisenbrauns.

Lipschits, O 2006. Achaemenid imperial policy and the status of Jerusalem, in Lipschits & Oeming (2006:19-52).

Lipschits, O & Oeming, M (eds) 2006. *Judah and the Judeans in the Persian period.* Winona Lake: Eisenbrauns.

Lipschits, O, Sergi, O & Koch, I 2010. Royal Judahite jar handles: reconsidering the chronology of the *lmlk* stamp impressions. *TA* 37(1), 3-32.

Lipschits, O, Koch, I, Shaus, A & Guil, S 2010. The enigma of the biblical *bath* and the system of liquid volume measurement during the First Temple period. *UF* 42, 453-478.

Lipschits, O, Gadot, Y, Arubas, B & Oeming, M 2011. Palace and village, paradise and oblivion: unraveling the riddles of Ramat Raḥel. *NEA* 74(1), 2-49.

Luckenbill, DD 1968a. *Ancient records of Assyria and Babylonia,* Vol. I. New York: Greenwood.

Luckenbill, DD 1968b. *Ancient records of Assyria and Babylonia,* Vol. II. New York: Greenwood.

Macalister, RAS 1904. Eighth quarterly report on the excavation of Gezer. *PEQ* 36(3), 194-228.

Macalister, RAS 1905. Twelfth quarterly report on the excavation of Gezer. *PEQ* 37(3), 183-199.

MacArthur, J 2015. God's plan for giving: Part 1. From: http://www.gty.org/resources/sermons/1302/gods-plan-for-giving-part-1?Term=God#top (accessed 11 July 2015).

Maisler, B 1948. The historical background of the Samaria ostraca. *JPOS* 21, 117-133.

Maisler, B 1950-51a. The Excavations at Tell Qasîle: preliminary report. *IEJ* 1(2), 61-76.

Maisler, B 1950-51b. The Excavations at Tell Qasîle: preliminary report. *IEJ* 1(3), 125-140.

Maisler, B 1950-51c. The Excavations at Tell Qasîle: preliminary report. *IEJ* 1(4), 194-218.

Malamat, A 1963. Aspects of the foreign policies of David and Solomon. *JNES* 22(1), 1-17.

Malamat, A 1968. The last kings of Judah and the fall of Jerusalem: an historical-chronological study. *IEJ* 18(3), 137-156.

Malamat, A 1973. The twilight of Judah: in the Egyptian-Babylonian maelstrom. *VTSup* 28, 123-145.

Malamat, A 1975. Josiah's bid for Armageddon: the background of the Judean-Egyptian encounter in 609 BC. *JANESCU* 5, 267-278.

Malamat, A 1979a. The last years of the kingdom of Judah, in Malamat (1979b:205-221).

Malamat, A (ed) 1979b. *The age of the monarchies: political history.* The world history of the Jewish people, Vol. 4-I. Jerusalem: Massada.

Malamat, A (ed) 1979c. *The age of the monarchies: culture and society.* The world history of the Jewish people, Vol. 4-II. Jerusalem: Massada.

Mayer, W 2003. Sennacherib's campaign of 701 BCE: the Assyrian view, in Grabbe, LL (ed), 'Like a bird in a cage': the invasion of Sennacherib in 701 BCE. *JSOTSup* 363, 168-200.

Mazar, A 1982. Iron Age fortresses in the Judaean Hills. *PEQ* 114(2), 87-109.

Mazar, A 1992. *Archaeology of the land of the Bible: 10,000-586 B.C.E.* New Haven: Yale University Press.

Mazar, A 2006. Jerusalem in the 10th century B.C.E.: the glass half full, in Amit, Y, Ben Zvi, E, Finkelstein, I & Lipschits, O (eds), *Essays on Ancient Israel in its Near Eastern context: a tribute to Nadav Na'aman.* Winona Lake: Eisenbrauns, 255-272.

Mazar, A 2010. Archaeology and the Biblical narrative: the case of the United Monarchy, in Kratz, RG & Spieckermann, H (eds), One God – one cult – one nation: archaeological and biblical perspectives. *BZAW* 405, 29-58.

Mazar, A 2011. The Iron Age chronology debate: is the gap narrowing? Another viewpoint. *NEA* 74(2), 105-111.

Mazar, A & Netzer, E 1986. On the Israelite fortress at Arad. *BASOR* 263, 87-91.

Mazar, B 1954. Gath and Gittaim. *IEJ* 4(3/4), 227-235.

Mazar, B 1956. The campaign of Pharaoh Shishak to Palestine. *VTSup* 4, 57-66.

Mazar, B 1957. The Tobiads. *IEJ* 7(3), 137-145.

Mazar, B 1963. Excavations at the oasis of Engedi. *Arch* 16(2), 99-107.

Mazar, B 1979. The era of David and Solomon, in Malamat (1979b:76-99).

Mazar, B & Dunayevsky, I 1964. Third season of excavations: preliminary report. *IEJ* 14(3), 121-130.

Mazar, B & Dunayevsky, I 1967. En-Gedi: fourth and fifth seasons of excavations preliminary report. *IEJ* 17(3), 133-143.

Mazar, B, Biran, A, Dothan, M & Dunayevsky, I 1964. 'Ein Gev: excavations in 1961. *IEJ* 14(1/2), 1-49.

Mazar, E 2006. Did I find King David's palace? *BAR* 32(1). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=32&Issue=1&ArticleID=4&UserID=2391 (accessed 12 June 2015).

Mazar, E 2009. *The Palace of King David, excavations at the summit of the City of David: preliminary report of seasons 2006-2007*. Jerusalem: Shoham Academic Research and Publication.

Mazor, G 2006. A farmhouse from the Late Iron Age and Second Temple period in 'French Hill', North Jerusalem. *ʿAtiqot* 54, 153*-154* (Hebrew; English summary).

McCarter, PK 1974. 'Yaw, Son of "Omri"': a philological note on Israelite chronology. *BASOR* 216, 5-7.

McCarter, PK 1997. Defusing pseudo-scholarship, no trained epigraphist would confuse the two. *BAR* 23(2), 45-46.

McClellan, TL 1984. Town Planning at Tell en-Naṣbeh. *ZDPV (1953-)* 100, 53-69.

McCown, CC 1947. Utensils, implements, and installations, in McCown, CC (ed), *Tell en-Naṣbeh I: archaeological and historical results*. Berkeley: The Palestine Institute of Pacific School of Religion, 249-264.

McFall, L 1991. A translation guide to the chronological data in Kings and Chronicles. *Bibliotheca Sacra* 148(589), 3-45.

Mendelsohn, I 1962. On corvée labor in ancient Canaan and Israel. *BASOR* 167, 31-35.

Meshel, Z 1977. Ḥorvat Ritma - an Iron Age fortress in the Negev highlands. *TA* 4(3-4), 110-135.

Meshorer, Y 1961. An Attic archaic coin from Jerusalem. *ʿAtiqot* 3, 185.

Meshorer, Y 1982. *Ancient Jewish coinage, Vol. 1: Persian period through Hasmonaeans.* New York: Amphora.

Meshorer, Y & Qedar, S 1991. *The coinage of Samaria in the fourth century BCE.* Jerusalem: Numismatic Fine Arts International.

Meshorer, Y & Qedar, S 1999. *Samarian coinage.* Jerusalem: Israel Numismatic Society.

Meyers, C 1998. Kinship and kingship: the early monarchy, in Coogan, MD (ed), *The Oxford history of the biblical world*. Oxford: Oxford University Press, 165-205.

Miller, JM & Hayes, JH 1986. *A history of ancient Israel and Judah*. Philadelphia: Westminster.

Misgav, H 1990. Two notes on the ostraca from Ḥorvat ʿUza. *IEJ* 40(2/3), 215-217.

Mommsen, H, Perlman, I & Yellin, J 1984. The provenience of the *lmlk* jars. *IEJ* 34(2/3), 89-113.

Mørkholm, O 1974. A coin of Artaxerxes III. *The Numismatic Chronicle (1966-), Seventh Series* 14, 1-4.

Myburgh, JE, Fouché, JP & Cloete, M 2012. *Accounting – an introduction*. 11th ed. Durban: Lexis Nexis.

Na'aman, N 1979. Sennacherib's campaign to Judah and the date of the *lmlk* stamps. *VT* 29(1), 61-86.

Na'aman, N 1986a. *Borders & districts in biblical historiography: seven studies in biblical geographical lists*. Jerusalem: Simor.

Na'aman, N 1986b. Historical and chronological notes on the kingdoms of Israel and Judah in the eighth century B.C. *VT* 36(1), 71-92.

Na'aman, N 1994. The 'conquest of Canaan' in the Book of Joshua and in history, in Finkelstein, I & Na'aman, N (eds), *From nomadism to monarchy: archaeological and historical aspects of early Israel.* Jerusalem: Israel Exploration Society, 218-281.

Na'aman, N 1996. The contribution of the Amarna Letters to the debate on Jerusalem's political position in the tenth century B.C.E. *BASOR* 304, 17-27.

Na'aman, N 2005. Province system and settlement pattern in southern Syria and Palestine in the Neo-Assyrian period, in Na'aman, N (ed), *Ancient Israel and its neighbours: interaction and counteraction: collected essays*. Winona Lake: Eisenbrauns, 220-237.

Na'aman, Y & Zadok, R 2000. Assyrian deportations to the province of Samerina in the light of two cuneiform tablets from Tel Hadid. *TA* 27(2), 159-188.

Nam, RS 2012. *Portrayals of economic exchange in the Book of Kings.* Leiden: Koninklijke Brill.

Naveh, J 1960. A Hebrew letter from the seventh century B.C. *IEJ* 10(3), 129-139.

Naveh, J 1962. More Hebrew inscriptions from Meṣad Ḥashavyahu. *IEJ* 12(1), 27-32.

Naveh, J 1966. The scripts of two ostraca from Elath. *BASOR* 183, 27-30.

Naveh, J 1970a. *The development of the Aramaic script*. Jerusalem: Israel Academy of Sciences and Humanities.

Naveh, J 1970b. An Aramaic ostracon from Ashdod. *'Atiqot* 9-10, 200-201.

Naveh, J 1973. The Aramaic inscriptions, in Aharoni, Y (ed), *Beer-Sheba I: excavations at Tel-Beer-Sheba 1969-1971 seasons*. Tel Aviv: Tel Aviv University, 79-82.

Naveh, J 1978. Some considerations on the ostracon from ʿIzbet Ṣarṭah. *IEJ* 28(1/2), 31-35.

Naveh, J 1979. The Aramaic ostraca from Tel Beer-sheba. *TA* 6(3-4), 182-198.

Naveh, J 1981. The Aramaic Ostraca from Tel Arad, in Aharoni (1981:153-176).

Naveh, J 1982. *Early history of the alphabet: an introduction to West Semitic epigraphy and palaeography*. Jerusalem: Magnes.

Naveh, J 1985a. Writing and scripts in seventh-century B.C.E. Philistia: the new evidence from Tell Jemmeh. *IEJ* 35(1), 8-21.

Naveh, J 1985b. Published and unpublished Aramaic ostraca. *ʻAtiqot* 17, 114-121.

Naveh, J 1992. Aramaic ostraca and jar inscriptions from Tell Jemmeh. *ʻAtiqot* 21, 49-53.

Naveh, J 1996. Gleanings of some pottery inscriptions. *IEJ* 46(1/2), 44-51.

Neufeld, E 1954. The rate of interest and the text of Nehemiah 5.11. *JQR* 44(3), 194-204.

Niditch, S 1996. *Oral world and written word: ancient Israelite literature*. Louisville: Westminster John Knox.

Niemann, HM 2008. A new look at the Samaria Ostraca: the king-clan relationship. *TA* 35(2), 249-266.

Novak, M 2012. Tell Halaf ausgrabungsprojekt: texts. From: http://www.grabung-halaf.de/currenttexts.php?l=eng (accessed 8 July 2015).

Oded, B 1977. Judah and the exile, in Hayes, JH & Miller, JM (eds), *Israelite and Judaean history.* Philadelphia: Westminster, 435-488.

Olmstead, AT 1948. *History of the Persian Empire.* Chicago: University of Chicago Press.

Oppenheim, AL 1969. Babylonian and Assyrian historical texts, in Pritchard (1969:265-317, 556-567).

Ornan, T & Sass, B 1992. A product of cultural interaction: the seal of Nergal-sallim. *IMJ* 10, 63-66.

Ornan, T, Ortiz, S & Wolff, S 2013. A newly discovered Neo-Assyrian cylinder seal from Gezer in context. *IEJ* 63(1), 6-25.

Page, S 1968. A stela of Adad-nirari III and Nergal-ereš from Tell al Rimah. *Iraq* 30(2), 139-153.

Palmer, LR 1954. *The Latin language*. London: Faber and Faber.

Perego, G 1999. *Interdisciplinary atlas of the Bible*. London: St Pauls.

Petrie, F 1906. *Researches in Sinai*. London: John Murray.

Petrie, F 1928. *Gerar.* Publications of the Egyptian Research Account and British School of Archaeology in Egypt, 43. London: British School of Archaeology in Egypt.

Pinches, TG 1904. The fragment of an Assyrian tablet found at Gezer. *PEQ* 36(3), 229-236.

Porath, Y, Paley, SM & Stieglitz, RR 1993. s v 'Mikhmoret, Tel', in *NEAEHL* 3:1043-1046.

Porten, B 1996. The Elephantine papyri in English: three millennia of cross-cultural continuity and change, in Akkermans, PMMG, De Geus, GHJ, Haerinck, E, van den Hout, Th PJ, Stol, M, & Van der Plas, D (eds), *DMOA: Studies in Near Eastern Archaeology and Civilisation,* Vol. XXII. Leiden: Brill.

Porten, TG 1985. Two Aramaic contracts without dates: new collations (C 11, 49). *BASOR* 258, 41-52.

Postgate, JN 1973. Assyrian texts and fragments. *Iraq* 35(1), 13-36.

Powis Smith, JM 1914. The Deuteronomic tithe. *AJT* 18(1), 119-126.

Pratico, GD 1985. Nelson Glueck's 1938-1940 excavations at Tell el-Kheleifeh: a reappraisal. *BASOR* 259, 1-32.

Pritchard, JB 1960. Industry and trade at biblical Gibeon. *BA* 23(1), 23-29.

Pritchard, JB 1964a. Two tombs and a tunnel in the Jordan Valley: discoveries at the biblical Zarethan. *Expedition* 6, 3-9.

Pritchard, JB 1964b. *Winery, defenses, and soundings at Gibeon*. Philadelphia: University of Pennsylvania.

Pritchard, JB 1969 (ed). *Ancient Near Eastern Texts relating to the Old Testament*. 3rd ed. Princeton: Princeton University Press.

Radner, K 2012. *Assyrian empire builders: Israel, the 'House of Omri'*. History Department, University College London. From: http://www.ucl.ac.uk/sargon/essentials/countries/israel/ (accessed 10 September 2014).

Rainey, AF 1967. The Samaria Ostraca in the light of fresh evidence. *PEQ* 99(1), 32-41.

Rainey, AF 1970. Compulsory labour gangs in ancient Israel. *IEJ* 20(3/4), 191-202.

Rainey, AF 1971. A Hebrew 'receipt' from Arad. *BASOR* 202, 23-30.

Rainey, AF 1975. The fate of Lachish during the campaigns of Sennacherib and Nebuchadrezzar, in Aharoni, Y (ed), *Investigations at Lachish, the sanctuary and the residency (Lachish V).* Tel Aviv: Institute of Archaeology, Tel Aviv University, 47-60.

Rainey, AF 1979. The *sitz im leben* of the Samaria Ostraca. *TA* 6(1-2), 91-94.

Rainey, AF 1988. Toward a precise date for the Samaria Ostraca. *BASOR* 272, 69-74.

Ramat Raḥel Excavation Project [sa]. *The site.* From: http://www.tau.ac.il/~rmtrachl/the_site.html (accessed 22 October 2014).

Reader's Digest Universal Dictionary. 1987. London: The Reader's Digest Association.

Reich, R 2011. *Excavating the City of David: where Jerusalem's history began.* Jerusalem: Israel Exploration Society.

Reich, R & Brandl, B 1985. Gezer under Assyrian rule. *PEQ* 117(1), 42-54.

Reich, R & Shukron, E 1999. Jerusalem, the Gihon Spring. *ESI* 109, 77*-78*.

Reich, R & Shukron, E 2007. Recent discoveries in the City of David, Jerusalem. *IEJ* 57(2), 153-169.

Reich, R & Shukron, E 2008. The date of city-wall 501 in Jerusalem. *TA* 35(1), 114-122.

Reich, R & Shukron, E 2010. A new segment of the Middle Bronze fortification in the City of David. *TA* 37(2), 141-153.

Reich, R & Shukron, E 2011. The date of the Siloam Tunnel reconsidered. *TA*, 38(2), 147-157.

Reich, R, Shukron, E & Lernau, O 2007. Recent discoveries in the City of David, Jerusalem. *IEJ* 57(2), 153-169.

Reider, J 1939. The Lachish Letters. *JQR* 29(3), 225-239.

Reisner, GA, Fisher, CS & Lyon, DG. 1924. *Harvard Excavations at Samaria, 1908–1910,* Vol. 1. Cambridge: Harvard University Press.

Reviv, H 1979. The history of Judah from Hezekiah to Josiah, in Malamat (1979b:193-204).

Richard, J 2010. Meanings and roots of the word 'Accounting': a comparative study of sixty five languages. Paper presented at the *Journées d'Histoire de la Comptabilité et du Management*, Paris, 24-26 March. From: http://halshs.archives-ouvertes.fr/docs/00/46/59/84/PDF/Richard_Meanings_and_roots_of_the_word_accounting.pdf (accessed 6 August 2013).

RINAP Project 2011. *The Royal Inscriptions of the Neo-Assyrian Period*. From: http://oracc.museum.upenn.edu/rinap/index.html (accessed 10 September 2014).

Rogerson, J & Davies, P 1996. Was the Siloam Tunnel built by Hezekiah? *BA* 59(3), 138-149.

Rollston, CA 2010. *Writing and literacy in the world of ancient Israel: epigraphic evidence from the Iron Age.* Atlanta: Society of Biblical Literature.

Rothenberg, B 1962. Ancient copper industries in the western Arabah: an archaeological survey of the Arabah, Part 1. *PEQ* 94(1), 5-71.

Röthlin. GA 2009. Gold and silver for a kingdom – the Judean economy in the Iron Age II: possible sources for King Hezekiah's wealth. Unpublished MA thesis, Unisa, Pretoria.

Rowley, HH 1963. *Men of God: studies in Old Testament history and prophecy.* London: Nelson.

Saggs, HWF 1973. The Assyrians, in Wiseman, DJ (ed), *Peoples of Old Testament times.* London: Oxford University Press, 156-178.

Sahlins, MD 1968. *Tribesmen.* Englewood Cliffs: Prentice-Hall.

Sayce, AH 1893. The Phoenician inscriptions on the vase handles found at Jerusalem. *PEQ* 25(3), 240-242.

Schäfer-Lichtenberger, C 1996. Sociological and biblical views of the early state, in Fritz & Davies (1996:78-105).

Schmidt, EF 1957. *Persepolis II: contents of the treasury and other discoveries*. Chicago: University of Chicago Press.

Schniedewind, WM 2000. Orality and literacy in ancient Israel. *RSR* 26(4), 327-332.

Schoors, A 1998. *Die Königreiche Israel und Juda im 8. und 7. Jahrhundert v. Chr.: Die assyrische Krise*. Biblische Enzyklopädie 5. Stuttgart: Kohlhammer.

Scott, RBY 1959. The shekel sign on stone weights. *BASOR* 153, 32-35.

Scott, RBY 1965. The scale-weights from the Ophel, 1963-64. *PEQ* 97(2), 128-139.

Seger, JD 1980. Notes and News: Tel Ḥalif. *IEJ* 30(3/4), 223-226.

Seger, JD 1983. Investigations at Tell Halif, Israel, 1976-1980. *BASOR* 252, 1-23.

Service, ER 1962. *Primitive social organization: an evolutionary perspective.* New York: Random House.

Shaheen, N 1977. The Siloam end of Hezekiah's Tunnel. *PEQ* 109(2), 107-112.

Shanks, H 1999. Everything you knew about Jerusalem is wrong (well, almost). *BAR* 25(6), 20-29.

Shea, WH 1977. The date and significance of the Samaria Ostraca. *IEJ* 27(1), 16-27.

Shea, WH 1985. Israelite chronology and the Samaria Ostraca. *ZDPV* 101(1), 9-20.

Shiloh, Y 1970. The four-room house: its situation and function in the Israelite city. *IEJ* 20(3/4), 180-190.

Shiloh, Y 1984. *Excavations at the City of David, 1978-1982, Vol. 1: interim report of the first five seasons.* Qedem 19. Jerusalem: Institute of Archaeology, Hebrew University.

Shiloh, Y 1985. Notes and News: Jerusalem, City of David. *IEJ* 35, 301-303.

Shiloh, Y 1986. A group of Hebrew bullae from the City of David. *IEJ* 36(1/2), 16-38.

Shoham, Y 2000. *Excavations at the City of David, 1978-1985, Vol. 6: inscriptions*. Jerusalem: Institute of Archaeology, Hebrew University.

Sigrist, RM 1982. Une tablette cunéiforme de Tell Keisan. *IEJ* 32(1), 32-35.

Silver, M 1983. *Prophets and markets: the political economy of ancient Israel*. Hingham: Kluwer-Nujhof.

Simons, J 1952. *Jerusalem in the Old Testament: researches and theories*. Leiden: Brill.

Sinclair, LA 1960. An archaeological study of Gibeah (Tell el-Ful). *AASOR* 34-35, 1-52.

Smith, G 1875. *The Assyrian eponym canon*. London: Samuel Bagster & Sons.

Smith, M 2008. Jewish religious life in the Persian period, in Davies, WD & Finkelstein, L (eds), *Introduction: the Persian period*. Cambridge History of Judaism, Vol. I. Cambridge: Cambridge University Press, 219-278.

Sneh, A, Weinberger, R & Shalev, E 2010. The why, how and when of the Siloam Tunnel re-evaluated. *BASOR* 359, 57-65.

Stager, LE 1965. An inscribed potsherd from the eleventh century B.C. *BASOR* 194, 45-52.

Stager, LE 1990. Shemer's estate. *BASOR* 277/278, 93-107.

Stager, LE 1996. The fury of Babylon: Ashkelon and the archaeology of destruction. *BAR* 22(1). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=22&Issue=1&ArticleID=6&UserID=2391 (accessed 20 March 2015).

Stager, LE, Master, DM & Schloen, JD 2011. *Ashkelon 3: the seventh century B.C*. Winona Lake: Eisenbrauns.

Starcky, J 1960. Une tablette araméenne de l'an 34 de Nabuchodonosor (AO, 21.063). *Syria* 37(1/2), 99-115.

Starkey, JL 1936. Excavations at Tell el Duweir, 1935-6. *PEQ* 68(4), 178-189.

Starkey, JL 1937a. Lachish as illustrating Bible history. *PEQ* 69(3), 171-179.

Starkey, JL 1937b. Excavations at Tell ed Duweir. *PEQ* 69(4), 228-2419.

Starkey, JL 1938. The discovery, in Torczyner (1938:11-14).

Stavig, G 1999. India and the Pentateuch. *Annals of the Bhandarkar Oriental Research Institute* 80(1/4), 77-94.

Steiner, ML 1998. David's Jerusalem: fiction or reality? It's not there: archaeology proves a negative. *BAR* 24(4). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=24&Issue=4&ArticleID=2&UserID=2391 (accessed 12 June 2015).

Steiner, ML 2001. *Excavations by Kathleen M. Kenyon in Jerusalem, 1961–1967, Vol. III: the settlement in the Bronze and Iron Ages.* Copenhagen International Series 9. London: Sheffield Academic.

Steiner, ML 2011. The Persian period city wall of Jerusalem, in Finkelstein & Na'aman (2011:307-315).

Stern, E 1979. Craft and industry, in Malamat (1979c:237-264).

Stern, E 1982. *Material culture of the land of the Bible in the Persian period, 538-332 B.C.* Warminster: Aris & Phillips.

Stern, E 1992. A hoard of bullae of the Persian period from the Samaria region. *Michmanim* 6, 7-30 (Hebrew; English summary).

Stern E (ed) 1993a. *New Encyclopaedia of Archaeological Excavations in the Holy Land*, Vol. 2. New York: Simon & Schuster.

Stern E (ed) 1993b. *New Encyclopaedia of Archaeological Excavations in the Holy Land*, Vol. 3. Jerusalem: Israel Exploration Society & Carta.

Stern, E 2000. *Dor: ruler of the seas*. Jerusalem: Israel Exploration Society.

Stern, E 2001. *Archaeology of the land of the Bible,* Vol. II. New Haven: Yale University Press.

Stevens, ME 2006. *Temples, tithes and taxes: the temple and the economic life of ancient Israel*. Peabody: Hendrickson.

Stone, WE 1969. Antecedents of the accounting profession. *TAR* 44(2), 284-291.

Sukenik, EL 1933. Inscribed Hebrew and Aramaic potsherds from Samaria. *PEQ* 65(3), 152-156.

Suter, CE 2011. Images, tradition, and meaning: the Samaria and other Levantine ivories of the Iron Age, in Frame, G, Leichty, E, Sonik, K, Tigay, J & Tinney, S (eds), *A common cultural heritage: studies on Mesopotamia and the biblical world in honor of Barry L. Eichler*. Bethesda: CDL Press, 219-241.

Szubin, HZ & Porten, B 1992. An Aramaic joint venture agreement: a new interpretation of the Bauer-Meissner Papyrus. *BASOR* 288, 67-84.

Tadmor, H 1958. The campaigns of Sargon II of Assur: a chronological-historical study. *JCS* 12(1), 22-40.

Tadmor, H 1961. Azriyau of Yaudi. *Scripta Hierosolymitana* 8, 232-271.

Tadmor, H 1966. Philistia under Assyrian rule. *BA* 29(3), 86-102.

Tadmor, H & Yamada, S 2011. *The royal inscriptions of Tiglath-pileser III (744-727 BC), and Shalmaneser V (726-722 BC), kings of Assyria*. Winona Lake: Eisenbrauns.

Talmon, S 1967. The Judaean ‘am ha’areṣ in historical perspective, in Shaked, S & Shenkman, Y (eds), *Fourth World Congress of Jewish Studies I*. Jerusalem: World Union of Jewish Studies, 71-76.

Talmon, S 1979. Kingship and the ideology of state, in Malamat (1979c:3-26).

Tappy, RE 1992. *The archaeology of Israelite Samaria, Vol. I: early Iron Age through the ninth century BCE*. Atlanta: Scholars.

Tappy, RE, McCarter, PK, Lundberg, MJ & Zuckerman, B 2006. An abecedary of the mid-tenth century B.C.E. from the Judaean Shephelah. *BASOR* 344, 5-46.

Thiele, ER 1965. *The mysterious numbers of the Hebrew kings*. Grand Rapids: Wm. B. Eerdmans.

Thiele, ER 1976. An additional chronological note on ‘Yaw, Son of “Omri”’. *BASOR* 222, 19-23.

Thomas, DW. 1950. Ostraca XIX-XXI from Tell ed-Duweir, in Thomas, DW (ed), *Essays and studies presented to Stanley Arthur Cook.* London: Taylor, 51-58.

Thompson, M, Mørkholm, O & Kraay, CM 1973 (eds). *An inventory of Greek coin hoards*. New York: The American Numismatic Society.

Thompson, TL 1999. *The mythic past: biblical archaeology and the myth of Israel*. New York: Basic.

Tibbetts, GR 1956. Pre-Islamic Arabia and South-East Asia. *Journal of the Malayan Branch of the Royal Asiatic Society* 29(3), 182-208.

Torczyner, H 1938. *The Lachish Letters*. London: Oxford University Press.

Torrey, CC 1941. On the ostraca from Elath (Bulletin No. 80). *BASOR* 82, 15-16.

Tsevat, M 1979. The emergence of the Israelite monarchy: Eli, Samuel, and Saul, in Malamat (1979b:61-75).

Tufnell, O 1950. Excavations at Tell ed-Duweir, Palestine, directed by the late J. L. Starkey, 1932-1938. *PEQ* 82(2), 65-80.

Tufnell. O 1953. *Lachish III (Tell ed-Duweir): the Iron Age*. London: Oxford University Press.

Tufnell, O 1959. Hazor, Samaria and Lachish. *PEQ* 91(2), 90-105.

Tushingham, AD 1992. A 'Neo-Babylonian' seal from Tell Taanach. *BASOR* 286, 15-18.

Ussishkin, D 1973. King Solomon's palaces. *BA* 36(3), 78-105.

Ussishkin, D 1974. Notes and News: Tel Lachish. *IEJ* 24(3/4), 272-273.

Ussishkin, D 1977. The destruction of Lachish by Sennacherib and the dating of the royal Judean storage jars. *TA* 4(1-2), 28-60.

Ussishkin, D 1978. Excavations at Tel Lachish – 1973-1977, preliminary report. *TA* 5(1-2), 1-97.

Ussishkin, D 1980. Was the 'Solomonic' city gate at Megiddo built by King Solomon? *BASOR* 239, 1-18.

Ussishkin, D 1983. Excavations at Tel Lachish – 1978-1983, second preliminary report. *TA* 10(2), 97-175.

Ussishkin, D 1990. The Assyrian attack on Lachish: the archaeological evidence from the southwest corner of the site. *TA* 17(1), 53-86.

Ussishkin, D 1996. Excavations and restoration work at Tel Lachish – 1985-1994: third preliminary report. *TA* 23(1), 3-60.

Ussishkin, D 2003. Solomon's Jerusalem: the text and the facts on the ground, in Vaughn & Killebrew (2003:103-115).

Ussishkin, D 2004. Area PAL: the Judean palace-fort, in Ussishkin, D (ed), *The renewed excavations at Lachish (1973-1994), Vols. 1-5*. Tel Aviv: Institute of Archaeology, Tel Aviv University, 768-870.

Ussishkin, D 2005. Big city, few people: Jerusalem in the Persian period. *BAR* 31(4). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=31&Issue=4&ArticleID=4&UserID=2391 (accessed 14 June 2015).

Ussishkin, D 2007. Megiddo and Samaria: a rejoinder to Norma Franklin. *BASOR* 348, 49-70.

Ussishkin, D 2009. The Temple Mount in Jerusalem during the First Temple period: an archaeologist's view, in Schloen, JD (ed), *Exploring the longue durée: essays in honor of Lawrence E. Stager*. Winona Lake: Eisenbrauns, 473-483.

Ussishkin, D 2011. The dating of the *lmlk* storage jars and its implications: rejoinder to Lipschits, Sergi and Koch. *TA* 38(2), 220-240.

Ussishkin, D 2012. On Nehemiah's city-wall and the size of Jerusalem during the Persian period: an archaeologist's view, in Kalimi, I (ed), *New perspectives on Ezra–Nehemiah: history and historiography, text, literature, and interpretation.* Winona Lake: Eisenbrauns, 101-130.

Ussishkin, D 2015a. Biblical Jerusalem: the archaeological evidence. Paper presented at the Annual Conference of the Old Testament Society of South Africa (OTSSA), Pretoria, 2-4 September. (Abstract).

Ussishkin, D 2015b. Sennacherib's campaign to Judah: the conquest of Lachish. Paper presented at the Annual Conference of the Old Testament Society of South Africa (OTSSA), Pretoria, 2-4 September. (Abstract).

Uziel, J & Shai, I 2007. Iron Age Jerusalem: temple-palace, capital city. *JAOS* 127(2), 161-170.

Van Beek, GW 1962. s v 'Ophir', in Buttrick, GA (ed), *The interpreter's dictionary of the Bible.* Nashville: Abingdon, 605-606.

Van der Veen, P 2015. Early Iron Age epigraphy and chronological revision: a summary article, in James, P & Van der Veen, P (eds), Solomon and Shishak. *BAR-IS* 2732, 190-198.

Vaughn, AG & Killebrew, AE (eds) 2003. *Jerusalem in Bible and archaeology: the First Temple period*. Atlanta: Society of Biblical Literature.

Von Rad, G 1933. Das reich Israel und die Philister. *PJb* 29, 30-42.

Walsh, C & Zorn, JR 1998. New insights from old wine presses. *PEQ* 130(2), 154-161.

Weidner, E 1952. Weisse pferde im Alten Orient. *Bibliotheca Orientalis* 9, 157-159.

Whitelam, KW 1996. *The invention of ancient Israel: the silencing of Palestinian history.* London: Routledge.

Winter, IJ 1981. Is there a South Syrian style of ivory carving in the early first millennium B.C.? *Iraq* 43(2), 101-130.

Wright, GE 1939. Iron: the date of its introduction into common use in Palestine. *AJA* 43(3), 458-463.

Wright, GE 1955a. Lachish III: the Iron Age by O. Tufnell. *JNES* 14(3), 188-189.

Wright, GE 1955b. Lachish III: the Iron Age by O. Tufnell. *VT* 5(1), 97-105.

Wright, GE 1956. The first campaign at Tell Balâtah (Shechem). *BASOR* 144, 9-20.

Wright, GE 1959. Samaria. *BA* 22(3), 67-78.

Wright, GE 1963. The water system of Gibeon by JB Pritchard. *JNES* 22(3), 210-211.

Yadin, Y 1958a. Solomon's city wall and gate at Gezer. *IEJ* 8(2), 80-86.

Yadin, Y 1958b. Excavations at Hazor, 1957: preliminary communiqué. *IEJ* 8(1), 1-14, 68.

Yadin, Y 1959. Recipients or owners: a note on the Samaria Ostraca. *IEJ* 9(3), 184-187.

Yadin, Y 1960. New light on Solomon's Megiddo. *BA* 23(2), 62-68.

Yadin, Y 1961a. The fourfold division of Judah. *BASOR* 163, 6-12.

Yadin, Y 1961b. Ancient Judaean weights and the date of the Samaria Ostraca, in Rabin C. (ed), *Studies in the Bible (Scripta Hierosolymitana)*, Vol. VIII. Jerusalem: Magnes, 9-25.

Yadin, Y 1962. A further note on the Samaria Ostraca. *IEJ* 12(1), 64-66.

Yadin, Y 1970. Megiddo of the kings of Israel. *BA* 33(3), 65-96.

Yadin, Y 1972. *Hazor: the head of all those kingdoms*. Oxford: Oxford University Press.

Yadin, Y 1979. The archaeological sources for the period of the monarchy, in Malamat (1979c:187-235).

Yadin, Y 1980. [Was the 'Solomonic' city gate at Megiddo built by King Solomon?]: a rejoinder. *BASOR* 239, 19-23.

Yassine, K 1984. *Tell el Mazar I: cemetery A*. Amman: University of Jordan.

Yeivin, S 1960. The date of the seal 'Belonging to Shemaʿ (the) servant (of) Jeroboam'. *JNES* 19(3), 205-212.

Yeivin, S 1966. A hieratic ostracon from Tel Arad. *IEJ* 16(3), 153-159.

Yeivin, S 1969. An ostracon from Tel Arad exhibiting a combination of two scripts. *JEA* 55, 98-102.

Yeivin, S 1979a. The divided kingdom: Rehoboam-Ahaz/Jeroboam-Pekah, in Malamat (1979b:126-179).

Yeivin, S 1979b. Administration, in Malamat (1979c:147-171).

Young, I 1992. The style of the Gezer Calendar and some "archaic biblical Hebrew" passages. *VT* 42(3), 363-375.

Zapassky, E, Finkelstein, I & Benenson, I 2009: Computing abilities in antiquity: the royal Judahite storage jars as a case-study. *JAMT* 16(1), 51–67.

Zorn, JR 1997a. An inner and outer gate complex at Tell en-Naṣbeh. *BASOR* 307, 53-66.

Zorn, JR 1997b. Mizpah: newly discovered stratum reveals Judah's other capital. *BAR* 23(5). From: http://0-www.basarchive.org.oasis.unisa.ac.za/bswbBrowse.asp?PubID=BSBA&Volume=23&Issue=5&ArticleID=1&UserID=2391 (accessed 15 June 2015).

Zorn, JR 1998. The dating of an early Iron Age kiln from Tell al-Nasbah. *Levant* 30, 199-202.

Zorn, JR 1999. A note on the date of the 'Great Wall' of Tell en-Naṣbeh. *TA* 26(1), 146-150.

Zorn, JR 2014. The Levant during the Babylonian period, in Steiner, ML & Killebrew, AE (eds), *The Oxford handbook of the archaeology of the Levant: c. 8000-332 BCE*. Oxford: Oxford University Press, 825-840.

Zorn, JR, Yellin, J & Hayes, J 1994. The *m(w)ṣh* stamp impressions and the Neo-Babylonian period. *IEJ* 44(3/4), 161-183.