SAPIENZA
UNIVERSITÀ DI ROMA

Cambia il titolo

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Engineering in Computer Science

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Academic Year 2024/2025

Cambia il titolo
Master Thesis. Sapienza University of Rome

This thesis has been typeset by LaTeX and the Sapthesis class.

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Dedicated to
Luigi Ricci

Acknowledgments

Abstract

Contents

Chapter 1

The Aegean Linear Scripts

Linear A and Linear B were writing systems used during the Bronze Age, primarily on the island of Crete, with some discoveries also made on the Greek mainland.

1.1 Historical Context

Around 2000 B.C., the already established Minoan civilization on the island of Crete began constructing large, complex architectural buildings commonly referred to as "palaces." These edifices served not only as administrative and economic centers, but also played important religious and ceremonial roles within Minoan society.

The founders of these palatial complexes were undoubtedly powerful landowners. Minoan society was highly organized and capable of mobilizing substantial manpower for major construction projects, such as leveling the hilltops at Knossos and Phaistos and erecting monumental palaces. [1]

Hence, this highly structured society began to feel the need for a form of administrative writing to record transactions, compile inventories, and manage other aspects of economic and bureaucratic activity.

The first form of writing developed by this society was a logographic script known as Minoan Hieroglyphics, or Cretan Hieroglyphics, attested between 2100 and 1700 B.C.. The earliest and most archaic script was composed entirely of logographic symbols, which superficially resembled Egyptian hieroglyphs. It was later abandoned in favor of a linear script known as Linear A, employed between 1800 and 1450 B.C.. The two systems initially coexisted for over a century, but in the following years, Linear A gradually replaced the former and became the sole writing system in use. [5]

Notably, the latest attestations of Cretan Hieroglyphs date to around 1700 B.C., when a catastrophe struck the island of Crete. All the palaces in the island's three main centers, Knossos, Phaistos, and Malia were destroyed. However, this did not lead to a cultural shift, as the palaces were promptly rebuilt, marking the passage from the Proto-palatial to the Neo-Palatial phase in Minoan history. [2]

This second phase of palace construction is the one that has survived to the present day, particularly at sites such as Knossos, Phaistos, Malia, and Zakros.

In 1450 B.C., a major catastrophe struck, probably caused by the eruption of the Thera volcano. It triggered devastating earthquakes and a tidal wave that

swept the north coast of Crete. As a result, the main centers of Minoan civilization, Phaistos, Aghia Triadha, Malia, the mansions of Tylissos and Ammisos, as well as the eastern cities of Gournia and Zakros, were reduced to ruins. Knossos also suffered significant damage, often accompanied by widespread fires. [3]

In 1400 B.C., Crete began losing its central cultural role, and the focus shifted to mainland Greece, particularly the Peloponnese. The palace of Knossos was destroyed, while major fortified citadels (fortresses) were built in places like Mycenae and Tiryns. [4]

During this period, a new linear writing system emerged. Although visually similar to Linear A, it encoded a different language: an archaic form of Ancient Greek. Its name is Linear B, and it was used from 1400 to around 1100 B.C. on Crete and the Greek mainland. The Mycenaean civilization, which flourished during this period, is characterized by its extensive use of Linear B for administrative purposes, particularly in palace economies. However, the destruction in Crete should not be interpreted as a Mycenaean military takeover, but rather as a transformative phase of socio-political and cultural adaptation. [6]

Table 1.1. Chronological framework of LA and LB [5]

Chronology	Crete			Mainland		
High Dating	**Pottery Phase**	**Cultural Phase**	**Scripts**	**Pottery Phase**	**Cultural Phase**	**Scripts**
1900–1800	MM II	Proto-Palatial	CH; LA	MH III	–	–
1800–1700	MM III		CH; LA	MH III		–
1700–1600	LM IA	Neo-Palatial	LA	LH I	Early Mycenaean	LA
1600–1450	LM IB		LA	LH IIA		?
1450–1400	LM II	Final-Palatial	LA?	LH IIB		?
1400–1375	LM IIIA1		LB	LH IIIA1	Late Mycenaean	LB
1375–1300	LM IIIA2	Post-Palatial	LB	LH IIIA2		LB
1300–1200	LM IIIB		LB	LH IIIB		LB
1200–1050	LM IIIC		–	LH IIIC		LB

1.2 The main sites

The main sites where Linear A documents have been found are located on the island of Crete. These include Knossos, Phaistos, Aghia Triada, Zakros, Khania, Tylissos, and Malia.

Figure 1.1. Sites of Linear A fragments in Crete. [1]

Linear A was more widespread, covering completely Crete and the Aegean Islands and reaching the Greek mainland. The main attestations of Linear A on the Greek mainland are very limited and generally considered sporadic and isolated. At Mycenae, a few Linear A inscriptions have been found, likely as a result of commercial or cultural exchanges with Crete. Similarly, some fragmentary finds have been uncovered at Tiryns, probably also related to trade or contacts with Minoan Crete.

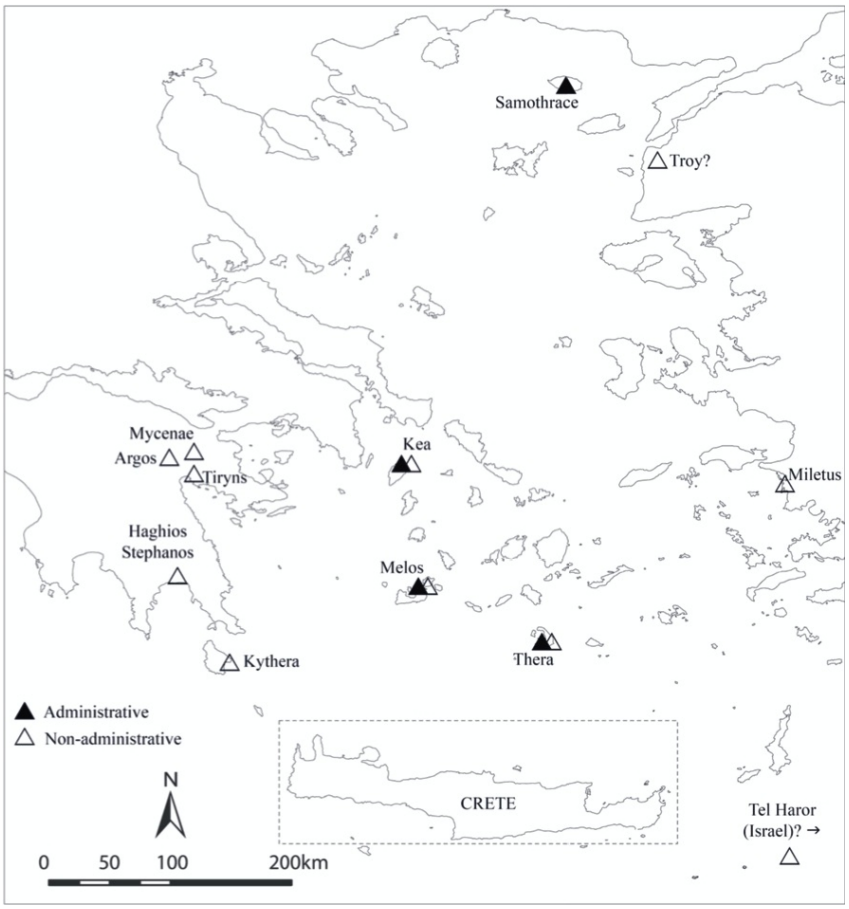


Figure 1.2. Sites of Linear A fragments in the Greek mainland. [2]

In contrast, Linear B is extensively attested on the Greek mainland, particularly in the Peloponnese, reflecting its administrative function during the Mycenaean period. Major sites where Linear B documents have been found include Mycenae, Tiryns, Pylos, Thebes, and Athens. Additionally, significant findings of Linear B tablets have been made in Crete, especially at Knossos and Khania.

The corpora of the two writing systems are relatively small, with Linear A consisting of approximately 1,400 documents, while Linear B comprises around 6,000 documents. Another notable difference is that Linear A was more widely used for non-administrative purposes, particularly in religious contexts, whereas the number of non-administrative Linear B documents is considerably more limited. [5]

[1]Figure 1.1 prepared by Yannis Galanakis and Ester Salgarella.
[2]Figure 1.2 prepared by Yannis Galanakis and Ester Salgarella.

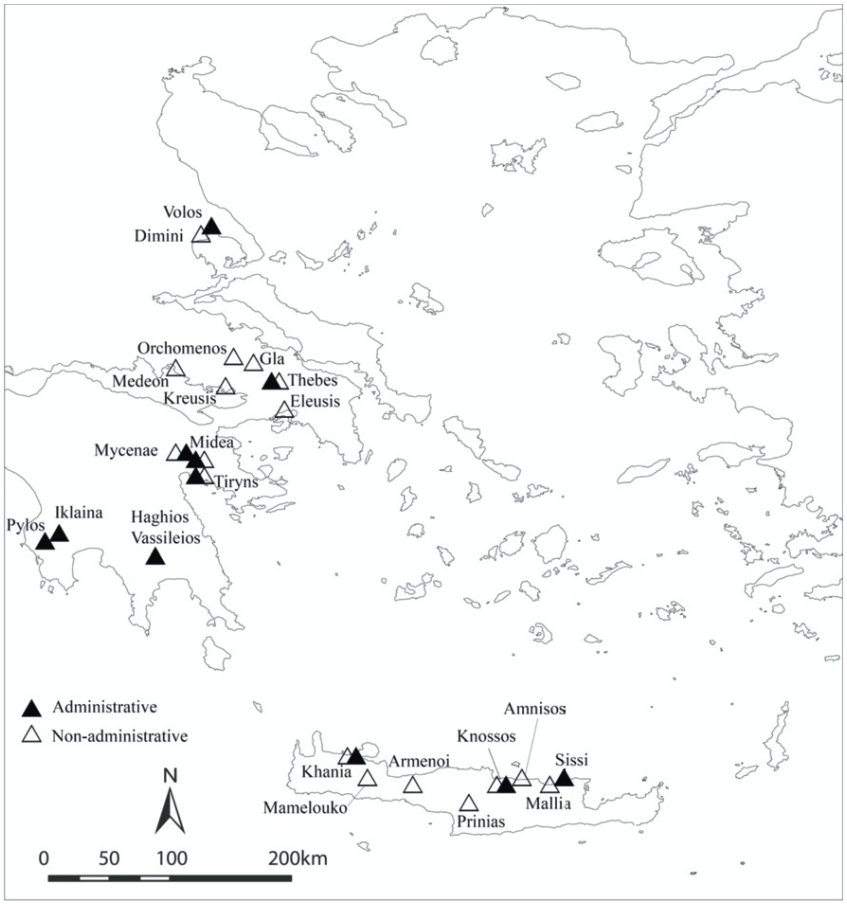


Figure 1.3. Sites of Linear B fragments in Crete and the Greek mainland. [3]

1.3 Linguistic features

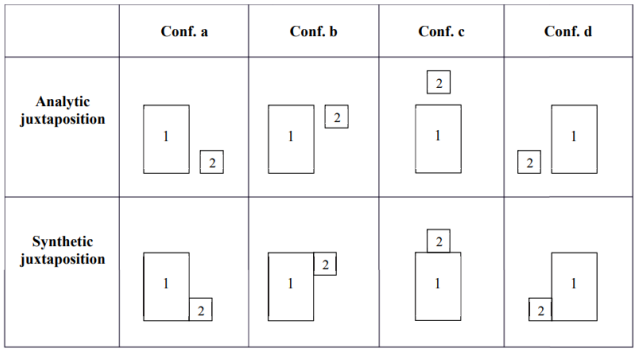
The two writing systems are characterized by similar structural features, reflecting the connection between Linear A and Linear B and the derivation of the latter from the former.

The primary similarity between the two scripts lies in their syllabic structure, which constitutes a defining feature of both writing systems. Both Linear A and Linear B are syllabic scripts, meaning that each symbol represents a syllable rather than an individual letter or a full word. In addition to syllabic signs, both systems incorporate a set of logograms: symbols representing entire words or concepts.

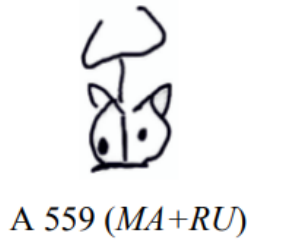
This logographic component is particularly prominent in Linear A, where a significant number of signs are used to denote specific objects, actions, or concepts, often associated with administrative and religious contexts. By contrast, Linear B employs a more restricted set of logograms, reflecting its primary function in administrative record-keeping. Notably, the logograms used in Linear A were generally not inherited by Linear B, with a single exception: the logogram for "wool"

[3]Figure 1.3 prepared by Yannis Galanakis and Ester Salgarella.

(MA+RU), which is attested in both scripts. However, the principles governing the formation of logograms remained unchanged, as in both scripts they are formed by juxtaposing or combining two or more signs, either horizontally or vertically.



(a) Logogram construction criteria.



(b) LA logogram for wool.

Figure 1.4. Logograms in Linear A and Linear B.

100 VIR	85-108 SUS	115 P	125 CYP*erus*	132	154	160
102 MUL*ier*	108^{f} SUS^{f}	116 N	125+*KU* CYP+*KU*	133 *A+RE+PA*	155^{VAS}	161
104 CERV*us*	108^{m} SUS^{m}	117 M	125+*O* CYP+*O*	135 *ME+RI*	155^{VAS}+*DI*	162 TUN*ica*
105 EQU*us*	108+*KA* SUS+*KA*	118 L	125+*PA* CYP+*PA*	140 AES	155^{VAS}+*NI*	162+*KI* TUN+*KI*
105^{f} EQU^{f}	108+*SI* SUS+*SI*	120 GRA*num*	125+*QA* CYP+*QA*	141 AUR*um*	156 *TU+RO$_2$*	162+*QE* TUN+*QE*
105^{m} EQU^{m}	23-109 BOS	120+*Q* GRA+*Q*	127 *KA+PO*	142	157	162+*RI* TUN+*RI*
21-106 OVIS	109^{f} BOS^{f}	120+*PE* GRA+*PE*	128 *KA+NA+KO*	144 CROC*us*	158	163 ARM*a*
106^{f} OVIS^{f}	109^{m} BOS^{m}	121 HORD*eum*	129 FAR	145 LANA	159 TELA	164
106^{m} OVIS^{m}	109+*SI* BOS+*SI*	122 OLIV*a*	130 OLE*um*	146	159+*KU* TELA+*KU*	165
106+*TA* OVIS+*TA*	110 Z	122+*A* OLIV+*A*	130+*A* OLE+*A*	146+*PE*	159+*PA* TELA+*PA*	166
22-107 CAP*er*	111 V	122+*TI* OLIV+*TI*	130+*PA* OLE+*PA*	150	159+*PO* TELA+*PO*	166+*WE*
107^{f} CAP^{f}	112 T	123 AROM*a*	130+*SI* OLE+*SI*	151 CORN*u*	159+*PU* TELA+*PU*	167
107^{m} CAP^{m}	113 S	123+*KO* AROM+*KO*	130+*WE* OLE+*WE*	152	159+*TE* TELA+*TE*	167+*PE*
107+*E* CAP+*E*	114 Q	123+125 AROM+CYP	131 VIN*um*	153	159+*ZO* TELA+*ZO*	168

Figure 1.5. Linear B logograms (symbols 100–168).

Figure 1.5 illustrates how logograms in Linear B can also incorporate syllabograms. In these cases, the syllabogram is referred to as an adjunct and typically serves to qualify or specify the meaning of the logogram. Moreover, the use of adjuncts is significantly more frequent in the Knossos corpus than on the Mainland, suggesting a possible continuity with Linear A, where isolated signs with sematographic value appear more commonly. [7]

Furthermore, a substantial portion of the Linear A syllabary is shared with

Linear B, with approximately 72% of Linear A signs being identical to those used in Linear B. This overlap also illustrates continuity in symbol creation and in the assignment of phonetic values between the two systems.

Figure 1.6. All Linear B syllabograms with the associated phonetic values.

As observed in Figure 1.6, signs referring to the same vowel exhibit recurring patterns—a characteristic feature of syllabic scripts also evident in Linear A. One of the most debated assumptions regarding the relationship between Linear A and Linear B is the principle of homomorphy and homophony. This principle posits that

signs which are visually similar (homomorphy) in both scripts also share the same phonetic value (homophony), representing the same syllable. [5]

This observation has led to the widely accepted conclusion that Linear A encodes a language fundamentally different from Linear B, with the latter used to represent an archaic form of Ancient Greek. Consequently, although scholars are able to phonetically transcribe Linear A inscriptions, the language remains undeciphered and its meaning unknown.

1.4 The decipherment of Linear B

Ever since the discovery of the first Linear B tablets in 1900 by Sir Arthur Evans at Knossos, the script has been a subject of intense scholarly interest. Evans himself introduced the classification of Aegean scripts that is still used today. He also made the earliest attempts to decipher Linear B, though without success.

The breakthrough in understanding Linear B came after World War II, following major discoveries at the site of Pylos in 1939, which uncovered a large number of tablets and inscriptions. A key figure in the decipherment of Linear B was Michael Ventris, a British architect and amateur linguist. Ventris, in collaboration with philologist John Chadwick, succeeded in deciphering the script in 1952, demonstrating that it encoded an early form of Ancient Greek.

1.4.1 The knowledge before the decipherment

Before the decipherment of Linear B, the effort to understand the script was constituted by independent studies of the script and possible connections with other known languages.

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