Out of the Historical Darkness: A Methodological Approach to Uncover the Hidden History of Ethnohistorical Sources

Resumen: La época colonial nos ha legado una serie de fuentes etnohistóricas de origen indígena pero de procedencia desconocida. La documentación histórica a la que nos referimos se restringe en muchos casos a la época de hallazgos hechos por eruditos entre los siglos XIX y XX en archivos olvidados de remotos pueblos, que dan una idea muy vaga sobre la época de su creación y que son en su mayoría de autores desconocidos. Su significado histórico permanece con frecuencia incierto y conlleva a las más diversas interpretaciones. El desafío metodológico para elaborar el conjunto de instrumentos de investigación, a fin de descubrir, ‘desde su interior’, la historia oculta de esta documentación, ha sido resuelta de distintos ángulos – con diferentes tipos de documentos de diferentes culturas, épocas e idiomas. El más famoso ejemplo es probablemente la investigación sobre el origen de la Biblia. En cada caso los investigadores han trabajado en la elaboración individual de un conjunto de instrumentos analíticos.

Durante la reconstrucción histórico-documentaria de los libros coloniales de Chilam Balam de Yucatán, se planteó la cuestión acerca de la existencia de una caja universal de herramientas e instrumentos analíticos utilizables de forma general para el análisis de fuentes históricas anónimas. Este artículo pretende demostrar de qué manera deben ser combinados diferentes instrumentos para la reconstrucción documentaria y el desarrollo de fuentes anónimas para comprender el perfil del autor y el sentido de su significado histórico. Finalmente los resultados de nuestra investigación quieren servir de ejemplo de discusión acerca de las posibilidades y riesgos de la aproximación metodológica y de su carácter universal.

Summary: The Colonial period has left us with a corpus of indigenous ethnohistorical sources of unknown origin. In many cases, the document history is restricted to the date of discovery by scholars in forgotten remote village archives in the 19th and 20th centuries and a roughly estimated date of origin. Authorship is frequently unknown. The historical significance often remains rather vague.

* The author wrote her Ph.D. thesis on Yucatec Maya historiography provided in the Yucatec Maya Books of Chilam Balam. The article is based mainly on this study. Since 2002 she is program director at Volkswagen Foundation and, simultaneously, part-time lecturer at the Institute of Historical Studies at the University of Hanover.
and leads to highly varied interpretations. The methodological challenge of elaborating an appropriate set of research instruments to detect the hidden history of those documents “from within” has been tackled in various ways – with different kinds of documents of different cultures, epochs, and languages. The most famous of these are probably studies on the origin of the Bible. In each case, researchers worked with an individually formed set of analytical instruments.

While reconstructing the documentary history of the colonial Yucatec Maya Books of Chilam Balam, the question arose whether there is a universal ‘toolkit’ of analytical instruments that can be used for the analysis of anonymous historical sources in general. The article will demonstrate how different instruments can be combined to reconstruct the documentary development of anonymous sources, providing a better understanding of the profile of the author(s) and a sense of their historical significance. Finally, the results of our research will serve as an example for discussing the possibilities and risks of the methodological approach and its universal character.

1. The problem at hand: Working with ethnohistorical documents of unknown origin

The primary goal of all ethnohistorians is to illuminate the past. Information about earlier human activities is hidden away in documents and elsewhere, and part of the ethnohistorian’s task is to ferret it out, collect it, and make it available.

(Barber/Berdan 1998:15)

Looking at the situation in Latin America, the ethnohistorian’s work is often aggravated by the unknown circumstances of when, why, and by whom the ethnohistorical source has been written. Thus, in some cases, a major task consists in rediscovering its origin in order to be able to ‘ferret out’ information on human activities and to understand the historical data in their original context. In the following we want to discuss a methodological approach that can be used to detect the manuscript history, based on inherent characteristics. Before we delve into the complexity of the topic, we want to inform the reader of our understanding of ethnohistorical sources.

While working with students, the question arose: What makes ‘ethnohistorical’ sources different from ‘historical’ sources? Thus, we looked for distinguishing marks that would make the difference comprehensible. In the end, we decided to use the term ‘ethnohistorical’ to refer to documents of indigenous origin, which describe historical circumstances from the perspective of the indigenous, and in many cases, the perspec-
Out of the Historical Darkness

tive of the colonized and the dominated. Historical documents, written by authors be-
longing to or oriented towards the dominating society, show us the perspective of
the colonizers. Ethnohistorical sources supply us with a unique insight into the topics,
values, and norms discussed within the indigenous, colonized societies, arising from
the intercultural interaction between the different ethnic and social groups (amongst
other reasons). Further on, colonization introduced new means of memorizing collec-
tive and individual history by offering a writing system to societies that were formerly
oriented towards oral tradition, or a European alphabetical writing system to societies
that were used to a syllabic hieroglyphic writing system (e.g. the Maya area in Middle
America). While European writers were rooted in this tradition, for the indigenous
writers it was a new system of preserving cultural knowledge. They learned European
writing, but worked with their inherited historical memory of oral and/or written tradi-
tion. In sum, we recognized three key characteristics that distinguish historical from
ethnohistorical sources: 1. the indigenous perspective on 2. intercultural interaction
within a colonial context, under 3. a new tradition of collecting and preserving mem-
ory.

Based on this understanding, the corpus of ethnohistorical sources is quite small if
we compare it to the amount of colonial historical sources – such as administrative,
economic and church documents, etc. – that have been passed down to us. Thus, there
are only a small number of individual indigenous voices that reach us from the past.
The circumstances of how these documents were passed on to us make it even more
difficult to interpret them correctly. Many of them were discovered by chance in
government or church archives, in remote village archives, or in hidden corners of
bookstores, lacking hints as to authorship, the date and purpose of writing, or a more
precise geographical origin. In these cases, it seems to be more accurate to speak of
anonymous ethnohistorical documents. In many of these instances, the known
manuscript history starts with the point of discovery and is much better known than
the original circumstances of the document’s creation. Of course, content studies –
especially if the content refers to historical records – enable us to roughly approximate
the time of writing or the types of sources and meaning of the document (e.g. legal
matters, memorization for public use). We can also find some vague hints of who the
writer was (or who the writers were). However, we would still miss important
information that might help us interpret and understand the data in their historical
context, such as:

1 We refer ourselves specifically to the Latin American colonial context.
2 We do not want to enter into a debate on the difference between ‘historical studies’ and ‘ethnohis-
torical studies’, since this does not seem appropriate here. There are many detailed studies on this
matter. Barber/Berdan provide a short overview on previous discussions (Barber/Berdan 1998: 5-13).
the social, economic and political situation of the author and his/her cultural background, influencing the way he or she looked at things;

whether the author witnessed the accounts he/she described;

what kind of education he or she received;

what kind of information and sources were at hand at the time of writing (oral or written family accounts, access to different kinds of historical and contemporary reports, etc.);

whether the document was written for a private or an official purpose;

whether the writer (or the writers) utilized indigenous text genres (with a specific way of displaying historical data and with fixed formulaic elements);

whether it was written on the order of a specific client, etc.

Answering these questions may only be the tip of the iceberg. In many cases, we may suppose with some certainty that documents were handed down from one generation to the next. However, to assume that later generations might only have copied those manuscripts and/or added further data, would be short sighted. In these cases content analysis helps to recognize semantic disturbances. However, we would like to know more, for example, if the historical record was revised in order to fit into a new contemporary political context and thus, shows a new attitude towards history. Additionally, many manuscripts have a highly complex history of revised compositions. What is needed here is an ample and adequate analytical approach that deals with this complexity and provides the information from 'within' the text itself, i.e. inherent to the text. Of course this need arises while working with historical sources in general, and some good examples of detailed textual analysis already exist that demonstrate how much of a document’s history is hidden within the text itself and that this history can be detected by careful attention to thematic, formulaic, stylistic and chronological features within the document. Mainly by working on annotated text translations, scholars revealed details in style, form of expression, and thematic order. They recognized different types of writing styles and autobiographic passages revealing different individual writers. Those observations provide a better idea about the composition of the manuscript by various authors over time. In our analysis we refer to the work of Lehmann/Kutscher/Vollmer in their transcription and translation of the Codex Aubin (1981: ix-xxxxiii); the work of Klaus on the Anales de Tlatelolco (1999: 7-24), and the work of Bricker and Miram in their translation and transcription of the Chilam Balam of Kaua (2002: 10-88). Of course there are many more works on (anonymous) ethno-

---

3 In 1998, Barber/Berdan published a most valuable introductory manual on the use of primary sources.

4 Autobiographic passages are brief entries reminding of the birth or baptism of a child, a marriage date, a death, or the recollection of a local historical event (e.g. official opening of a local church building).
historical sources that cannot be mentioned here individually. We believe that those we present give a good impression of the most problematic aspects involved: uncovering the manuscript history ‘from within’ means to undergo a most meticulous process of analyzing text passages through a detailed and careful study of the smallest text passages and language elements. This expenditure of time and energy is carried out in very few cases, because at first it is not foreseeable if the meticulous study will be rewarded with sufficiently positive results. Additionally, the primary objective is to supply the interested scholarly community with a translation of the ethnohistorical document from the indigenous language into English or Spanish (see for example Vollmer in: Lehmann/Kutscher/Vollmer 1981: xviii). Detailed and meticulous studies on the writer’s profile and personality are of secondary importance, although only this knowledge provides an understanding of the historical data in its original sense. Moreover, scholars start their studies by developing their own individual methodological approaches to tackle the problems they want to analyze. Thus, although we have studies on similar topics, they are conducted using different approaches. On that basis, we pose the question of whether it is possible to elaborate a kind of ‘universal toolkit’, which, with reasonable effort, allows the reconstruction of the historical process of manuscript composition using inherent characteristics. We believe that the toolkit has to consist of several analytical instruments, which supplement each other and have synergetic effects when combined. To avoid time-consuming studies, it should be possible:

1. to analyze only selected text passages and to transfer those results to larger portions of the manuscript,
2. to recognize already in the beginning, whether the continuation of the study would be worthwhile and whether it would lead to positive results.

However, this implies the existence of a basic theoretical and methodological framework that provides indications on how to interpret discovered features.

In the following we want to demonstrate such an analytical toolkit and its theoretical framework. The toolkit consists of instruments oriented towards thematic, formulaic, chronological, semantic, syntactic, rhetoric, and biographic characteristics. It has been developed for the analysis of the manuscript history of three selected Yucatec Maya colonial text collections from the Books of Chilam Balam. We will first illustrate the toolkit and then discuss the achieved results with reference to the unraveled manuscript history of the chosen documents. Based on our findings, we then discuss whether this kind of a toolkit can be universally applied to every kind of anonymous document.
2. The focus of our research: The unknown manuscript history of the Books of Chilam Balam

2.1 The Books of Chilam Balam: Collections of autochthonous Yucatec Maya Text genres

The expression ‘Book of Chilam Balam’ is used to describe Yucatec Maya text collections of mainly colonial origin. They can be best described by their contents:

- predictions, arranged according to temporal periods of the Maya calendar system (mainly for k ’atun, tun and k ‘in periods), but also with reference to the 12 signs of the zodiac and their impact on the character and health of human beings,
- historical narratives, myths, and reports arranged on the basis of the k ’atun cycle of the Maya calendar or of the Christian year in the form of almanacs or short individual accounts, often fragmented,
- riddles, possibly occurring in the form of ‘questions and answers’ (e.g. the so called ‘Language of Zuyua’) or showing up as a Yucatec Maya version of a tale of ‘Thousand and One Nights’, which is the story of ‘Doncella Theodora’,
- medical prescriptions for curing different kinds of illnesses,
- Yucatec Maya versions of biblical topics such as the genesis, the last judgment, the apocalypse, and creation myths,
- prophecies for the k ’atun, tun, and k ‘in periods,
- ritual texts referring to the ‘fire ceremony’.

The text collections yield thematic repetitions that occur especially with prognostic and prophetic texts. For example, one may find various versions of the prophecy for k ’atun 4 Ahau and k ’atun 8 Ahau, temporal periods of great importance in the historical concept of the Yucatec Maya. Types and topics of texts in the manuscripts give us a wealthy impression of the different interests, points of discussion, needs and guidelines, but also themes of entertainment, which were of importance to colonial Yucatec Maya society. Since the books have not been written for administrative or legal reasons (and thus, did not have to be accommodated to official Spanish colonial requirements), they also allow us to observe the way Yucatec Maya and Spanish European Christian traditions were combined to create a world conception that ‘fit’ into colonial Yucatec Maya everyday life.

---

5 K’atun is one of five main temporal units by which the ancient Maya counted time. A k’atun period covers the period of 7,200 days, which corresponds to approximately 19 years and 9 months (for a more ample description of the Maya calendar system, see: Morley/Brainerd/Sharer 1983: 548-563; Riese 1990: 101-132).
6 Tun is the period corresponding to 360 days (for further information see: note 5).
7 K’in is the equivalent of the period of one day (for further information see: note 5).
The discovery of the manuscripts by scholars of Yucatec Maya language and history started in 1837, when the philologist Juan Pío Pérez (1798–1859) found a selection of Yucatec Maya texts in the village archive of Maní, a well-known center for colonial documents (see Fig. 1 for its location). Pío Pérez had a special interest in the understanding of the calendar system, the language, and the history of the ancient Maya of the Yucatan. He copied Yucatec Maya texts yielding information on these topics and during his research discovered a book entitled “el libro del Chilam Balam” amongst other texts in the mentioned archive (Tozzer [1921] 1977: 142-49). He shared his data with other scholars, such as John Lloyd Stephens and Bishop Crescencio Carillo y Ancona, and fostered a growing interest in these old native documents. In the following decades, more and more books, like the one found in Maní, were discovered. In many cases their original owners sold them to non-Yucatec Maya scholars. Bishop Carillo y Ancona, himself a passionate collector of old manuscripts, introduced the common title ‘Book of Chilam Balam’. To distinguish the different books, the village name of their origin (or putative origin) is attached. Thus, we speak of the ‘Chilam Balam of (the village of) Chumayel’ or ‘Chilam Balam of (the village of) Tusik’. Until now eight Books of Chilam Balam have been discovered. Table 1 lists all known books, their place of origin, an approximate date of manuscript creation, where the documents are archived today, and the amount of pages of each.

The Chilam Balm of Na is so far the only text collection that was signed by its Yucatec Maya writers José María Na and José Secundino Na from the village of Teabo (Tozzer [1921] 1977: 191; Gubler/Bolles 2000: 2). Sometimes references to the Chilam Balam Books of the villages Nabula, Tihosuco, Tixkokob, and Hocaba are mentioned, although actual manuscripts are not known (Smailus 1986: 108). It has been speculated that there must have been (or still are) many more Books of Chilam Balam than pres

---

8 The Yucatec term *chilan* or *chilan than* is translated in the Yucatec-Spanish dictionary Calepino de Motul with *intérprete o naguatlato* (Calepino de Motul 1995, I: 242). This translation has to be understood within the colonial origin of the dictionary, because in New Spain the Spanish used the Nahuatl term *nahuatlato* (Karttunen 1994: 93) for translators (of Indian languages). In his report on the history and everyday life of Yucatan, the Franciscan friar and second bishop of Yucatan, Diego de Landa, explains that a Maya priest “que tiene a su cargo dar las respuestas del demonio” is called chilam (Landa 1995: 27, Kap. XI). According to this description the *chilan* or *chilam* communicates with the gods and thus works as an intermediary between man and the supernatural beings. In addition, the *Relación histórico-geográfica de la ciudad de Mérida* written in 1579, mentions a Maya priest with the name *Chilam Balam* (see Garza, Mercedes de la/Izquierdo, Ana Luisa (eds.) (1983), I: 69). It is told that he lived close to the village of Maní and he is remembered as a wise and powerful prophet. Amongst different prophecies, he is said to have foreseen the arrival of the Spaniards. In his work, Roys (1954: 6) points out the meaning of balam, the “jaguar”, as a common family name in Yucatan. It has been speculated that the historic person ‘priest Balam’ could have been one of the first compilers.
Fig. 1: Places of colonial Yucatec Maya Documents (map designed by Karl-Heinz Dürsch).
ently known. They may have been lost or are kept in secrecy. One text collection, which was copied by Juan Pío Pérez in 1837 in the village archive of Maní, yields amongst other text types ‘el libro del Chilam Balam de Maní’. This compendium has been called ‘Codice Pérez’, because of its mixed origin (for a more detailed introduction to this text collection, see Craine/Reindorp 1979: 6).

With reference to content characteristics, two different classes of books can be distinguished:

1. The Books of Chilam Balam originating in the northern part of the Yucatan peninsula (from the villages of Chumayel, Tizimín and Maní), contain a number of (fragmented) historical narratives and almanacs combined with astrological and prognostic almanacs.

2. The second group of Books, originating in the southern part of the peninsula, yields mainly prescriptions to cure diseases (Chilam Balam of Chan Cah) and/or prognostic almanacs (Chilam Balam of Tekax and of Na).

<table>
<thead>
<tr>
<th>Title</th>
<th>Place of Origin</th>
<th>Manuscript Creation</th>
<th>Current archive</th>
<th>Extent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chilam Balam of Chan Cah</td>
<td>Chan Cah (Quintana Roo)</td>
<td>between 1820 and 1830</td>
<td>INAH, México, D.F.</td>
<td>128 pages</td>
</tr>
<tr>
<td>Chilam Balam of Chumayel</td>
<td>Chumayel (Yucatan)</td>
<td>before 1828</td>
<td>Princeton University Library, Princeton, New Jersey</td>
<td>107 pages</td>
</tr>
<tr>
<td>Chilam Balam of Ixil</td>
<td>Ixil (Yucatan)</td>
<td>presumably mid 18th century</td>
<td>Museo Nacional de Antropología, México, D.F.</td>
<td>88 pages</td>
</tr>
<tr>
<td>Chilam Balam of Káua</td>
<td>Kaua (Yucatan)</td>
<td>between 1780 and 1800</td>
<td>unknown</td>
<td>282 pages</td>
</tr>
<tr>
<td>Chilam Balam of Na (title refers to owner at time of discovery)</td>
<td>Teabo (Yucatan)</td>
<td>after 1896 (year of last entries)</td>
<td>Research Institute of the University of Princeton, New Jersey</td>
<td>64 pages</td>
</tr>
<tr>
<td>Chilam Balam of Tekax</td>
<td>Tekax (Yucatan)</td>
<td>presumably around 1833</td>
<td>unknown</td>
<td>37 pages</td>
</tr>
</tbody>
</table>

9 For example, the late village scribe of Xocen, Don Fulgencio Nah, explained to me in February 1997 that the Chilam Balam of Xocen is hidden in a secret place.

10 The total page numbers are taken from the transcription of the ‘Books of Chilam Balam’ by Miram (1988).
The Book of Chilam Balam of Káua provides a mixture of all mentioned text types, but it is characterized additionally by a large amount of European text types and issues (Miram/Bricker 1996, Bricker/Miram 2002: 12ff., 33ff., 85ff.). For a more detailed description of content and manuscript history and an overview of early works on the Books of Chilam Balam see Tozzer ([1921] 1977: 142-149; 182-192); Gibson/Glass (1975: 379-387), and Gunsenheimer (2002: 9-16). Persson worked on a guide for the understanding of the Books within Maya culture and presents a list of topics occurring in all books (Persson 1996: 122-123). Each of the Books has been translated into English, Spanish, or both, and sometimes repeatedly by different scholars.

Most of the Books have been discovered as loose collections of singular sheets of paper without numbers. Page numbering was later introduced by scholars who started to transcribe and translate them. In some cases the text sequence is structured by subtitles (e.g. Chilam Balam of Chumayel), but in other cases texts of different types follow each other without markings (e.g. Chilam Balam of Tizimín). Thus, it is not easy to distinguish individual texts and the reader has to pay careful attention to thematic changes as well as to formulaic introductory and closing remarks. Most of the Books have no punctuation. An individual character is given to the text collections by the different handwritings, individual markings for paragraphs, text sections, and drawings. Almost all Books show drawings that refer to calendar topics or the signs of the zodiac.

2.2 Manuscript composition: When, how, why and by whom?

The circumstances of manuscript composition have been the topic of a number of debates and given way to many considerations and suggestions (see summary in Table 2). When we started our work on the history of manuscript composition of the

---

Table 1: Summary of the known Books of Chilam Balam with reference to place of origin, approximate date of manuscript creation, current archive and extent (see Fig. 1 for location).

<table>
<thead>
<tr>
<th>Title</th>
<th>Place of Origin</th>
<th>Manuscript Creation</th>
<th>Current archive</th>
<th>Extent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chilam Balam of Tizimín</td>
<td>Tizimín (Yucatan)</td>
<td>before 1845</td>
<td>Museo Nacional de Antropología, México, D.F.</td>
<td>54 pages</td>
</tr>
<tr>
<td>Chilam Balam of Tusik</td>
<td>Tusik (Quintana Roo)</td>
<td>before 1875</td>
<td>San Francisco Aké</td>
<td>58 pages</td>
</tr>
<tr>
<td>Codice Pérez</td>
<td>Archive of Maní (Yucatan)</td>
<td>1837</td>
<td>unknown</td>
<td>176 pages</td>
</tr>
</tbody>
</table>

---

11 Only the Chilam Balam from the village of Tusik was bound as a book.
Out of the Historical Darkness

Books of Chilam Balam of Chumayel, Tizimín and Codice Pérez, it was generally assumed that the composers were of elite Yucatec Maya origin with access to a broader European education. This assumption base mainly on Scholes’s and Roys’s analysis of 16th century church documents of legal processes against the idolatry in Yucatan. Those accused of idolatry were the village school and church masters, members of the local elite in many cases (Scholes/Roys 1938, I: 41-128, 605; Collins 1977: 233-247; Farriss 1984: 341).

The individual identification of the writer is only known for the already mentioned Chilam Balam of Na (Gubler/Bolles 2000: 1, note 1). For the Chilam Balam of Chumayel Don Juan Josef Hoil, the local governor of the village in the second half of the 18th century, has been suggested as the author (Roys [1933] 1967: 7-8; Luxton 1995: xvii).

With regard to sources, it has been widely discussed that the Yucatec Maya authors still might have known hieroglyphic inscriptions and transferred those data into European writing. But also orally transmitted historical and cultural data could have been a primary source. Texts of European origin in the colonial Yucatec documents can be traced back to the widely dispersed year books, in Spanish ‘Reportorios de los Tiempos’ (see for example the ‘Reportorio de los Tiempos’ by Andrés de Li, Zaragoza 1495, in its reprint of 1999 by Delbrugge, and further explanation to the export of those books to Latin America in Leonhard (1992: 183-211) and Kropfinger-von Kügelgen (1973: 6).

It was further assumed that a first composition could already have occurred in the second half of the 16th century, but later beginnings also seemed possible (with reference to year accounts in the manuscripts). Finally, the latest dates in the manuscripts suggested that a final composition stage was reached in the late 18th or early 19th century. We recognized that, although each text collection shows individual characteristics in content, style, and structure, a systematic and comprehensive approach with a detailed analysis of characteristic features was missing when we started our work.

<table>
<thead>
<tr>
<th>Key Criteria</th>
<th>Idea</th>
<th>Discussed by</th>
</tr>
</thead>
</table>
| Writer’s/Composer’s identity | Members of the elite/noble class in Yucatec colonial society  
Maestros cantores / local school masters | Smailus (1986)  
Scholes/Roys (1938)  
Collins (1977)  
Farriss (1984) |
Table 2: Key criteria of document history (for a broader discussion see Gunsenheimer 2002: 91-96).

### 3. Theoretical framework and toolkit

#### 3.1 Models of manuscript composition

Based on the mentioned discussions, we developed two theoretical models for the first composition of the manuscripts and their subsequent further development through centuries via several generations of scribes. The models help to detect and understand the documents’ characteristic features that are due to the different types of text composi-
Out of the Historical Darkness

Thus, the theoretical considerations serve as a source of reference for interpretation. We started with an estimation of the time span we are working with: probable dates of first composition until the last copy or revision. Because missionary schools started in the middle of the 16th century, the first composition may not have been carried out before 1550. Since the Books were discovered in the early 19th century, we can assume that the manuscript tradition ends there or even earlier. Thus, we are dealing with a manuscript 'pre'-history12 of a maximum of 300 years. In the beginning, we can assume that the scribes used different types of sources at hand (hieroglyphic inscriptions, European year books, and vernacular historical and cultural knowledge) and composed a first set of texts that were of interest to Yucatec Maya society at that point of time. It is important to note that the sources might have been mixed right from the beginning and simply served as a pool of information. With the extinction of hieroglyphic books and the knowledge to read those books, their input probably decreased, while more and more European topics (written as well as oral accounts) were included. It is our concern to reconstruct the manuscript history during those almost 300 years of continuous manuscript tradition from generation to generation. In the following, we will present two models of possible progress, showing a way of extreme conservatism in text tradition (= Model A) and a way of extreme text revision (= Model B).13 For the moment, we suspend the discussion of primary sources (which will be taken up later) and focus our interest on the changes that occur within manuscripts through different generations of scribes and different ways of text transmission.

Model A. This is the most simple variant of a continued text tradition, because it assumes that a first manuscript version (the archetype or master copy) was composed by a writer14 who consciously selected texts and put them in a meaningful thematic and chronological order. Later generations of scribes only copied the old manuscript without adding or changing the original. It may have been copied by various scribes and taken to different places/villages, where it was kept in the local archive and passed on. Another copy was only made when it seemed necessary because of paper decay or the need to distribute more copies. Table 3 shows a schematic presentation of this simple development. This kind of supposed manuscript history will not lead to content

---

12  Pre-history: the time span between first manuscript compilation and inclusion into an archive, including several manuscript revisions.
13  The development of the two models is based on the work Textkritik by Maas (first printing in 1927, we used the 1957 edition) and the work of Egger on Methodenlehre zum Neuen Testament (first printing in 1987, we used the 1999 edition).
14  The reader will notice that we use a varying terminology when referring to composers, compilators, authors, writers and scribes. Of course, there are differences between them. However, with reference to the studied documents, it is not possible to distinguish whether someone only compiled documents, or only wrote or revised them. We assume that most of the colonial scribes did everything: they copied, compiled, and revised.
changes. However, we may expect that errors occurred during the copying process and that those errors are carried on through later copies. We can further suppose that later generations of scribes individually changed the orthography of words and/or exchanged terms that no longer seemed appropriate to them because they had changed meaning or were no longer being used (Smailus 1986: 113).

<table>
<thead>
<tr>
<th>Type of Source</th>
<th>1. Manuscript Composition</th>
<th>2. Revision</th>
<th>3. Revision</th>
<th>x. Revision</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hieroglyphic inscriptions, European year books, vernacular knowledge</td>
<td>starting point of colonial text tradition</td>
<td>Copy 1</td>
<td>Copy 2</td>
<td>Copy X End of text tradition</td>
</tr>
<tr>
<td>Source 1-n</td>
<td>Archetype A</td>
<td>Text $A^1$</td>
<td>Text $A^2$</td>
<td>Text $A^x$</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Text $B^1$</td>
<td>Text $B^2$</td>
<td>Text $B^x$</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Text $C^1$</td>
<td>Text $C^2$</td>
<td>Text $C^x$</td>
</tr>
</tbody>
</table>

Table 3: Manuscript progress in accordance to Model A

In the end, the different copies, in our model called $A^x$, $B^x$, and $C^x$, still have the same origin, but they will not be identical. Because of individual minor changes in writing, wording, and text layout, the resulting manuscripts will be different. However, it will be possible to reconstruct Archetype $A$ through the existing copies. It should still be possible to detect the original thematic, semantic, and chronological composition (textual coherence and cohesion) within the remaining manuscripts. Introductory and closing remarks of the different text types might have changed because later generations of users needed more information to understand the texts.

**Model B.** While Model A is poor in manuscript changes, Model B presents a maximum of changes to content, chronology, structure, and style. The major difference is that while copying Archetype $A$, scribes may have added new material, reduced information and restructured the text sequence. Manuscript comprehension might have suffered after several steps of revision and made a complete restructuring of the entire text corpus necessary. Thus, the different scribes may have created new archetypes of documents. A schematic sketch of this progress is presented in Table 4.

Model B is characterized by a strong dynamic of constant changes. The original manuscript, Archetype $A$, can only partially be reconstructed by looking at the common topics in text versions $C^x$ and $D^x$. However, these corresponding text passages will not allow us to draw conclusions on the complete form, structure, and content of
Archetype A. But the different versions will allow us to reconstruct and isolate the different steps of revisions. Referring back to the manuscript, we can recognize this kind of textual development in the disturbances or tensions within:

- the chronological sequence of historical accounts and
- the thematic and semantic coherence of the text because the logical order of events, agent and patient relationship are confused and/or disturbed.

Additionally, we can recognize the following:

- disturbing repetitions of topics and motives
- contradictions and confusions in the plot (changing actors and central figures) and
- changing stylistic and linguistic features.

<table>
<thead>
<tr>
<th>Type of Source</th>
<th>1. Manuscript Composition</th>
<th>2. Revision</th>
<th>3. Revision</th>
<th>x. Revision</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hieroglyphic inscriptions, European year books, vernacular knowledge</td>
<td>starting point of colonial text tradition</td>
<td>Copy of archetype A and individual additions = Text A(^1)</td>
<td>Copy of A(^1) with further material and new text sequence = Archetype C</td>
<td>Copy of archetype C with additions and final revision into new manuscript form = Text C(^x)</td>
</tr>
<tr>
<td>Source 1-n ⇒ Archetype A</td>
<td>⇒</td>
<td>⇒</td>
<td>⇒</td>
<td>⇒</td>
</tr>
<tr>
<td>⇒ Copy of archetype A with omissions = Archetype B</td>
<td>⇒ Copy of archetype B, but new text sequence = Archetype D</td>
<td>⇒ Revision of archetype D with added information = Text D(^x)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Table 4: Manuscript progress in accordance with Model B

---

15 Egger (1999: 32-33) calls tensions also caesura.
Models A and B of manuscript history present two extreme ways of manuscript production and revision. They illustrate possible changes and characteristics of changes with reference to the original manuscript. More elaborated ways of development may have occurred (e.g. more revisions and more copies), but those could not add further criteria to the scenario presented in the two models. With reference to our case study – the manuscript pre-history of the Books of Chilam Balam of Chumayel, Tizimín, and Codex Pérez, between their first composition and their discovery by scholars in the 19th century – we may conclude that the process was a mixture of both models over the course of time. In order to reconstruct these stages of copying and of text re-composition, we have to look for parameters that may help us recognize the different kinds of disturbances and tensions.

At the beginning of our study we looked for similar cases in order to obtain support for solving theses questions. We came across a vast body of literature tackling very different sorts of texts and historical contexts. The critical literary studies developed for the reconstruction of older compositions of biblical texts seemed to be the most appropriate for this purpose. However, those methodological approaches (see for example Egger 1999) could only serve as a first basis from which a much more detailed step-by-step approach had to be worked out which will be illustrated in the following. We looked for appropriate analytical instruments and combined them to form a set, a kind of toolkit. With the use of this term, we want to allude to several ideas: the instruments allow different steps of detailed analytical work, helping to reveal hidden or inherent information within the document used to reconstruct its unknown origin and its ‘textual’ history. However, only the synergetic combination of the results of several tools will lead to conclusions.

3.2 Instruments of analysis
3.2.1 Thematic and semantic coherence and incoherence

To get a first overview of the thematic and semantic structure of the manuscript, it is helpful to list the topic sequence and involved actors, and also – if mentioned – the date. With manuscripts of more than 300 pages, this is, of course, a very time-consuming, although very worthwhile task. It enables us to recognize and locate thematic repetitions, disturbances in the logical and comprehensible sequence of events, changes within the plot, and changes of actors (= semantic data). The thematic and semantic structuring will enable us to differentiate coherent text passages from incoherent ones. As long as topic, actor, and other involved persons are acting within a referential framework, we can be sure that we are looking at a semantically coherent text passage. It will also give us valuable hints at those text passages that will be useful for detailed formulaic, chronological, syntactic, rhetoric and linguistic analysis. We
present a fictitious text passage in order to explain thematic and semantic coherence and incoherence:

1) This is the story of the Bavarians and their migration history.
2) The Bavarians left their home in Munich.
3) And for 80 years they wandered around until they reached a large lake.
4) On its banks they finally settled and found a new home.
5) They were advised by their ruler; his name was Ludwig.
6) And this also happened to Ismael.
7) He left his family because of continuous quarrels with his father.
8) And after many years of migration, he found a new place to live,
9) where he could live in peace.
10) After 80 years of migration they settled on the embankment of the lake, called Starnberg Lake
11) under the wise rulership of Ludwig.

Lines 6 to 9 interrupt the narration of the Bavarians. The narrative focus changes from the agent “the Bavarians” to a new agent “Ismael”. The new agent is not introduced. The reader is not informed of any relationship between “the Bavarians” and “Ismael” or “Ismael” and “Ludwig”. Starting with line 10 the former topic is taken up again and concludes with the repetition of the information. In addition, the two event descriptions differ in terms of data importance. With reference to the Bavarians, it seems to be important to refer to the duration of migration. With regard to Ismael’s fate, it seems to be more important to inform about the reason why he left his family, which receives a final emphasis by explaining “where he could live in peace”. However, both events share a common topic “migration and re-settlement”. Thus, the little text passage shows thematic coherence, but semantic incoherence. In the case of a historical document, we may conclude that the composer grouped several event descriptions of different origins, but with similar character.

3.2.2 Formulaic expressions and text genre

Differentiating topic sequences will also help us take a closer look at the inherent structure of thematically coherent passages. It should then be possible to identify different text genres via their internal data and formulaic structure, as for example by formulaic introductory and closing remarks, specific information sequencing, specific syntactic structuring, formulaic chronological data, etc. We give an example of two different text genres that occur in the Books of Chilam Balam. Our attention focuses on the data and their sequencing:
<table>
<thead>
<tr>
<th>The Chronicles</th>
<th>The K’atun Prophecies</th>
</tr>
</thead>
<tbody>
<tr>
<td>[In K’atun] 4 Ahau it happened that … [short event description].</td>
<td>K’atun 4 Ahau has its seat in … God “X” is its face. (Characteristic sky direction, plant, and animal) Metaphoric description of characteristics of the K’atun-period. The period will be good or bad.</td>
</tr>
<tr>
<td>[In K’atun] 2 Ahau it happened that … [short event description].</td>
<td>K’atun 2 Ahau has its seat in … God “X” is its face. (Characteristic sky direction, plant, and animal) Metaphoric description of characteristics of the K’atun-period. The period will be good or bad.</td>
</tr>
<tr>
<td>...</td>
<td>...</td>
</tr>
</tbody>
</table>

Although both text types refer primarily to the temporal period (the k’atun period), the different information sequencing clearly marks them as two different text genres. The Chronicles are short descriptions of historic events, written in past tense aspect. They lack any comment on positive or negative “value” of the described temporal period. Most probably they are based on the European tradition of chronicles because the colonial Yucatec chronicles equal their European contemporaries not only in style (very short sentences, little, basic information), but also in form (year by year count or respectively k’atun by k’atun count), and open end. Whereas the k’atun prophecies present a firm set of data sequencing that have to be mentioned (seat of k’atun and the responsible god) and several optional information which are the description of the sky direction, the characteristic plant and animal. The assessment of the time period with regard to ‘good’ versus ‘bad’ seems to be very important. In the end, both text types seem to be very similar in the first instance, but are very different in the second and refer to two different text genre with different meanings.

### 3.2.3 Chronological references

We continue the analysis by studying chronological information. Again, we are looking for continuity and disturbances in the chronological sequencing of events (depending on the individual calendar system). We may come across a thematically logical passage that lacks chronological coherence. This could be a sign of scribal efforts to restructure a thematic sequence in order to achieve comprehension, but without considering the chronological framework. Further on, we may note different stylistic features in the description of dates and temporal information. For illustration we quote several examples from the ‘chronicle’ of Codex Pérez. The quotations are taken from the original Yucatec Maya text displayed in the work of Miram (1988: p. 134, line 9 -
Out of the Historical Darkness

p. 137, line 14). Translations were made by the author of this paper (for comparisons see Craine/Reindorp 1979: 138-140).16

cabil ahau kuchci Chac Nouitan ...

<In the period of k’atun> 2 Ahau [he] arrived at Chac Nouitan ...

lai u katunil cabil ahau u he’exci cab ...

This is the period of k’atun 2 Ahau when they settled in ...

lai año cu ximbal ca ...

This is the year that passed by when ...

Translation by A.G.

The first two examples refer to the time period of k’atun 2 Ahau in the Maya Calendar. The first date only yields the necessary information whereas the second example shows an introductory formulaic expression lai u katunil. The third example refers to a European colonial date and shows an almost poetic text, with the introduction “This is the year that passed by when ... [something happened]”. In this example, different narrative styles can be recognized in a thematically coherent text passage.

Other temporal passages (from the same text passage of Codex Pérez) refer to the elapsed time periods between subsequent events:

hun ppel haab minan ti ho kal haab ...

One year was left [to complete] the period of 5 x 20 years [= 99 years = 5 x 20 – 1 year] ...

cia’exi hun kal haab catac can lahun

Then ended [the period of] 1 x 20 years plus 14 years [= 34 years = 1 x 20 + 14 years] …

[Translation by A.G.]

Further passages of the same text comprise a combination of Maya and European calendar information, for example:

ichil u katunil ho ahau

In [the period of] k’atun 5 Ahau

cia yahhi Padre Mani

there were priests in [the village of] Maní

lai año lae 1550

This was in the year 1550.

[Translation by A.G.]

We can conclude from these examples that in colonial Yucatec Maya there were no standardized forms for calendar data. The examples have to be understood as reflections of individual styles. However, they are taken from a text passage that shows thematic coherence and, that is characterized by introductory and closing remarks. We therefore conclude that the text passage was composed by putting together various elements of different origin. The composer introduced a specific event order and added introductory and closing remarks. However, he refrained from rewriting and unifying the chronological data at hand. He simply copied them.

16 Craine/Reindorp (1979: 138) mention the text with the title “Explanation of the Ages Since They Left the House of Nonoual”.

Translation by A.G.
3.2.4 Analysis of syntax characteristics

Through the analysis of syntax characteristics we look for different narrative forms that give hints as to the various writers that have worked with the document over the centuries. Motivated by previous studies by Smailus (1973) on the Maldonado-Paxbolon-Documents and by Dürr (1987) on the Popol Vuh, which focused on morphological elements, we decided to develop a description of syntactical and semantic characteristics. We oriented our approach towards Ruprecht’s work (1993) on text interpretation, but went beyond that. He looked exclusively at syntax description, but we chose the form of a detailed syntactic and semantic description. Since most of the ethnohistorical sources are written in Amerindian languages, the term syntax refers to semantic units, comprising actor, patient, and verbal expression(s). The syntactic and semantic description conveys the sequence of syntactic elements (actor – verbal expression) as well as tense aspects, active or passive voice, temporal and spatial expressions, etc.

With reference to our considerations, it helps us to:

– differentiate simple syntactic structures 1) from complex syntactic structures 2) and from those with special emphasis 3).

Examples: 1) “X happened in the year.”
2) “X was done in the year xx by Y because of Z.”
3) “It was in the period of xx, when something happened, [which] was X”.

– detect different kinds of conjunctional clauses.

Examples: 4) “X happened because of Y.”
5) “X happened when Y had ...”

– identify the position and the quantity of temporal data within a topic sequence.

Examples: 6) “It was the period of xx, when the month of xx and the sun was ... , after 6 years had passed.”
7) “X happened in the year of the Lord xx”.

Example 6 presents a very detailed chronological description of the date of an event. The event description follows and it is treated as the second information of the phrase. In Example 7, the chronological information follows the event description and is very short.

– perceive the individual use of fillers, grammatical features (for example in Yucatec Maya: the individual use of deictic references) and favorite expressions.

Examples: 8) “It happened – and this is true – when ...”
9) “It happened here, in the year xx when Padre X arrived.”

Of course the examples refer to features we observed in the Books of Chilam Balam. Documents written in other languages may provide different features.
3.2.5 Rhetoric features

The syntactic and semantic description also helped us to detect rhetoric features in the texts such as couplet and triplet-forms, allusions, metaphors, allegories, repetition as a rhetoric element, syntactic and semantic parallelisms, and the use of active and passive voice within a text passage.

Example for semantic repetition with syntactic parallelism:

10) X was captured because of …
11) X was destroyed because of …
12) X was desolated.

Another example displays a triplet-form with allegoric function.

Example from the Chilam Balam of Chumayel, Chronicle No. 3:

... binciob Ah Itzaob yalan che, yalan aban, yalan ak.
... the Itza people went underneath the trees, underneath the bushes, underneath the grass.

[Translation by A.G.]

This is a very famous allegoric expression which is still common language today. It describes quite lively the situation of homeless people. Because, when people were driven out of their villages (after war and destruction), they used to live and hide in unsettled areas, in the wild forests. “Underneath the trees, underneath the bushes, underneath the grass” refers three times with different ‘pictures’ to the same situation and thus, forms a triplet.

3.2.6 Language

Special attention has to be given to loanwords, colloquial or elaborated language, word fragmentations, and the use of anachronistic expressions, etc., because these may be of importance in combination with others to complete the picture of the writer, and the date and circumstances of manuscript composition. We want to give some examples to illustrate our considerations. The occurrence of Spanish or Latin loanwords in a text on pre-colonial events indicates a colonial date of origin or at least the revision of an older text by a writer who did not know the original indigenous terms (e.g. elite or administrative titles for pre-colonial offices that were out of use). In the Books of Chilam Balam we found several text passages where colonial authors obviously tried to invent a text of pre-colonial origin, but used colonial references (e.g. Spanish place names for Yucatec Maya settlements) and concepts (e.g. land boundaries that developed in the colonial period). We can also observe a writer’s intention to avoid Spanish terms (e.g. Spanish colonial titles) in order to achieve a purist language style.
Colloquial language, expressed by syncopes, fragmented words, and corrupt writings of loanwords or foreign names (e.g. biblical names), alludes to the circumstances of manuscript composition and used sources. The writer may have used only oral sources and thus, wrote those unknown words the way he understood them, using colloquial language. He even may have had the order to write down oral accounts and took notes while listening. In comparison, we understand the use of elaborate language as an indicator of access to broader education, books, and writings. It could, however, simply mean that the scribe had enough time to work on the manuscript.

In some cases, it might also be possible to differentiate the date of text production by specific language phenomena which occur through the contact of different languages over several generations (see for example the study of Frances Karttunen, published in 1985, on Aztec-Spanish-contact phenomena in the early and late colonial periods).

### 3.2.7 Types of handwriting

When working with manuscripts, one of the first tasks is to look at the handwriting types.

On the one hand, we have made the observation that a single handwriting type in one document does not imply in every case that the manuscript was composed by only one person. It means that the manuscript at hand in its final stage was copied by one person, who may have reworked older documents. On the other hand, it must be clearly differentiated whether different handwriting types characterize major parts of the whole manuscript or only minor supplementary entries. Several Books of Chilam Balam contain short entries of autobiographic character in different handwriting styles. They refer to private events such as the birth or baptism of children. These minor entries seem to refer to the people that owned the documents in later times. They were probably neither the composers nor the authors.

In some cases, it may be worthwhile to compare the specific handwriting of a text with the official handwriting styles of the time, in order to obtain a chronological reference. However, this depends on language and context. With respect to the Yucatec Maya area, Restall stated that there was a huge difference between sixteenth- and late-eighteenth-century Spanish handwriting, whereas Maya hands exhibit so little change over these centuries that differences are inseparable from notary-to-notary and cah-to-cah-variations (Restall 1997: 239).

Thus, in our case, a study of these aspects did not seem appropriate but may be worthwhile in other cases.
3.2.8 Marginal items of personal style and preferences

In the following, we will list several minor items that came to our attention while studying the Books of Chilam Balam. By comparing the three Books from the villages Chumayel, Tizimín, and Maní (so called Codex Pérez), we recognized specific individual preferences for punctuation, page layout, and the inclusion of drawings. The scribe of the Chilam Balam of Chumayel preferred to structure every single text by using punctuation, whereas this was of no importance to the writer of the Chilam Balam of Tizimín. Since there were no fixed rules for punctuation, this is clearly a marker for individual style and helps to differentiate personal styles in one manuscript (amongst other characteristic items, see section 3.3).

Similar observations have been made for page layout. The scribe of the Chumayel worked carefully on each page, marking headlines, paragraphs, and text endings. Further on, the scribe included drawings to illustrate calendar texts, mentioning the original author of the drawing that he obviously copied from another document. The text on original page 27 accompanying two drawings of a sun eclipse states: *chicul tumen D.\Licil* = “drawing by Don S. Licil”.

Based on this data, we finally detected different ways of dealing with drawings. In some cases, the Chumayel scribe added information next to the drawing, whereas in other cases the information was included in the text surrounding the drawing. We draw the conclusion that he copied texts with drawings from other documents and added marginal notes in cases where he thought additional information would be necessary for the reader’s comprehension of the text. In other instances, it seems that he wrote the text on his own and thus, he could include the necessary information directly within the text.

3.2.9 Identification of scribal profiles

A further and major step towards the identification of scribal profiles was made by comparing the individual styles in the description of dates. We already mentioned the importance of chronological data when we described the study of thematic and chronological coherence. These previous examinations affected mainly descriptions of pre-colonial events which refer to the Maya calendar system. By the comparison of temporal descriptions for events in the colonial period, again we recognized high individuality. Below we present several examples of scribal profiles, numbered Type IV, occurring in the Chilam Balam of Chumayel (numbers in the left column refer to page and line number in the original document in accordance with the transcription of the Books of Chilam Balam by Miram 1988):

64,5  *Do 1669 anos* uchci xusan kak …  [In the] year of the Lord 1669 …
64,6-7  *Do 1692 ano* ti culhi lahun pis katun …  [In the] year of the Lord 1692 …
76,28  *Tu habil do 1513 anos* …  in the year of the Lord 1513 …
77,3  *Tu habil do 1546 anos* …  in the year of the Lord 1546 …
The description of dates with the Latin term ‘do’ for ‘domini’ is unique in the Books of Chilam Balam, because it only occurs in the Chilam Balam of Chumayel. This kind of year description occurs with local village events for the period between 1648 and 1692. It also appears with references to the first Spanish-Maya contact and the subsequent conquest of the Yucatec Maya (1513-1546). We concluded that those short entries of the second half of the 17th century are of autobiographic character and refer to the lifetime of the writer who looked retrospectively on the conquest in a lamenting voice. Further on, we detected that autobiographic notes like these show up in each book, but in very individual forms (dates, events, temporal descriptions). We concluded that individual date descriptions are a first indicator of scribal profiles, referring also to the time of their activity. Our conclusion is based on the assumption that, even if there are no normative regulations for the description of dates, the individual writer decides on one personal form of description and accepts only minor changes over time.

When we listed those autobiographic data and singular entries in chronological order, we found clear patterns. Similar or identical date descriptions could be grouped into different types. The first and last entry of each type is in accordance with normal life expectancy of a person. Thus, we concluded that each ‘type’ referred to the period of activity of a writer. As far as possible, we examined those autobiographic entries with respect to the following points:

– typical elements of data description,
– characteristics of syntax and, in our case, especially, verbal expressions,\(^{17}\)
– use of fillers and of favorite words and expressions.

In some cases, these criteria helped us to profile specific writing styles, which we could compare with comments, lamentations, and further personal references. We finally looked for those profiles throughout all the manuscripts. In the end, it was possible to assign entire texts to individual writer profiles, and to date different stages of manuscript compilation and revision.

3.2.10 Identification of sources

For many years scholarly discussion revolved around the idea, hieroglyphic inscriptions (bark paper books like the Codex Dresden or Codex Madrid) or orally transmit-
ted cultural and calendrical knowledge could have been the primary source of the first compilation of the Books of Chilam Balam. We also tried to answer this question by looking at specific inherent references in the manuscripts. Previous research on this topic was done by Bricker (1989: 39-50), Lounsbury (1990: 289-301) and Bolles (1998: 26-53). They focused on specific characteristics of hieroglyphic inscriptions and their possible traces in colonial documents. Because of the syllabic character of hieroglyphic writing, Bricker studied word fragmentation and extensions in selected passages of the Chilam Balam of Chumayel, which she put down as the transmission of hieroglyphic inscriptions into European writing. Lounsbury compared the calculation of distance numbers in the Books of Chilam Balam with calendric passages of hieroglyphic inscriptions from the Maya city of Copan (which reached its cultural and political peak in the Maya Classic period). In his opinion the arithmetic similarities clearly proved the pre-colonial hieroglyphic origin of the Books. Finally Bolles analyzed the occurrence of the Yucatec Maya term *uooh*, which is translated as “hieroglyph” and as “letter” in the Books. Since the term *uooh* also occurs in the Yucatec Maya version of the Spanish story of Doncella Theodora – where it clearly refers to the meaning of “European letter” – this term alone is too vague to indicate hieroglyphic origin. In sum, the mentioned studies focused on selected partial characteristics and thus could not result in a comprehensive conclusion. In our own study, we decided to look for transmission models and – once more – their characteristic features.

The first part concerned possible ways of data transmission. Looking at those texts whose origin we know, the following observations can be made. In fact, the Books of Chilam Balam contain accounts that originated in the oral tradition and finally found a written form (e.g. The story of Don Antonio Martinez). However, almanacs were copied directly from the Spanish book into a written Yucatec Maya version and received a cultural adaptation. We also discovered the transmission of a written Spanish text into a vernacular Yucatec Maya form, which was finally written down, e.g. the already mentioned ‘Story of Doncella Theodora’. This story, which originally belonged to the collection of ‘Thousand and One Nights’ of Arabic origin was famous in Spain and found its way into year books, those ‘Reportorios de los Tiempos’, which were sold in huge quantities in the American colonies (Parker 1996; Leonhard 1992; Kropfinger-von Kügelgen 1973). The story was widely used in sermons and in that way must have found its entrance into Yucatec Maya society. Transmitted orally, the story was adapted to Yucatec Maya culture and with its new content, finally written down again. We concluded that there must have been three different ways of transmission:

- oral to written,
- written to written form,
- written to oral and then again back to written form.
Thus, three different types of sources seemed to be possible for the Books of Chilam Balam: vernacular knowledge, hieroglyphic inscriptions, and vernacular knowledge that originated in hieroglyphic inscriptions. These conclusions were supported by direct and indirect references to sources in the texts. Scribes made direct references, by mentioning an author’s name or referring concisely to the manuscript at hand. They made indirect references by describing the manuscript at hand (by writing “as it is written in our ancestors’ books”) or the source of information (by writing “as it was told”). The third and major part of our source analysis consisted of distinguishing inherent textual characteristics of oral and written sources. Based on the works of Parry (1928; 1930), Finnegan (1977; 1992), Vansina (1985), Goody (1987) and Ong (1987), we looked for characteristic features of oral tradition, which can be summarized as follows:

- The report or account focuses on one person or one group as ‘hero’, which is named by name; other persons are not described individually and do not act as ‘main players’.
- Temporal data are contradictory.
- Events are not mentioned in chronological order, but grouped in accordance with thematic similarities or a common frame.
- The same event is described from different perspectives.
- Episodes are loosely arranged in sequence.
- Different spellings occur for names of persons and places (of pre-colonial origin).
- Verbal expressions and narrative style differ (e.g. once it says “they built the city of X” and in another description of the same event it says “the city of X was built/constructed by ...”).

Classical Maya hieroglyphic inscriptions from stone monuments, ceramics, wooden and bone artifacts, mural paintings (and others), show a much stricter and monotonous appearance with reference to syntax forms (date – verbal expression – actor), grammatical features (intransitive verbs or passive voice, imperfect), persons acting (3rd person singular), and memorized topics (mainly topics of royal life, war, and ritual). We listed the characteristics of both sources and searched in selected book passages for them. At the end, both types of sources left their traces in the colonial documents. However, traces of vernacular tradition of pre-colonial data predominate.

With these three steps to analyze inherent characteristics of manuscript sources, we complete our ‘toolkit of analytical instruments’. Further aspects, considered as marginal or already studied, are not discussed here. Those are: studying the paper, ink, and watermarks, multiple use of paper, the further treatment of the manuscript after its

---

18 This is a very brief description. For a broader description see Gunsenheimer (2002: 268-283) and introductions to Classic Maya history, e.g. Martin/Grube (2000).
discovery, and to number the pages or bind loose ones. In most of the cases these questions were already answered with first transcriptions and translations and do not need to be discussed further here.

3.3 Use and combination of instruments

Our idea is to go through a document and use these analytical instruments in order to make observations on inherent textual characteristics that one would not observe by simply reading the text. In our introduction to this chapter, we claimed that the presented instruments only have restricted meaning if we look at each on its one. It is the combination of language aspects and thematic, formulaic, chronological, syntactic, semantic, rhetoric and linguistic features that forms patterns and enables us to recognize individual scribal profiles, text genres, sources, and text revisions. Table 5 shows how the different analytical components are combined.

In order to evaluate the analytical components, we have to answer the following questions:

1. How do we recognize scribal profiles and how do we distinguish them from literary genres?
2. How do we evaluate the meaningfulness of each component?
3. How do we recognize different stages of compilation?

<table>
<thead>
<tr>
<th>Analysis of:</th>
<th>Reference to:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Type of source</td>
</tr>
<tr>
<td>Thematic coherence</td>
<td>X</td>
</tr>
<tr>
<td>Semantic coherence</td>
<td></td>
</tr>
<tr>
<td>Formulaic expressions</td>
<td>X</td>
</tr>
<tr>
<td>Chronological references</td>
<td>X</td>
</tr>
<tr>
<td>Syntactic (narrative) forms</td>
<td>X</td>
</tr>
<tr>
<td>Rhetoric features</td>
<td>X</td>
</tr>
<tr>
<td>Language</td>
<td>X</td>
</tr>
<tr>
<td>Handwriting</td>
<td></td>
</tr>
<tr>
<td>Punctuation</td>
<td></td>
</tr>
<tr>
<td>Drawings and page making</td>
<td></td>
</tr>
</tbody>
</table>

Table 5: Meaning of analytical components in combination

Answer to Question 1: How do we recognize scribal profiles and how do we distinguish them from literary genres?

The individual style of an author or composer does not only consist of several elements showing up here and there. The individual style consists of the combination of
elements that occur again and again in the same combination. As a consequence, we recognize an individual style by observing the occurrence of the same components again and again in longer text passages, or different genres of texts, or when they occur in a fixed combination in different parts of a manuscript (e.g. in individual closing remarks or exclamations, laments). On the basis of temporal expressions we can date the chronological frame within which this scribal type was active. This provides a reference to the period of manuscript compilation and/or revision. If the sequence of components is interrupted, we speak of a break (or: caesura), caused by another composer working at a later stage with the manuscript. If we observe the same set of components in several manuscripts in similar text types (by semantic and syntactic structure) with similar topics, we conclude that those form the characteristic traits of a literary genre. To distinguish individual scribal types from literary genre types, we have to look at the frequency of appearance of those characteristic elements and their contexts.

Answer to Question 2: How do we evaluate the meaningfulness of each component? The analytical components themselves differ in how meaningful they are. Syntactical characteristics or temporal expressions have more meaning with respect to stylistic features than the use of deictic references at the end of a semantic unit. It is the linguistic, cultural, and historical context that gives more or less meaning to the different components. This means that it has to be considered differently in each case.

Answer to Question 3: How do we recognize different stages of compilation? We suppose that each composer – while working on the revision of the manuscript – aimed at achieving a unified appearance of the document. If the writer works with different texts at hand, he will try to unify them by adding to each individual text formulaic or explanatory introductory and closing remarks. He may also try to relate the different kinds of texts by introducing remarks and annotations. Narrative forms and rhetoric features, which appear all over the manuscript, refer us to the composer of the final revision stage. If they appear only in specific, but coherent text passages, they refer to the efforts of a previous composer. To illustrate the meaningfulness of combined analytical components, we will present the results of our study on the prehistory of the Books of Chilam Balam in the following section.

4. Results of the analysis of the Books of Chilam Balam using the analytical toolkit

We focused our research on the manuscript history of three Books of Chilam Balam (those from the villages of Chumayel, Tizimín and Maní) with reference to the period between their first and their last compilation (approximately 1550-1850). We wanted to know if, when, and how manuscript revisions took place. Choosing three Books that show similar contents, we were in the favorable position of being able to compare different versions of the same types of texts. In the end, this helped us to explain how
colonial scribes worked with inherited documents. We want to summarize our results briefly:

Autochthonous prophetic text genre (probably from an old hieroglyphic codex) and fragments of orally transmitted accounts formed

**Archetype A**
(compiled after 1540)

which later was enlarged to form

**Archetype B**
(at about 1590).

Archetype B was most probably the model for the Chilam Balam of Tizimín, which was revised at about 1630 by two scribes. It received its final revision and form between 1750 and 1760. It may have been copied once more later, but was not revised. In comparison, the Tizimín manuscript yields only minor changes in content and form. It is an almost exact copy of Archetype B. The Tizimín manuscript does not only show minor changes, but also – as already mentioned – the least care in terms of writing and composition. The scribe did not care about titles, page making, or punctuation. The flow of the language is characterized by hazardous writing and the use of colloquial language. We draw the conclusion that this manuscript is in fact a copy of an older manuscript that existed at that time, and which was ordered by someone. The features could also indicate that the manuscript was the product of dictation. Further on, the Tizimín document is the only one that does not yield a single entry referring to a personal name of a scribe or to its origin in the village of Tizimín. The two others do have clear references to the village of their origin, such as “here in Maní” or “here in Chumayel”. Such a reference occurs in the Tizimín manuscript only with regard to Sotuta. Therefore, we have to ask if the Tizimín manuscript really originated in Tizimín. The official document history only states that the manuscript was handed over to Bishop Crescencio Carillo y Ancona by the parish priest of Tizimín (Barrera-Vásquez/Morley 1949). Based on our observations, we suppose that its origin is in the region of Sotuta.

The Chilam Balam of Chumayel belongs through its combination of text genres and chronological references to Archetype A (after 1540). It was revised between 1648 and 1692. It received its present form and content between 1766 and 1781, through Don Juan Josef Hoil, *cazique* of Chumayel at the end of the 18th century. Not only did he copy the manuscript, but he also revised it completely by focusing all historical reports on the group of the Itzá. He also made them agents of prophecies. Additionally, he revised the chronological framework of pre-colonial events so as to give them a charismatic meaning. Thus, the manuscript can be understood as his own individual creation, which he most carefully arranged, supplemented and illustrated. It is
the only one of all three analyzed manuscripts that shows a coherent thematic structure. Because of these observations, we conclude that Don Juan Josef Hoil did not only revise older texts, but also selected them from a broader scope of sources that were at his disposition.

For Codex Pérez or rather, the part of the Chilam Balam of Maní, which is included in it, we place its origin in Archetype B (1590). The copy of Archetype B at Maní was constantly extended by further texts in the following centuries. By 1689 a text extension was made by Diego Chi, a villager of Maní. Further extensions probably occurred in 1695, between 1755 and 1770, between 1756 and 1759, and around 1793. Because of the artificial composition of Codex Pérez in 1837 (see Section 2) it is not possible to reconstruct the original content and structure of it. It is remarkable that this text collection contains many comments reminding us of pupils and teachers. These comments are annotations to calendric descriptions, which allude in an individual and personal way to the necessity to learn and to comprehend the old calendar system. At the same time, the authors of these annotations excuse themselves for having made errors.

5. Transferability to Other Ethnohistorical Anonymous Sources

Our presentation has focused on the analysis of thematic, formulaic, chronological, syntactic, semantic, rhetoric, linguistic and individual features in anonymous documents, with the goal of reconstructing their documentary history and grasping individual profiles of the scribes and their personality. We presented the components of our methodological approach and illustrated their use in the study of three Books of Chilam Balam. Our results led to an improved comprehension of the colonial history of these colonial Yucatec Maya manuscripts. We are now able to explain the individual development of each manuscript and also, for example, contradictory statements in the description of pre-colonial Yucatec Maya historical events. Our approach is rooted in the critical literary text analysis, which has been developed for the study of the Bible. We believe that we went beyond that approach by presenting a step-by-step method, accompanied by a referential framework for the interpretation of observations. In the beginning we presented our analytical components as instruments of a toolkit which should be generally useful in studying anonymous sources in general, independent of language, culture, and epoch. At the end, we claim that this methodological approach can be applied to any anonymous document. Although the analytical instruments have been developed specifically for Yucatec Maya colonial manuscripts, they can be easily transferred to other sources. Of course language, cultural and historical contexts have to be included in the analysis, since they shape characteristic expressions. We may have to take into account that not all components fit in the same way. For example, it will not be necessary to ask for traces of hieroglyphic inscriptions, but it will always be necessary to analyze sources. Our analysis of scribal pro-
files was to a large extent based on individual chronological expressions. This may not be the case in other circumstances. However, even if documents do not consist of such remarkable traits, it should be possible to distinguish scribal profiles by rhetoric, semantic, syntactical, and individual formulaic features. It may be criticized that our approach is quite intensive, because it requires a very detailed analysis of each component. No doubt, this type of analysis, conducted step by step, cannot be performed very quickly. However, in case of having the options of either to obtain a quick superficial summary of first observations by simply reading the manuscript, or to conduct a very detailed study through the translation of the entire text, this approach is a good alternative. It should be noted that this approach provides first conclusions at a very early stage and thus allows the researcher to decide whether it is worthwhile to continue or to stop further analysis. Because, already by the first analytical step - when one looks at the thematic and semantic structure of the manuscript - coherent and incoherent passages can be differentiated. The more coherence the document shows, the less ‘dramatic’ is its history, which means there have only been minor revisions or none at all. In the latter case, the researcher would only look for thematic, temporal and individual features, characterizing the purpose of the document, the time of creation and the personality of the author. If the first analytical step reveals many incoherent passages, the manuscript history is most probably characterized by different epochs of revision and change. In that case, it would be the next step to select one or two passages and to use the analytical toolkit in order to test their meaningfulness. Based on the comprehension of the analytical instruments, it will be possible at that early stage to decide, whether the continuation of the study will be successful. Especially, if incoherent passages are more prominent, they can be easily examined individually and compared to the overall appearance of the document in order to reveal hidden elements in the text, which can provide an understanding of its ‘crude’ appearance.

In our opinion, the set of analytical instruments can also be of help when clarifying the disputed authorship or the identification of indigenous text genres. It is not necessary to examine every passage of the manuscript. It would be sufficient to select text passages that offer very rich features. For a reasonable selection of those passages, it is necessary to conduct a first study of the thematic coherence (see our step 1) and to look for formulaic, chronological, and biographic characteristics. Further analytical steps will then only be carried out on those selected text passages. Results of these detailed studies will be the basis of a development model and of description(s) of scribal profiles. Spot checks have to be performed with other text passages to test and verify the model and profiles.

Our approach is therefore useful in answering questions of manuscript creation and the identification of scribes, their intention, and the function of the document at the time of its creation. It can contribute to uncover the hidden history, to go beyond the known circumstances, and to discover new insights in order to illuminate the past.
References

Anales de Tlatelolco, see Klaus, Susanne (1999).


Calepino de Motul [dictionary], see Arzápalo Marín, Ramón (ed.) (1995).


Li, Andrés de, see Delbrugge, Laura (1999).


Miram, Helga Maria/Bricker, Victoria Reifler (1996): “Relating Time to Space: The Maya Calendar Compasses”. In: Robertson, Merle Greene/Macri, Martha J./McHargue, Jan (eds.): *Eighth Palenque Round Table 1993*. San Francisco: The Pre-Columbian Art Research Institute, pp. 393-402.


*Relaciones histórico-geográficas de la Gobernación de Yucatán* [1579-1581], see Garza, Mercedes de la/Izquierdo, Ana Luisa (eds.) (1983).


