Noctua literaria - A Computer-Aided Approach for the Formal Description of Literary Characters Using an Ontology

Dissertation zur Erlangung des Grades eines Doktors (Dr.phil.)

der Fakultät für Linguistik und Literaturwissenschaft der Universität Bielefeld

vorgelegt von

Amélie Zöllner-Weber
Abdruck der genehmigten Dissertation zur Erlangung des akademischen Grades Doktor philosophiae (Dr. phil.).

Gutachter:
 Prof. Dr. Werner Kummer, Universität Bielefeld
 Assoc. Prof. Dr. Daniel Apollon, Universität Bergen, Norwegen
 Dr. Andreas Witt, Universität Tübingen

Prüfungsausschuss:
 Prof. Dr. Werner Kummer, Universität Bielefeld
 Assoc. Prof. Dr. Daniel Apollon, Universität Bergen, Norwegen
 Dr. Andreas Witt, Universität Tübingen
 Dr. Hans-Jürgen Eikmeyer, Universität Bielefeld

Gedruckt auf alterungsbeständigem Papier nach ISO 9706
Acknowledgement

I want to thank Daniel Apollon for his supervision. Furthermore, I want to thank all my German and Norwegian colleagues who helped me and discussed my approach. In addition, I thank Sarah Messina for testing my system. I also thank Nils Hofemann, Claus Huitfeldt, Vemund Olstad, Deirdre Smith, and Luis Villarejo improving my English and supporting the written part of my work with helpful comments.

Special thanks go to my family and to Frank who always supported my work altruistically.
Chapter 1
Introduction

“The only advice, indeed, that one person can give another about reading is to take no advice, to follow your own instincts, to use your own reason, to come to your own conclusions. [...] To admit authorities, however heavily furred and gowned, into our libraries and let them tell us how to read, what to read, what value to place upon what we read, is to destroy the spirit of freedom which is the breath of those sanctuaries. Everywhere else we may be bound by laws and conventions - there we have none.” (Virginia Woolf, “How Should One Read a Book?”, 1932)

Literary characters are just as old as the stories they appear in. They form the active part of narration and are important to drive the plot further. Often, characters are remembered longer than the story they belong to. One can assume that many readers are fascinated, maybe even inspired by them. Several characters, or parts of them, survived centuries and were transported from oral tales to written stories. Thus, characters like the Knights of the Round Table, Doctor Faustus or creatures of fairy tales still appear in current stories or film productions.

Even though readers or an audience of a theatre could remember single characters and they are able to give statements about characters, it seems to be difficult to extract the manifestation of a character. A literary character seems to be a living person, but without an author and a reader it would not exist. On stage, actors can represent characters and by using gestures and facial expression, they can communicate an image of characters. But an actor stays a person, even if (s)he goes home after a performance. A character of a drama vanishes, if it is not represented or imagined by someone. Even though literary characters seem to be an elusive phenomenon, authors, readers, or an audience can give descriptions of them. So, what is a character and how could it be described? Furthermore, another problem belonging to characters and literature, i.e. varying interpretations of them, is closely connected to the description of characters. Opinions about characters can be so multitudinous and different as the number of readers of a story. Descriptions and interpretations of characters are so various, because human imaginations are rather different, depending on individual preferences, social background, and culture. In literary texts, coded language, images or symbols are often used to express meaning. This nature provides or maybe seems to provoke interpretations which

---

1see also Jannidis 2006, chapter 6.4., for example, a well-known inspiration is the “Werther-Effekt”. There, people who may strongly be influenced by literary characters might attempt to suicide like the main character Werther in Johann Wolfgang Goethe’s novel “Die Leiden des jungen Werther”. This effect is not clearly proved, but one can assume that characters in fiction can impress reader in different ways.
can differ: one can state that interpretations can only become wrong if they are not anchored in the literary text. However, people could claim that there is only one correct intention and this is the opinion of the author of a text. But many stories are read whose authors are already dead or unknown. Also, reading would be rather boring if only a single scheme can be used to describe and interpret. This opinion can also be emphasised by the quote of Virginia Woolf mentioned above. Why should an opinion of a reader be incorrect that differs from other readers or from the author? Even though interpretations can differ, similarities in the description of characters can also be found depending on the material of a text, which guides readers to the same conclusions.

The description and classification of literary characters is often subject of research in literature studies. The approaches show different aspects of characters and present numerous views on the phenomenon of a character. Because of the complex construction of characters, different aspects are highlighted from several foci. In the 20th century, an increased work on this phenomenon can be observed. From this point, the classification of characters is often a main goal in research. In some approaches, literary characters are divided in more complex or simple ones according to their features. But a clear distinction between characters and human beings is still not always achieved. This causes the problem that, as mentioned above, characters appear in fiction and in the human mind, but not in reality. However, the work on the classification of characters is ongoing in several directions. For example, it is tried to enlarge the above mentioned categories (simple and complex) by a granulation of the description. There are also some approaches, which focus on typical or stereotypical features of characters and their representation in fiction. In later approaches, researchers focus on the roles of characters concerning the plot. There, character constellations and character roles dominate. These approaches help to observe functionalities of characters during the plot but separate analysis of single characters are not possible by such a view on characters. Other approaches try to analyse characters according to the genres they appear in, for instance dramas or novels. But one still has the impression that the “genre view” only covers some aspects of literary characters. In addition, the difference between real persons and characters is still not clarified. Characters are still “the personage” appearing in fiction.

Maybe influenced by other approaches in literature studies, like narratology, or other disciplines apart from literature studies, new aspects are added to the analysis of characters. In newer approaches, the complexity of activities by characters and their features is put in focus. Furthermore, the different levels, – the communication between characters, narrator and reader/ audience –, are observed so that information about characters given in a text can be ranked. Nevertheless, still in such approaches general and commonly valid classifications of characters are sought. A new turn occurs by more cognitive-oriented approaches, which attach

---

2 For example Forster 1974
3 Even though newer approaches, e.g. Nieragden 1995, are developed further, characters are sometimes still treated as real human beings.
4 see Fishelov 1990
5 Amossy 1984
6 for instance Propp 1968 and Greimas 1971
7 see Pfister 1977, Ludwig 1982
8 see Lotman 1972
9 see Nieragden 1995
the process of reading and reception to the analysis of characters. Here, the treatment of characters differs from the analysis of human beings. Characters are not anymore just the persons in fiction, but a complex of letters and sense in a reader’s mind. These approaches present a perspective on literary characters, which is also emphasised in Woolf’s quotation. They are not completely empirical-oriented, but they point out the individual reception of characters by the readers.

In summary, one can say that approaches are often restricted on special perspectives on characters so that a general description is often not possible. Other approaches try to reduce the phenomenon of characters on abstract conceptions, like roles in a plot, but it seems to be difficult to prove them on literature. More cognitive-oriented approaches show the complex process of the literary reception, but they do not provide categories for a classification of character features and actions. It seems that the analysis, – which is often guided by other research trends or schools –, and discussion about literary characters spans a wide research field in which a consensus description for characters is not decided yet. For this reason, it is important to discuss the description of characters and to have an exchange of different opinions.

In the scope of this thesis, the description of literary characters should be developed further. Therefore, already developed categories and descriptions of the mentioned approaches are adopted, combined and integrated into a system (cf. chapter 4.1). On the one hand, this system should be flexible to include individual aspects. On the other hand, it should provide a general basis of consistent descriptions to support comparisons. By this, several aspects important for a more elaborated description of literary characters, (i) the evanescence of characters, e.g. characters exist only in a reader’s mind, (ii) multiplicity of interpretation, and (iii) therefore, in addition general categories for a comparison of characters could be realised in combination. It is not intended to develop a completely new theory of categorisation, but to provide a more common, formal description of literary characters. Moreover, the support of a discussion and the exchange between researchers or other interested people is one important aim. Digital media, like the Internet with its large possibilities and accessibility, seem to offer a good starting point for such discussion. Especially after the introduction of the Internet, formats and standards are developed which allow semantic as well as a structural access to multi-modal information (e.g. information on different levels) and complex information like the description of literary characters. There are powerful description schemes and languages, which have been developed for purposes of expression and exchange. Consequently, these technologies are exploited for a description of literary characters.

By using digital media and techniques, a wide range of possibilities, e.g. visualisations, processing of this kind of data, can be made available. Therefore, it is a good opportunity to enrich and explore the possibilities of these techniques for such an approach. This means that the description of literary characters could be supported by a computer-aided approach. Such an approach can be subsumed in a field called Digital Humanities where various traditional as well as novel approaches to the study of cultural products are supported by computational methods and applications. Often, it is aimed at modelling and representing textual data by utilising mark-up languages. As mentioned above, description and formalism schemes and languages, which can model and represent such an approach, should be incorporated. After

\[for example Schneider 2000 and Jannidis 2005\]
examining different computer-based methods to deal with literary characters, in this work, an ontology has been chosen to model the representation of literary characters. In philosophy, the term “ontology” is used to describe and classify the existence of things in the world. In artificial intelligence (AI), this term was adopted and restricted to modelling concepts of the real world in computer systems. Gruber gives a common definition: “An ontology is a formal, explicit specification of a shared conceptualisation.”

Another important aim which should support the discussion, but which should also lead to new perspectives on literary characters, is the modelling of theories for literary characters and their representation. By developing an ontology for literary characters, it is possible to describe them formally, to search for and to compare them. In this thesis, these tasks are realised in several partly own developed applications based on the ontology. For this approach, as mentioned, it is also important to develop a platform which offers different options, like descriptions of characters, general overviews of selected items as well as comparisons of characters or special aspects. Although, by adopting categories for the description from theories in literature studies, a common basis is created, individual forms of descriptions and interpretations are possible by adding (more special) categories by readers. Thus, comparisons of different views of the same character can be made available. Apart from applications in research, authors could describe and structure new developed characters by using this system.

This thesis presents an interdisciplinary approach combining topics from literature studies (theories of character analysis) and computer science (modelling using an ontology). By introducing an ontology, which can enrich research in literature studies and can lead to new and individual perspectives on literary characters, the discussion of description and classification of features and actions of literary characters can be supported and developed further. By supporting the comprehension of characters, a more creative or productive view on literature and literary characters may be provided.

Aims:

Summarising the stated problems and tasks of this approach, it is intended:

- to model theories for a description/representation of literary characters
- to use therefore a computer-aided approach, especially an ontology
- to develop a platform for the discussion of the description and representation of literary characters
- to concentrate on the support of human users
- to explore different applications for a computer-aided approach in literature studies
- to gain new aspects for literature studies, especially literary characters
- to analyse exemplarily the development of literary characters (devil characters in Faust literature) using the proposed ontology

It is not intended:

---

11 Gruber 1992, p.199
12 Creative/ productive does not mean that something completely new is created, but individual representations should be supported.
• to develop a completely computational (and automatic) approach
• to develop a completely empirical approach

1.1 Digital Humanities

In recent years, a new field arose combining the structuring potential of computational applications with central research themes in the humanities. In the following, a short survey of this new research field is given so that the subject of this thesis might be situated in its proper context.

When attempting to define this new hybrid field of research, one might struggle with computing terminologies used by researchers, e.g. “Humanities Computing”, “Computing in the Humanities”, or “Digital Humanities”. Especially the last term is used by the world’s largest community in this field, the Alliance of Digital Humanities Organizations (ADHO), which is interested in “computer-aided research” in humanities like literature and language studies, history as well as philosophy.1314 But this only gives general information about the types of activities, which belong to this steadily expanding field.

In addition, one is faced with the problem that depending on national traditions and developments, humanities can subsume different disciplines. Subjects like science of history, literature studies, and philosophy are commonly identified as parts of the humanities. Although in subjects like musicology or archaeology, researchers also work on cultural objects, these disciplines might not always be integrated in the humanities due to different definitions of humanities. For this reason, also Digital Humanities comprises a manifold research field.

By introducing computational methods and techniques in the humanities, connections to other disciplines appear. For example, Jannidis points out that in computational linguistics, several research methods and problem solving methods can also be applied to the humanities.15 In computational linguistics, it is tried to use more and more quantitative methods or (semi-) automatic applications so that these works sometimes come into reach of more “precise” research fields like in natural science and life science. But also in linguistics, many less “precise” methods and non-automated, manual works are still applied. Other possible intervening are e.g. computer science, parts of artificial intelligence, mathematics or even maybe physics, because they all use methods, which can be adapted to Digital Humanities. It seems that disciplines get more and more integrated, although their view on subjects of research may not be fully consistent.

In this contribution, in later chapters, efforts will be made to shed light on methods which do not originate from literature studies, but from some other, above mentioned, disciplines to reach the goal of a computer-aided approach for the description of literary characters. But one should note that researchers working in the field of the humanities could not always transfer directly methods from computational linguistics or other disciplines because they are mostly

13 for further details see http://digitalhumanities.org/ (last accessed October 30, 2007)
14 The latest term will also be used in the thesis to refer to this research field.
15 Jannidis 1999, p. 40
faced with problems like modelling semantics. In contrary to linguistics, where semantics are just one part of research, the main task when describing literary characters is to model semantics.

Because of the wide range of research goals in the Digital Humanities, in the following, the author wants to outline a brief presentation of the history of this field and different institutes working on Digital Humanities, without claiming to give a complete description. In addition, the subcategory Computer Philology, which works on literature and is important for the thesis, is presented.\textsuperscript{16} Thereby, different activities and projects are outlined to demonstrate what kinds of research can be performed.

One can state that in contrast to other disciplines, the introduction of computational methods in the humanities occurred rather late. Fotis Jannidis mentions Roberto Busa’s work of computational research for linguistic and literary analysis, especially his computer supported approach “Index Thomisticus” which started in 1949.\textsuperscript{17} But analysis and interpretation in a “classical way” with pen and paper were commonly preferred. Sometimes one has the impression that, still today, computational work is avoided.\textsuperscript{18} But nevertheless, a wide scale of projects in different fields of the humanities are founded so that computational methods can find their way in these fields.

Some research centres in the field of Digital Humanities which work on challenging projects, are the “Centre for Computing in the Humanities” located at the King’s College, London, “Humanities Computing Unit” in Oxford, “Humanities Advanced Technologies, and Information Institute” of Glasgow.\textsuperscript{19} Furthermore, “Aksis” (Avdeling for kultur, språk og informasjonsteknologi) in Bergen, Norway as well as ICN (The Interdisciplinary Center for Narratology) at the University of Hamburg,\textsuperscript{20} “Berlin-Brandenburgische Akademie der Wissenschaften” and “Historisch-Kulturwissenschaftliche Informationsverarbeitung” at the University of Cologne.

Beginning with the first mentioned institutions, the British centres work mainly on digital text editions. Many British researchers of these institutions are deeply involved in the support of publishing academic research and forming centres of communication in Digital Humanities.

At Aksis and the Berlin-Brandenburgische Akademie der Wissenschaften, different computer supported projects are located. Research projects at Aksis especially have focused on digital editions of the philosophical work of Wittgenstein and the complete edition of Henrik Ibsen.\textsuperscript{21} In the context of philosophy, an experimental mark-up language – which marks objects in textual data – has been developed to support edition work.\textsuperscript{22} At the Akademie der Wissenschaften in Berlin, computational work is done in connection with cultural oriented projects, which work on the access to digital lexica, historical corpora and other data in context of culture.

\begin{footnotes}
\item[16] for further information see Meister 2005
\item[17] Jannidis 1999, p.40
\item[18] see also Baasner 1999, pp.11/12: There, the author states that research work in Digital Humanities is still negatively affected by legitimation debates.
\item[19] see Jannidis 1999, p.55
\item[20] see also Meister 2005. This contribution describes an early stage of the centre.
\item[21] For further information Bøe, Jørgensen, and Taugbøl 2004
\item[22] Sperberg-McQueen and Huitfeldt 2004
\end{footnotes}
1.1 Digital Humanities

The institution of Historisch-Kulturwissenschaftliche Informationsverarbeitung is engaged in software engineering for disciplines within the humanities. In the field of literature studies, the ICN does research on computer-aided approaches, especially narratology.

By comparing the research activities of these institutions, one can detect different directions. A large group of researchers is working on digitalisation and distribution of textual data. One should note that working on textual editions in general has a long tradition, also in library science. By digitalising texts, fresh analytical perspectives and practical experiments unthinkable earlier are made possible. This is especially challenging for the Computer Philology. As Jannidis states: “Denn die Literaturwissenschaft hat noch nicht wie etwa die Korpuslinguistik etablierte Auszeichnung entwickelt. Wie man narratologisch, buch- und kulturgeschichtlich Texte auszeichnet, wie ein historisch differenziertes Tagset zur Annotierung erzählerischer Texte auszeichnet, ist eine Forschungslücke der Literaturwissenschaft.”

This means that specialised, but standardised mark-up has to be developed – as already happened in corpus linguistics – for the usage in literature studies so that the needs of this field can be captured, and new perspectives introduced. Furthermore, the process of enlarging texts with mark-up often has to be done manually. Due to the complex and rather unstructured data, Jannidis says that researchers have to include notes, link text parts, etc manually. But for a more elaborated support, further research in computational or computer-aided methods in the humanities and philology has to be performed. It is important to pay attention to special needs of these fields of research and to come up with customised solutions, e.g. well suiting tools for the representation and analysis of cultural objects.

Another task and direction is to evolve efficient and usable information retrieval adapted to digitalised corpora. So far, most retrieval mechanisms are based on full-text searches. This provides an easier and faster retrieval of words or text sections. Nevertheless Jannidis explains that information retrieval is still challenging and techniques have to be more elaborated for a more advanced retrieval of objects, e.g. varying historical text material.

Another important facility, which one may add to digital editions and corpora, is the support of computer-aided text analysis. Such augmentations of the computer-supported analytical treatment of text material, may allow including human interpretations as well as analytical and descriptive theories and diverse types of narrative modelling. This means that the focus lies more on a meta-level of a text and can be only made visible by interpreting them, which seems to be very complex and difficult. For the work in Computer Philology, Jan Christoph Meister states: “Der Reduktionismus und die methodische Rigidität, welche die Digitalisierung literaturwissenschaftlicher Verfahren notwendig begleiten, schaffen neue experimentelle Bedingungen, unter denen wir erstmals kontrolliert menschliche Verhaltensakte in Bezug auf Texte in einem anderen als dem symbolischen Medium einer natürlichen Sprache modellieren können.”

Meister stresses, on the hand, the new precision of computational methods which might restrict the view on the material, but which on the other hand provide

---

23 Jannidis, Lauer, and Rapp 2006
24 see Jannidis 1999, p.44
25 Jannidis 1999, p.47
26 see Meister 1999, p.80
27 Meister 1999, p.79
Chapter 1 Introduction

new and experimental conditions. Agreeing on Meister’s opinion, it is sometimes frustrating that precise methods of computer systems may fail or does not serve with good results like grammar parsers or retrievals in linguistics.\textsuperscript{28} Nevertheless, this kind of work is challenging because it might open the door to a new view, or even field, of academic research in the humanities. There are already research projects addressing these topics, but academic activity using computer systems seems to be still marginal in the humanities. For example, \textit{TACT} (Textual Analysis Computing Tools) was developed at the University of Toronto.\textsuperscript{29} One of the first German research groups working on this task is a group at the Eberhard-Karls-Universität in Tübingen which created \textit{TUSTEP} (Tübinger System von Textverarbeitungs-Programmen).\textsuperscript{30} It is a programme for acquiring, retrieving, analysing and storing textual data. In the field of narratology, the programme “MoveParser” which supports the analysis of events in literature has been developed.\textsuperscript{31}

The examples outlined in the previous sections show that the computational supported analysis, one possible direction, can create high and elaborated solutions and that it is important to bring this kind of research to the Computer Philology and Digital Humanities, respectively. The approach of this thesis can be regarded as one of such attempts. It focuses on theories about literature, especially literary characters, rather than on the digitalisation of e.g. text corpora.

The mentioned research works are only a small extract of efforts in the Digital Humanities. But it is tried to give an impression of the field and to put this contribution into proper context. Concluding, the task of Digital Humanities is to go sideways to classical research in the humanities and to show new views on text data so that new conclusions may be reached. In this thesis, an approach, which supports special text analysis, similar to Meister’s intention, is given. The developed ontology of literary characters and its applications should contribute new aspects of computer-aided research, especially to the analysis of literary characters.

1.2 Guideline to the Thesis

Because of the differences of the topics outlined in this thesis, here, the structure of the thesis is given in detail. Following this introduction, relevant theories developed for the description and analysis of literary characters are stated (cf. chapter 2). Afterwards, theories used in the presented approach are explained in detail.

Since an interdisciplinary approach is aimed at, consequently, an introduction into computational methods, which are used in this approach, are outlined. Due to modelling of theories as well as information of characters, the term “information” and its comprehension are discussed. Then, different methods dealing with information are reported.

\textsuperscript{28}see Meister 1999
\textsuperscript{29}see Meister 1999, p.78
\textsuperscript{30}for example Bader, Winfried: Lernbuch TUSTEP. Tübingen 1995
\textsuperscript{31}Meister 1999
In chapter 4, detailed information about the developed ontology is stated including the structure and categorisations for a formal description of literary characters. In addition, the example corpus of texts used in this approach is presented.

Afterwards, in chapter 5 and 6, different applications of the ontology are presented. At first, logic-based applications are investigated for a usage with the ontology of literary characters. Then, apart from these applications, own developed applications are presented. There, the manipulation, like editing the ontology, searching for and comparing information of literary characters, is outlined. Afterwards, a second application, the semi-automatic assignment of information of literary characters to the developed system, is described.

In the second part of this thesis, the potential of the approach according to different tasks in literature studies is explored (cf. chapter 7 and 8): Different comparisons of literary characters are outlined and supported by the own developed applications mentioned above (search and comparison). Numbers taken from the character representations included in the ontology and visualised representations of the characters provide the analysis. Thereby, advantages, but also restrictions of the presented approach are investigated. At first, detailed comparisons of selected literary texts and literary characters are performed in chapter 7. This analysis should give results of developments of literary characters in different epochs and genres.

Figure 1.1: Scheme of the approach and workflow. Here, the different parts of this approach and their combination are presented. In the boxes, the topics and the corresponding chapters are included. The arrows present the relation between the topics. The top-down presentation reflects the structure of the thesis.
In chapter 8, the ontology and its applications are tested in a small study of different receptions of a single character. Due to the limited material included in the ontology, this study cannot be seen as representative. As mentioned above, it is also not intended to perform a completely empiric study of receptions. Nevertheless, it is tested how this approach can contribute to this. The thesis closes with conclusions and an outlook.
Part I

Development of an Ontology for the Description of Literary Characters – From Theory to Application
Chapter 2
Theories for the Description and Analysis of Literary Characters

As outlined in chapter 1, the analysis and description of characters is rather challenging. Approaches towards classifying literary characters are manifold and present many different views on this aspect of literature studies. For this reason, in the following sections, important and often discussed theories for the description and analysis of literary characters are outlined. Afterwards, theories chosen for this approach are presented.

2.1 Survey of Theories of Literary Characters

In this survey, the approaches are grouped thematically to focus on the different perspectives on the characters.\(^\text{32}\)

An analytical method of classifying characters is realised according to their features. For example, Edward Morgan Forster groups literary characters as “flat” or “round”.\(^\text{33}\) In his definition, characters only equipped with few features and consisting of a simple structure, are called flat. In contrast, characters, which are more complex and have more information, are defined as round. Forster also mentions that flat characters are called types and can be easily recognised.\(^\text{34}\) A round character can be modified during the plot, so it might be difficult to describe it briefly.\(^\text{35}\) This approach is interesting, but as Fotis Jannidis states: “Die Kategorien bieten keinen Anhaltspunkt zur Beschreibung, durch welche Merkmale die Komplexität einer Figur in einem Text [...] größer ist als die einer anderen. [...] Forsters Typologie macht zudem keine Aussagen über die Darstellung der Figur, sondern lediglich über die Qualitäten der Figur als Teil der erzählten Welt.”\(^\text{36}\) Stressing Jannidis arguments, it is difficult to create a classification based on these vague criteria. Furthermore, binding the modification or development of characters to the category “round” excludes all characters that are not human or have other life concepts. For example, supernatural characters, which are designed according to another concept of existence, might not show the development of

\(^\text{32}\) In this section, terms, for example instance or property, are used which also appear in another context later and have a different meaning, there.

\(^\text{33}\) Forster 1974, pp.46/47

\(^\text{34}\) Forster 1974, pp.46/47

\(^\text{35}\) Forster 1974, p.48

\(^\text{36}\) Jannidis 2005, p.87
a human character. However, one can say that these characters, for example Goethe’s devil character Mephistopheles, can be very complex and their presentation can occupy a large part in a story. Another criticism might be to define exactly a flat character or a type because a character might show a typical behaviour. But then it should be asked if this leads to the conclusion that the complete character structure is flat. Forster himself says about a female character: “...she has in a single sentence inflated into a round character and collapsed back into a flat one.” This shows that the decision regarding what is flat or round is very unclear, and even varies for a single character. In his description and classification Forster mixes a lot of aspects, and often the proof of his suggestions in an analysis might fail.

Nevertheless, Forster’s approach is taken up by other researchers like Wilhelm John Harvey who develops a richer categorisation, but based on Forster’s suggestions of round and flat characters. But according to Nieragden, Harvey’s categories, for example “protagonist figure” or “background figure”, miss a clear definition and separation from the other proposed categories. In addition, Harvey’s character analysis only takes actions of characters related to the plot into account. Other features of characters cannot be considered by using Harvey’s categorisation.

David Fishelov also tries to develop Forster’s and Harvey’s categories further. He concentrates on typical aspects of characters. To categorise characters, he proposes the categories of “flat”, “round”, “textual”, and “constructed”.

Another definition which puts different features of characters in focus is Margolin’s classification: “...literary character is seen as a cluster of simultaneous relations of similarity and difference in traits between any narrative agent and all other coexisting ones.” Operating with this definition, it is possible to focus on features without assessing the quality of a character and without proposing a ranking of characters.

Other approaches try to analyse characters according to their functions in the plot. Vladimir Propp’s theory is an important precursor for the perspective known as structuralism. Propp devises a concept to analyse Russian folk tales and the therein-acting characters. He detects special and repeating types of performances and functions, which lead to roles like the hero or the villain. These typical roles can be added to characters. Propp also describes a set of sequences of functions, e.g. the move out of the hero. In Propp’s approach, a scheme is developed that can structure and classify the processes and characters in fairy or folk tales and stories that have a similar plot and character constellation in common. If the arrangement of the characters diverges, it becomes difficult to classify characters according to Propp’s roles and functions.

Propp’s effort to find general categories for characters in fairy tales is taken by other researchers from structuralism. There, it is searched for general roles, which can be attached to charac-

---

37 Forster 1974, p.53
38 see Harvey 1970
39 Nieragden 1995, p.17
40 Fishelov 1990, p.425
41 Margolin 1987, p.115
42 Propp 1968, pp.27/28
43 Propp 1968, p.26
2.1 Survey of Theories of Literary Characters

ters.\textsuperscript{44} An important approach is Algirdas Julien Greimas’s theory, which can be regarded as a generalisation of Propp’s classification. He develops a model of six “actants” fulfilling a special function in a plot.\textsuperscript{45} If a character performs an action, it can merge completely or only partly with the scheme of an actant. The analysis does not completely focus on characters, but it is tried to find abstract roles for them and to search for general patterns. The view of Greimas’s approach is strongly influenced by the structuralism and limited regarding the functions of characters in a plot.

Using Propp’s and Greimas’s models, characters can only be analysed according to the plot and related functions. It is also only possible to conceive characters in their relationship to each other. Single analyses and descriptions of character features, which are not bound to the plot, cannot be performed. Thus, observing or commenting functions of a character, which might not be important for the progress of a plot, but take place on the communication level between characters and the reader/audience, cannot be captured. But these actions should also be part of a description because they also belong to a character. One can state that these approaches give interesting hints for typical constellations and actions of characters, but they cannot be used on features of a character beyond the plot.

In Roland Barthes’s approach, which belongs to the post-structuralism, methods for the analysis of literature are proposed. He critically analyses Propp’s and Greimas’s approaches and tries to define general parts of narration, for example functions and indices.\textsuperscript{46} The functions are mostly plot related, whereas the indices can refer to characters and their features.\textsuperscript{47} But he places the functions over the indices, which means that the plot related elements are higher ranked than elements not related to the plot. By using Barthes’s approach, it is difficult to separate characters and their features from other elements of a story, like the plot.

Other approaches relate characters to the genre in which they appear. For example, in Manfred Pfister’s approach, different aspects, like the relation between the audience and the characters in dramas, are taken into account. But he also tries to rank the “dramatis personae”, the characters, according to general features, like the social status or sex.\textsuperscript{48} In addition, he suggests examining characters in opposition to others.\textsuperscript{49} Thereby, he uses approaches like Propp’s theory. Although his suggestions, especially the relations between the audience and the characters, are very important, he is still influenced by some approaches, which try to find general structures. This might restrict the perspective on the patterns of characters. Deviations in the structure of characters might not be considered.

Norbert Greiner also analyses characters according to dramas. He strictly differentiates between characters and real persons and considers characters as imagined products.\textsuperscript{50} Thereby, interesting results for characters and dramas are outlined, but this approach concentrates on a particular genre and it might be difficult to generalise the conclusions.

\textsuperscript{44}see Nieragden 1995, p.20
\textsuperscript{45}Greimas 1971, see also Jannidis 2004, pp.100/101
\textsuperscript{46}Barthes 1975, p.246
\textsuperscript{47}see Ludwig 1982, pp.137/138
\textsuperscript{48}Pfister 1977, p.229
\textsuperscript{49}Pfister 1977, p.234
\textsuperscript{50}Greiner 1982, p.13
These approaches are only a small selection of all the theories for character analysis. But in this survey, many perspectives on characters are already outlined. Although each approach sheds light on important aspects, they are often too restricted to cover the complete phenomenon of characters. After stating popular and often discussed theories, several theories, which are used in the thesis, are given. The following theories present perspectives, which are not discussed yet.

2.2 Characters as Sets of Features (Lotman)

Jurij M. Lotman tries to develop Propp’s approach further. Lotman classifies characters as active elements, which carry the plot. According to their roles and functions, characters can be related to different groups like hero, helping assistant, and antagonist. He states: “The character of each one is a set of differential features revealed in relation to personae of the group he belongs to and personae of the other group.” Here, two aspects of his approach are described: Characters are a set or a bunch of differential features, but these features are functionalised according to the roles of characters in the plot. Their roles define their affiliation to a group. Lotman places characters and groups in opposition to each other. He explains: “The character of a persona is a set of all binary oppositions between him and other personae (other groups) as given in the text, the sum of his inclusions in groups of other personae; in other words, it is a set of differential features.” For comparison, he divides the set of features and functions of a character in oppositional features, which are attached to all characters. Thus, characters have to be analysed in opposite to each other according to their function in the plot.

The comprehension of characters as a set of features is an interesting idea. Thus, parts of characters that contain different aspects and functions can be brought together. But by using this classification, the problem arises that a singular inspection of a character without regard to other groups seems not to be possible. All features of characters can only be analysed in opposite to other characters and their features. But features or actions, which cannot be related to oppositional aspects of other characters, might not be observed. Furthermore, Lotman proposes the analysis of characters solely to their functionalities with reference to the plot. Aspects, which do not carry the plot, are suppressed.

In summary, Lotman shows an interesting classification scheme, but he still uses Propp’s suggested categories, which restrict the perspective on characters. By concentrating on oppositional and plot-oriented aspects of characters, other important things might not be taken into account. In addition, it might be difficult to assign characters to different groups because characters might have some aspects of one group and other aspects of another groups. For this reason, one might be in danger to add characters to groups, which might not fit for them.

\[51\] Lotman 1972, p.340
\[52\] Lotman 1977, p.249
\[53\] Lotman 1977, p.251
\[54\] Lotman 1977, p.253
Nevertheless, a few parts of his theories, – especially the definition of characters as a bunch of features, – can be useful for a description and representation of characters.

2.3 Mental Representation of Characters (Jannidis)

In recent years, the approaches for the analysis of literary characters and narratology have taken a new direction. Earlier approaches like Forster’s definitions only focus on a character as a construct dependent on the ideas of an author. But newer approaches are also interested in the reading process and the reader’s mind, which leads to more individual and open analyses. But even earlier, there are already approaches, like Stanley Fish’s claim in the 1970s, which take other positions apart from structuralism and formalism. Fish criticises formalists who try to teach that only a single perspective on literature is acceptable. In his approach, he states that formalism is a fiction and that there are many ways of reading literature. But it seems that it takes some time before such perspective prevails. A newer approach is presented by Fotis Jannidis, which is based on theories belonging to linguistic and cognitive science oriented literature studies. In the following section, a short survey of his approach is given.

Jannidis raises problems of various kinds for the analysis of literary characters. He states that fundamental research is still missing to explain e.g. the identification process for a character and the information process of a reader. A second aspect is the characterisation of a character. He is interested in the process of collecting information from different text sections and arranging them as a unit, which represents a character. Another object of investigation is the relation between a character and the plot. Furthermore, Jannidis explains that the features or the actions of a character can be a part of more general problems or patterns. The last aspect comprises the attitude of a reader and the reader steering by a character.

Jannidis formulates the assumption of a “narrative communication”. This means that he regards all processes around and in the literature as a kind of communication and intermediation. Therefore, three communication levels are introduced: “Auf der ersten Ebene kommunizieren ein realer Autor mittels seines Erzählwerks mit einem ebenso realen Leser. Auf der zweiten Ebene kommuniziert ein Erzähler mit der Leserrolle im Text und auf der dritten Ebene kommunizieren die Figuren der Erzählung miteinander.” It is important to stress the different levels and their participants and to be aware that stories consist of more than a single communication.

For analysing the comprehension and reading process, a model of a reader and his/ her text strategy defined as detections of information are outlined. Jannidis shows different steps in the process of comprehension. He displays the “naming of a character” that comprises the identification and the denotation or the labelling of a character. Most processes of identification

55 Fish 1976, p.195
56 see Jannidis 2004, p.5
57 see Jannidis 2004, p.6
58 see Jannidis 2004, pp.15-20
59 Jannidis 2004, p.16
60 Jannidis 2004, p.31
are possible if a character is called by its name or title. But the reader herself/himself must
cognitively separate a character from inanimate objects, especially if the story belongs to a
genre like fairy tales or fables containing non-human characters. Jannidis gives an important
hint for the identification process when he argues that characters are mostly arranged around
the concept of a human being, even though, their outer shape consists of animal or inanimate
features. Furthermore, the reader has to collect names and titles from the text and has to
recognise them as denotations of a singular character. Therefore, a contextual frame is needed
that can be presented as a storage place in the mind of the model reader. This also refers to
a text strategy. By collecting information about a character in a text, a stable identity can be
created. Jannidis also defines this construct as a “linguistic unit”.

The treatment of characters like real persons, which was proposed by some approaches, is seen
as problematic and is refused because the construction of a fictional character, only existing
in imagination, differs from that of a real human being. But also fixed classification systems
that do not allow changes of characters during the plot are inadequate to hold a description of a
character. In Jannidis’s opinion, an important step towards an appropriate analysis of a char-
acter is to regard it beyond its functions in the plot. It is important to analyse features and
unsteady emotions of a character, but these characteristics should not be handled in to a psy-
chological way. To declare the definition of the existence of a character, Jannidis postulates
two conditions proposed by Uri Margolin: “Die erste Bedingung verlangt, dass die Anwesenheit
der Figur in der fiktionalen Welt [...] eindeutig, stabil und unmissverständlich etabliert wird.
[...] Die zweite Bedingung, Prädikation, verlangt, dass es in jedem Moment des Geschehens,
in dem die Figur existiert, möglich sein sollte, zumindest den Besitz von einem Merkmal, sei
es sprachlich, mental, physisch oder des Verhaltens, unproblematisch festzustellen.” Here, it
is stressed that a stable presence and ascription of features is essential for a construction of
a character. But in case of a negation of the general character concept or in case of special
genres, this definition of a character could fail.

For the analysis, Jannidis proposes an approach derived from the cognitive science oriented
narratology and introduces a so-called “mental model” for the representation of a character
in a reader’s mind. This means that this model might not be identical to the written text
and it is mostly independent from it. Generalising this approach, he defines a “model reader”.
By introducing theories of the “folk psychology”, he tries to reconstruct the reading process
of the model reader. These assumptions lead to a basic type, which should represent the
information structure of a character. The basic type is a prototypic concept guided by the
intended structure and meaning of a story. Afterwards, Jannidis refers to general properties
of this basic type: The construct of a character can be divided into inner and outer features.

\(^{61}\) Jannidis 2004, pp.111-113
\(^{62}\) see Jannidis 2004, pp.131-137
\(^{63}\) Jannidis 2004, p.138
\(^{64}\) see Jannidis 2004, p.157
\(^{65}\) see Jannidis 2004, p.160
\(^{66}\) see Jannidis 2004, pp.162/163
\(^{67}\) Jannidis 2004, p.173
\(^{68}\) Jannidis 2004, p.179
\(^{69}\) see Jannidis 2004, p.193
\(^{70}\) see Jannidis 2004, p.194
The behaviour of a character can be regarded as actions that might be driven by emotions and wishes that can be inferred. Another part of a character consists of a life story. These categories can be summarised as the sum of “character information”. By ascribing new, singular information the mental model can be enlarged, but the different instances, a narrator or other characters, of the text can influence the ascribed value. For this reason, Jannidis defines four different dimensions:

1. Reliability - the instance, maybe the narrator, can produce inconsistent statements so that the ascribed information is unreliable and cannot be accepted by the reader.

2. Mode of bond - Information can be bound differently to a character.

3. Relevance - Information can be assessed differently.

4. Manifestness - If a feature of a character is stable, even when not explicitly mentioned, it is present and manifest.\(^71\)

The description and analysis of characters can be improved by adding duration, amount, frequency, order, concentration, information context, and character context to the information.\(^72\)

Finally, Jannidis states that the process of characterisation is a procedure of binding information to a character.

In Jannidis’s approach, the perspective lies on the structures and processes, which lead to the creation of a mental model of a character. Thereby, a fundamental analysis of the construct of a character is given. Jannidis’s approach does not afford a deep categorisation of character features, rather, its value lies on the description of the process by which signals in a story can lead to a detection and collection of attributes. Another important aspect in his work is that the description and analysis of a literary character are very extensive and a categorisation has to detect the sub-levels of reading and comprehension of a character.

### 2.4 A Character Taxonomy (Nieragden)

Göran Nieragden’s approach belongs to approaches that classify character information. He aims at a detailed analysis of what kind of information is given about a character and how it is communicated. The analysis is divided into two parts, a description of the classification and an exemplification of it by analysing two texts from English literature.

Nieragden notices that a systematic analysis of techniques for character intermediation is still missing.\(^73\) He refuses approaches that only focus on the role of a character in relation to the plot of a story, since other important elements can be lost so that a description would be incomplete. Especially approaches within structuralism and formalism try to allocate invariant roles or patterns to characters by concentrating on plot relevant actions.\(^74\) Nieragden states that these models can be used for analysing characters in fairy tales or sagas, stories with predictable.

---

\(^{71}\) Jannidis 2004, pp.201-207  
\(^{72}\) Jannidis 2004, pp.220/221  
\(^{73}\) see Nieragden 1995, p.15  
\(^{74}\) see Nieragden 1995, pp.19-23
plot structures. A taxonomy for characters should cover a large range of manifestations of character relevant information and should exceed singular texts and genres. Nieragden’s first step is to assume partial similarities between literary characters and real persons. It does not mean that he treats characters like real persons, but he relates character features and actions to similar aspects of human beings. Afterwards, he introduces the net-like system of Helmut Bonheim using four modes, *speech, report, description* and *comment*. Furthermore, Chatman’s levels of narrative communication are adopted. These levels refer to the inner plot (character), intermediation (narrator) and communication outside the story (real author, real reader). On the basis of Bonheim’s model, character information can be divided into a dynamic and a static modus. Descriptions and comments are regarded as static elements because they do not move the plot further along, and mark stops in the narrated time. The dynamic mode contains speech and reports. To define the categories, Bonheim states questions for these four categories, like “Which characters speak?” for speech, “Which characters initiate action?” for report, “Of which characters are the physical descriptions?” for description, and “Which characters judge others?” for comments. The categories are not isolated from each other. For example, a character description given in a speech of a character can belong to more than a single category.

To give a more detailed description of character information, Nieragden divides the dynamic mode into speech and non-verbal, physical action performed by a character. In addition, the differences between types of narrators and their speech actions are stressed: Comments given by a narrator with an external view-point can not be added to character speech whereas the speech of a narrator involved in the plot can be classified as speech. Sub-classifying character speech, Nieragden suggests that speech can be realised in a dialogue, a monologue or in a letter. Further attributes of speech are their functional characteristics, initialising (negotiation) or reacting (answering). Acts performed by a character can also be sub-classified into an initiation or reaction. But when analysing acts, the motivation of a certain performance should be regarded as emerging from own motivation or external reasons.

Categories belonging to the static mode can consist of information about the outward features, gestures, feelings or biographical background of a character, if they are objects of description. Furthermore, Nieragden discerns descriptions of the vita, the psyche, and the perception of a character. Special gestures and facial expressions can be added to the category of characteristics as well as to the category of acts. This depends on what kind of information is desired to be communicated. By communicating the background of a character, aspects like its profession, the social or familial situation can be given. The mental and psychic state is often indicated by speech. Nieragden notes that even though characters might perform actions and minimal speech actions. They stay functional if their thoughts are not communicated

75see Nieragden 1995, p.21
76see Nieragden 1995, p.24
77see Nieragden 1995, p.31
78Nieragden 1995, p.35
79see Nieragden 1995, p.38
80see Nieragden 1995, p.44
81see Nieragden 1995, p.54
82see Nieragden 1995, pp.58/59
because the description of “mental and psychic state of the character” plays a central role in the presentation of a character.83

In addition, the content of comments is very important. Nieragden states: “...nehmen literarische Figuren, wie reale Personen auch, in fast allen Romanen zueinander Einstellungen und Werthaltungen ein, die in unterschiedlichen Grad en expliziert sein können.”84 This means that comments about a character giving its thoughts, attitude, and motivation can create an overall picture of that character. Furthermore, comments can give hints about different relationships between characters.

In summary, in Nieragden’s approach, the plot as well as the communication level of a story is included. The perspectives of the narrator instance and the characters are regarded. This approach provides many important elements for the character description by picking up different aspects of a character. It is thereby possible to describe different perceptions of a character. Nieragden does not try to create a character typology, but he aims at to support a detailed apprehension of literary characters.

2.5 A second Mental Model (Schneider)

Similar to Jannidis’ approach, the approach of Ralf Schneider tries to cover effects of literary characters on readers. He concentrates on reception processes and effects of characters on readers. Thereby, he assumes that the creation of the illusion by fictional stories is mostly influenced by characters and their given actions, features, opinions, and feelings.85 This task is rather challenging because as he states: “In der Tat stellt dies ein Problem dar, denn mentale Vorgänge sind nicht direkt beobachtbar, sondern können nur modellhaft beschrieben werden.”86 This means that mental processes cannot be discovered directly. Thus, to describe the reception processes, he suggests to develop a model of a mental representation.87

Schneider describes the reception as an information process, actively performed by a human subject: “Die Konstruktivität der Informationsverarbeitung besteht darin, daß erst das wahrnehmende Subjekt den Sinnesreizen Bedeutung zuweist, daß also nicht etwa eine in einer Nachricht enthaltene Bedeutung einfach entnommen werden kann.”88 This means that a reader is influenced by information included in a text, but a complete meaning is not included in the text. The construction of meaning has to be done by the reader.89 Therefore, effects on readers are mostly subjective feelings. Nevertheless, empirical methods should be possible by being aware that the objectiveness of studies in other disciplines cannot be reached. On the one hand, individual aspects of different readers have to be regarded. On the other hand, facts about the reception process that are valid in general, have to be stated.90

---

83 see Nieragden, p.66
84 Nieragden 1995, p.81
85 Schneider 2000, p.5
86 Schneider 2000, p.6
87 Schneider 2000, p.61
88 Schneider 2000, p.7
89 Schneider 2000, p.8
90 Schneider 2000, p.13
Schneider’s observations of the reception process are that during different states in the reception process, complete mental models are not always possible for all kinds of information.91 Furthermore, he states that aspects of these models can change or be enlarged by new information given in the text.92 In addition, two kinds of giving information, explicit and implicit, can be stated:

“Explizit bzw. direkt wird die Art der Informationsvergabe genannt, bei der einer Figur eine Eigenschaft expressis verbis zugeschrieben wird, als implizite bzw. indirekte Charakterisierung wird hingegen der Vorgang verstanden, bei dem der Rezipient Hinweise auf die Erscheinung der Figur erst aus dem Handeln, der Sprache, der äußeren Erscheinung oder der Umgebung der Figur erschließen muß...” (Schneider 2000, p.91)

In Schneider’s approach, many hints according the reception process of a reader are stated. They might be useful to interpret the (formal) descriptions of characters. It is also interesting that similar to Jannidis’ approach Schneider also suggests a mental model. Features like speech and non-verbal actions are added to this model.93 But it depends on the individual reader to what (s)he pays most attention. It can also happen that aspects are not complete and a mental model stays fragmented.94 For economic reasons, Schneider assumes that a model of a character is done by categorisations, which are related to top-down or bottom-up methods of information processing.95 Thereby, processes also used in real life can be applied. As a categorisation, he defines three different types: Social, literary, and text-specific categorisation. He explains: “Eine Figur kann durch eine explizite Bezeichnung für eine Persönlichkeitstheorie oder eine soziale Kategorie [...] eingeführt werden, wie z.B. durch Benennung einer Rolle oder einer Berufsbezeichnung.”96 Thus, it is possible to add and rank further features of a character to an intended social categorisation. For the literary categorisation, he states: “Zu den Wissensbereichen, die Kategorisierung aktivieren können, gehört [...] auch das Wissen über literarische Figuren, also die Kenntnis von Figurenkonzeptionen. Sobald eine Figur Merkmale aufweist, die mit denen einer Figurenkonzeption übereinstimmen, können sich daraus die üblichen Konsequenzen einer top-down-Informationsverarbeitung ergeben.”97 This categorisation might only be applied by reading literature and it is a quality of a reader, not included in a text, which cannot be used for a categorisation of real people. To the text-specific categorisation, Schneider states that several forms of giving information about characters activate it. Especially by introducing a character, signals in a text can lead to a categorisation of a character.98 Here, the reader is guided by the text, which means that a categorisation is done bottom-up and not top-down.

91 Schneider 2000, p.65
92 Schneider 2000, p.77
93 Schneider 2000, p.93
94 Schneider 2000, p.141
95 Schneider 2000, p.142
96 Schneider 2000, p.144
97 Schneider 2000, p.146
98 Schneider 2000, p.148
2.6 Conclusion

A huge number of theories dealing with the phenomenon of literary characters can be found in literature studies. Early approaches treat literary characters like human beings, but even researchers like Forster already state differences between fictional persons and living ones.\(^9\)

Another problem arises by classifying characters according to their features. Therefore, different views are proposed like a classification according to character constellations or the quality of features. Often, these theories transport a special comprehension of the world like the structuralism.

At present, the reading process and the role of a reader are put in focus. These approaches are often influenced by cognitive science and reveal the subjectiveness included in the comprehension of characters. Previously, it seemed that a general method for classification was searched, but newer approaches, which stress subjectiveness and complexity of literature show that there is more than a single viewpoint on characters. Furthermore, different levels of literary communication can be discovered. Jannidis and Nieragden present important hints for the description of characters. Schneider also focus on the side of readers, but in contrast to Jannidis, he analyses activities of readers. Both approaches can complement each other regarding readers and reading processes.

In summary, characters are analysed from different viewpoints and more general approaches miss a detailed and nearly complete description. In this thesis, it is aimed at shedding light on these problems and tasks. As mentioned in section 1, the intention is neither to perform complete empirical applications, nor to stress a strict classification of characters but to realise a combination of several theories to reach a more detailed but at the same time also a flexible description of literary characters. Furthermore, it is aimed at a formal description according to a clear classification of aspects of characters. This classification should also be verified on literary material. Thereto, the approaches of Jannidis, Lotman and Nieragden are bundled together to achieve detailed description options. By using Jannidis’s approach, one can concentrate on the complex reception process. But Jannidis does not define enough categories to granulate the phenomenon of a character. Lotman’s definition of characters as a bunch of features might be helpful. But his approach is too restricted and general categories, which also take the different levels of narration into account, are missing. For comparisons of characters and their receptions, the categories of Nieragden, which divide the features of characters and pay attention to the narration levels, are useful. By arranging these theories, the goal of this approach is to use them to develop an ontology for a formal description and representation of literary characters. The approach can be seen as an example for using the method of an ontology.

The research on literary characters is not complete and more detailed reflections and analyses of this phenomenon are required. But it is important to prove theories and to enhance them by working closely to literature. The approach should be seen as an example for modelling theories by using an ontology. In addition, different possible directions for further research should be shown. But it is not claimed to fulfil them completely.

\(^9\) Forster 1974, pp.38-43
In the last chapter, theories for the description of literary characters were outlined to explore theories for this thesis. The theories consist of different kinds of information that are related to each other. For this reason, methods in the context of information representation should be used to represent these theories. In the following, an overview of information modelling and representation is given.

Information can hold a huge potential for all kinds of human activities. One can even say that most activities can only be initialised or performed by using information. Classifying and describing things and ideas of the world can provide information in a structured and more detailed way. Research in particular can benefit from structured information to develop further and to solve tasks. Categorisation or description systems are not a new development of the modern world. Information systems have been used maybe since the first civilisations were formed and they are essential to classify all kinds of information. Since the invention of machines and computer systems, human beings are able to transfer information to new digital media, apart from paper, and to store it there. This development contains a lot of advantages, but also disadvantages arise: because of the growing mass of data, it is difficult to handle and retrieve contained information in the data. For this reason, data and information have to be represented and modelled. Special methods of information modelling are developed to gain a fast retrieval and efficient representation. Thereby, advantages of computer systems, like holding a massive quantity of data, conserving information and fast processing, can be exploited. For the presented approach, information modelling and representation is important because literature, which can be nested in several media, like books, films, or the Internet, also consists of information. The previously stated theories about literary characters already give some hints about which kind of information is given and how it is processed. The idea is to model this kind of information by using information modelling in computer systems.

3.1 “Information” in Different Contexts

Information can be defined in many ways. In order to model it, one has to be aware of the modelled objects and their nature. In addition, one should know how they could be represented. The definitions of information can differ from discipline to discipline depending on what it is focused on. Especially, the term of information is discussed in information and cognitive science, computer science, and philosophy. In the context of information, the terms of data and
knowledge are also appended. Furthermore, the comprehension of a communication process should be regarded because information has to be communicated. A complete explanation of the nature of information is not yet possible and varies from approach to approach. For this reason, in the following, a brief summary of definitions of information in different disciplines is outlined to give an impression.

Most researchers, especially in computer science, determine data as the basis of all other concepts, like information or knowledge. A definition is that data simply exists and does not have any meaning of it.\textsuperscript{100} Information differs from data because it can be used and it is already related to other objects. On the top of information, a concept is defined as knowledge. Knowledge has to be useful because it is part of an active process. By adding an understanding process to the other concepts, wisdom can be gained.\textsuperscript{101} Wisdom belongs to an exclusively human feature.

Another theory of information is given in the philosophy. There, data and information are grouped in different kinds. Information is seen as “semantic content” if it consists of data which is well-formed and meaningful.\textsuperscript{102} Information can be classified as factual or epistemically-oriented, instructional, pragmatic, etc. It seems that information is separated according to its function and context. Thereby, a specific usage of information is already integrated in the definition. Data can be classified for example in “Primary Data” (array, number), “Meta data” (data of primary data) and “Operational Data” (data for performance).\textsuperscript{103} In contrast to the first definition, semantic information seems to be more complex and enriched with meaning. Knowledge can be built on the top of semantic information.

One should note that information is a value, which only works by communicating it. For this reason, communication and intermediation also have to be regarded. A communication model based on Shannon’s theory integrates information as a part of a communication process.\textsuperscript{104} This model consists of a sender, a receiver, media, and information. The media or channel is used to transmit a signal.\textsuperscript{105} The signal is a coded message that can lead to information if the receiver correctly translates it. Using Shannon’s definition, all kind of media, like TV, telephone, or the Internet can be regarded as channels and one can also include spoken language. His approach is often reviewed and rejected, and it is still discussed. Shannon’s theory is developed for a general intermediation of signals. It is difficult to use this model for human communication processes, also literary communication because it cannot capture all the involved aspects.

These theories might hint at important aspects. However, the different definitions of data and information do not always clarify objects of research and one can feel confused. Theoretical approaches might take all kind of aspects into account. But in order to model data and information, it seems to be essential to restrict the scope and to work with clearer definitions. Otherwise it is difficult to capture and represent objects like information.

\textsuperscript{100}Ackoff 1989  
\textsuperscript{101}Ackoff 1989  
\textsuperscript{102}Floridi 2004  
\textsuperscript{103}Floridi 2004  
\textsuperscript{104}Shannon 1948  
\textsuperscript{105}Shannon 1948
More practical definitions are given in a discipline, the artificial intelligence (AI), that models information by using computational methods. The AI covers a wide range in computer science, linguistics, and cognitive science, and thereto, approaches in the field of robotics, information processing, and information representation. Eugene Charniak and Drew McDermott define the discipline as follows: “Artificial intelligence is the study of mental faculties through the use of computational models.”\textsuperscript{106} It consists of a development of an understanding of information and knowledge structures as well as their acquisition. Thereby, it is tried to prepare them in a machine-readable format and for a usage in computer systems. But the authors also point out: “It turns out that for a computer to do the simplest act of vision requires several million multiplications.”\textsuperscript{107} For this reason, modelling human actions is a sophisticated work and still far away from replacing human intelligence. In this thesis, one aspect of AI, the information representation, is put in focus. Before going on, a short excursus is given to define the terms of information and knowledge in the AI.

In AI, especially knowledge engineering, the term knowledge appears frequently. One should be aware that in this discipline information and knowledge might be mingled together. The authors Puppe, Stoyan, and Studer define knowledge as “ein Potential des Menschen, das ihn zu rationalen Aktionen befähigt”.\textsuperscript{108} By acquiring knowledge, concepts and classifications of objects of the world are created in the human mind to construct an image of the world. Thus, one can state that human knowledge consists of systematisations which structure objects like information. It seems that information and data is equated and seen as one part of the content of these conceptions.

The qualification of human knowledge cannot easily be transferred to and simulated by technical systems, but using options of knowledge/ information representation, structures can be generated that are interpreted as models of the real world. Normally, during this process, descriptions of natural language of the world or a part of it are transformed into a formal description.\textsuperscript{109} By creating systematic models, information or knowledge of humans can be transferred to a computer. Thereby, a further processing is possible by using a machine in which human actions can be simulated. But it is important to model knowledge or information in a useful way and to prepare it for a special purpose. A machine cannot replace the human knowledge. But by introducing information representation, working processes can be supported and structured. Modelled information can be applied in various ways. For example, special information and knowledge is prepared in so-called expert systems to provide diagnosis and problem solving strategies.\textsuperscript{110} Furthermore, produced information can be integrated in Knowledge Maps so that human beings can navigate through large fields and retrieve results more easily. Because of the importance of modelling information, more methods are presented and discussed in the sections 3.2.2 and 3.2.3.

The comprehension of information and knowledge in knowledge engineering is a rather pragmatic approach because tasks are mostly application-driven. This means that in knowledge

\begin{footnotesize}
\begin{itemize}
\item \textsuperscript{106}Charniak and McDermott 1985, p.6
\item \textsuperscript{107}Charniak and McDermott 1985, p.6
\item \textsuperscript{108}Puppe, Stoyan, and Studer 2000, p.599
\item \textsuperscript{109}Puppe, Stoyan and Studer 2000, p.600
\item \textsuperscript{110}Charniak and McDermott 1985, pp.455/456
\end{itemize}
\end{footnotesize}
Chapter 3 Information Modelling and Representation

engineering often restricted scenarios and problems are given, e.g. expert systems or information models in a special context. The term knowledge is defined in a limited way according to mostly formal operations, which can be performed by a machine. One should note that the basis of computer systems is calculation processes. Although humans can perform many operations by using machines, these systems do not have the complex structure of a human brain. By transferring thinking processes to machines, these processes have still to be simplified and limited. In addition, other human actions, for example emotions or creative processes, are mostly excluded because they are too complex for modelling yet. In AI and knowledge engineering, information and data seems not to be ranked or grouped in the same manner as in some other disciplines. As mentioned, the terms information and knowledge are often mingled together without a clear distinction.

This presentation of theories and approaches does not claim to be complete, but it shows how complex and difficult definitions of information can be. For this reason, it is not yet possible to give a general definition. It depends on the perspective how data, information and knowledge can be regarded. Being aware of this discussion, it might be helpful to understand methods described in the next sections. In this thesis, a computer-aided approach is presented which models a special kind of information, information that is given in literature. Therefore, more restricted definitions have to be used.

In this thesis, information is defined as something that is nested in a (literary) text or other media. The text or other media themselves are treated as data. In a communication process, information has to be extracted by a human. Then, according to Schneider’s approach (see section 2.5), information from literary texts can be processed in different ways depending on the background of a recipient and on the guidance for example by a narrator.

3.2 Representation of Information

In the last section, different definitions of information are presented and discussed. But the question arises how information included in texts, which are an important part in this thesis, can be modelled, especially in computer systems. It is obvious that there are differences between human cognitive processes and the representation of data and information in a machine, i.e. a transfer (digitalisation) of such information is necessary to enable computers to operate on them.

3.2.1 Text Annotation

Especially for textual data, the usage of mark-up, which marks objects in textual data, has been established. This means by including special mark-up, a (literary) text can be enriched with meta-information. As Jannidis states: “Metainformationen in elektronischen Texten sind alle zusätzlichen Angaben: von der Unterstreichung und dem Fettdruck über Kapitelgrenzen und

\[\text{\footnotesize\ref{note:emotion-analysis}}\] But there are already researchers in linguistics who work on the analysis of emotions concerning for example special phrases in text, see Mihalcea and Liu 2006.
Akt- und Versende sowie Strophenbegrenzungen bis zum Autornamen und den Werktitel...”

This means that different kinds of information, like information about the design or structure, can be attached to the text by using mark-up. Jannidis also stresses that every mark-up is an interpretation of a text which represents a special view on it.

The most popular markup language family is **SGML** (Standard Generalized Markup Language) and its derivatives **XML** (Extensible Markup Language) and **HTML** (Hypertext Markup Language). SGML has been developed by Charles Goldfarb, Ed Mosher and Ray Lorie in the 1970s. Although SGML provides semantic and structural markup, the specification is so enormous and complex that only parts of it were implemented. By restricting the conception of SGML, HTML – a SGML application with a specific and limited set of markup – was developed to describe the presentation of data, text and pictures in a web browser. Another restricted version of SGML is XML, developed by Jon Bosak, Tim Bray, C.M. Sperberg-McQueen, and James Clark in the late 1990s. Using XML, it is possible to describe and preserve the structure of data. In contrast to HTML, XML is meant for a more general usage than presenting content on a web browser. Because of its specification, XML mark-up offers huge flexibility for individual purposes, e.g. to structure literary texts, like verses and dramas, as well as textual data in natural science or documents of a company. Furthermore, the possibility of a re-usage and exchange of textual data enriched with meta-information in XML is of interest.

In order to share and interchange, it might be useful that people working on textual data agree on a more standardised usage of XML. For this reason, encoding schemes or so-called **DTDs** (Document Type Definition) can be introduced to restrict XML mark-up on a common accepted set. Several organisations and groups have been developed schemes to provide mark-up in a standardised way, e.g. **DocBook** or **TEI**. The TEI (Text Encoding Initiative) is developed to provide a standard for the work with digital text sources. The main goal of the TEI is described as follows: “The Text Encoding Initiative (TEI) Guidelines are an international and interdisciplinary standard that enables libraries, museums, publishers, and individual scholars to represent a variety of literary and linguistic texts for online research, teaching, and preservation.” This means that a scheme has been developed to support encoding work in the context of language and culture. A wide range of mark-ups for textual components and concepts are included in the scheme to enrich e.g. data with linguistic and literary meta-information. This means that it is possible to mark textual elements and content of linguistic analysis as well as dramas, novels or verses.

The large repertoire of mark-up can be restricted on a subset, which is required for the special purposes of research projects. In the presented approach, a special subset of TEI mark-up elements is also used which will be explained in section 6.1.4.

---

112 Jannidis 1999, p.43
113 Jannidis 1999, p.45
114 Harold and Means 2001, p.8
115 Harold and Means 2001, p.8
116 Harold and Means 2001, p.4
An important aspect for the understanding of data marked with XML is that it is represented as a tree. It always consists of a root node followed by one or more child nodes, which can also contain children (cf. Fig. 3.1).

![Figure 3.1: Scheme of (textual) data with XML mark-up. The data is represented as a tree with branches and nodes. The last nodes contain so-called PCDATA, which represents the content of the data itself.](image)

One should note that mark-up could be included in e.g. a drama to mark dialogues. But because of its individual specification of XML mark-up, marked parts are not presented in a special, maybe visualised way. By using XML, a separation between marked texts and their layout is provided. This means that there are no declarations for visualisations in such documents encoded with XML mark-up. Even though e.g. a dialogue structure is marked in a drama, computer systems are not able to handle and interpret this kind of information. Therefore, if the text should be visualised, a transformation to other formats is necessary. By encoding documents with XML, it is possible to choose different formats and visualisations for the transformation, like print-versions or versions for a web browser. In addition, one can select parts of marked text sections and transform it to different XML structures for a further processing. The processing can be done by programming languages like Java, Perl or XSL (Extensible Stylesheet Language)\(^\text{118}\) which has been specifically developed for that purpose: “XSLT is published by the World Wide Web Consortium (W3C) and fits into the XML family of standards, most of which are also developed by W3C. As the name implies, XSL is intended to define formatting and presentation of XML documents for display on screen, on paper, or in the spoken word.”\(^\text{119}\)

In summary, different ways of representing information and enriching textual data with meta-information are presented here. Textual data mostly occurs by working with already developed text sources, for example corpora of novels, corpora of interviews or learner corpora. Thereby, characteristic aspects have to be detected and marked. In linguistics, for instance grammatical structures or syntactic relations like cohesion are of interest. In the humanities, structures and semantic relations concerning for example argumentations in a philosophical text or elements of a plot in a literary text are put in focus.

\(^{118}\)For encoding and checking XML documents, editors like XMLSpy or Oxygen can be used which support the syntax of XML.

\(^{119}\)Kay 2001, p.25
In linguistic corpora, it might be possible to encode e.g. grammatical elements by using semi-automatic approaches. In contrast, text corpora in the humanities, especially in literature studies, cannot be processed in that way because the aspects, e.g. semantic relations in texts, cannot yet be automatically detected.

Apart from corpora consisting of primary literature, like dramas or novels, it might also be challenging to model and mark theories from secondary literature. This means that theories about literature and their included information can also be interpreted and represented by using computer systems. Thereby, at first, cognitive processes and their included information representation has to be produced and can be modelled then: “Das liegt nicht zuletzt daran, daß solche literaturwissenschaftliche Fragestellungen sich selten direkt auf ein gegebenes primäres Datum >Text< oder >Sprache< richten, sondern zumeist auf Interpretations- oder Beschreibungsverhalte, die erst in Abhängigkeit von einem Primärtext erarbeitet werden müssen.”

In this thesis, especially such kind of relation between primary and secondary literature is of interest. In order to represent these aspects, an encoding using XML might not be enough: “Because XML alone does not provide sufficient semantics for marked-up or annotated documents [...]” For this reason, further methods have to be explored which provide a complex modelling of information. As mentioned, several methods are used in disciplines like AI, which concentrate on simulating human processes in machines. In this thesis, theories of literature studies developed by humans are modelled which also contain interpretation and comprehension processes. Therefore, approaches supporting such a modelling are outlined and discussed in the following. The following sections should also serve for a better understanding of the chosen modelling which will be presented in chapter 4.

An idea of modelling information and semantics is contained in the effort to change parts of the unsorted Internet into a Semantic Web so that advanced retrievals are possible:

“The Semantic Web is a vision: the idea of having data on the Web defined and linked in a way that it can be used by machines not just for display purposes, but for automation, integration and reuse of data across various applications. To model data and information, different formats and methods were released. The methods go from enriching data with semantic (meta-) information to complex models which structure data in an enhanced way.” (Lacher and Decker 2001, p.313)

Popular representation formats, which are introduced in the context of the Semantic Web, are RDF (Resource Description Framework) and OWL (Web Ontology Language), both initiated by the W3C (World Wide Web Consortium). By using RDF, it is possible to enlarge web sites and documents with semantic information. RDFS (RDF Schema) is more expressive to also include elements for creating a hierarchy. OWL was created to enlarge web sites with semantic information and make the Internet usable as a structured information source. OWL is based on RDF and RDFS, but also consists of constructs that are necessary to create an ontology. These formats inherited older ideas of methods of modelling like semantic
networks, taxonomies, or ontologies. According to their kind of modelling and structuring data, in this thesis, they are divided into two groups, which are outlined in the following.

3.2.2 Network-like Representations

The idea of a semantic network appeared earlier in the AI and other disciplines. There, a network is defined as “a graphic notation for representing knowledge in patterns of interconnected nodes and arcs”. The arcs can be directed, this means: “A “directed arc” can be thought of as a line connecting two nodes, with an arrowhead indicating direction.” Semantic networks can be created by focusing on different aims, like implicational networks or learning networks. This means that terms or information are semantically related to each other so that a network can be generated. A simple network can be expressed by using RDF: “The rdf Data model is essentially a directed, labelled graph: it consists of entities, identified by unique identifiers, and binary relationships between those entities. In rdf, a binary relationship between two specific entities is represented by a statement (or triple).” But the expressiveness is rather limited because relationships can only be presented by using triples.

Together with network-like models, methods of indexing are often mentioned. A format for indexes, which also contains ideas of a (semantic) network, is the specification of TopicMaps: “The purpose of topic maps is to interchange knowledge. Knowledge interchange may seem hard (knowledge is seen as subjective or as existing only in the mind), but in the fact it can be approached pragmatically.” The history of the ancestor of Topic Maps dates back to the beginning of the 1990s. The first idea was to develop a concept for master indexes for the electronic publishing. After a longer development process, the ISO 13250 standard, the specification of Topic Maps, was set in the year 2000. To provide the usage of this standard in the web and for annotations, XTM (XML Topic Maps) was developed. XTM is a XML standard also since 2000. In XTM, the concepts of Topic Maps are transferred to a set of special XML constructs. Thus, it is possible to process XTM with XML parsers and validators. In the following, a short overview over the special set of XTM constructs is given. Because of the usage of the XML syntax, XTM is more restricted than the ISO standard. The most important construct in XTM is a topic. As Steve Pepper explains: “A topic, in its most generic sense, can be any “thing” whatsoever - a person, an entity, a concept, really anything - regardless of whether it exists or has any other specific characteristics, about which anything whatsoever may be asserted by any means whatsoever.” This means that a topic can refer to any object. The second general concept is the associations, which can be expressed as relationships between objects.

125 see Sowa 1987
126 Sowa 1987
127 Charniak and McDermott 1985, p.23
128 Sowa 1987
129 Lacher and Decker 2001, p.319
130 Charniak and McDermott 1985, pp.24/25
131 Park and Hunting 2003, p.82
132 see Park and Hunting 2003, p.37
133 see Park and Hunting 2003, pp.38/39
RDF and XTM are only single examples how to model information in a network-like structure. Although in these formats, meta-information can be attached to data and objects in the data can be related to each other, the structure of these formats is rather loose. A more structural approach is given by using methods and formats which hierarchically represent data. Some of these methods are presented in the next section.

3.2.3 Hierarchical Representations

Data and its contained information can be structured by grouping it and by specifying the relations between objects of the data. The method of a *thesaurus* can be regarded as an interstage towards more elaborated methods. In a thesaurus, collections of words and terms, which can be regarded for example as synonyms, are stored: “A thesaurus is a set of items (phrases or words) plus a set of relations between these items.” This can be supported by the comment of Daniel Naber:

“A thesaurus is a dictionary that lists words which have a similar or related meaning. The most simple case is a pair of synonyms, i.e. two words which have the same meaning. [...] It can serve as a simple dictionary-replacement that explains the meaning of a word by listing other words with the same or with a similar meaning. [...] Knowledge about synonyms might also be used by search engines to find documents that contain information about the subject one is looking for, but that uses different terminology.” (Naber 2004)

By using this method, it is tried to group terms according to their characteristics and relations. It might also be possible to arrange sets of terms hierarchically.

This leads to a method called taxonomy. One should be aware that this term is used differently in several disciplines. For example, in natural science, it is often a hierarchical classification of subjects of research according to their features. In computer science or IT, a more pragmatic comprehension is given: “A taxonomy indicates only class/subclass relationship [...] A taxonomy is a hierarchy and a unique code is usually assigned to each node of the hierarchy. This code also encodes its path.” A format that was released in the context of the Semantic Web is, as mentioned, RDFS. RDFS can be seen as a format in which taxonomies can be realised. For example, classes and subclasses or property ranges and domains can be provided. The authors Eckstein and Eckstein even say: “RDF-Schema dagegen erlaubt außerdem die Bildung von Begriffshierarchien, so genannten Ontologien, für die semantische Einordnung von Begriffen.” One can treat taxonomies and ontologies as similar methods, but there are slight differences between taxonomy and ontology. Furthermore, one should note that some researchers subsume thesauri, taxonomies, and maybe also semantic networks under the term of ontology. Barry Smith also mentions connections between a taxonomy and an ontology:

---

135 Jing and Croft 1994
136 Dogac, Laleci, Kabak, and Cingil 2002
137 see Ziegler 2004, p.128
138 Eckstein and Eckstein 2004, p.235
“Gradually, however, it was recognized that the provision, once and for all, of a common reference ontology – a shared taxonomy of entities – might provide significant advantages over such case-by-case resolution, and the term – ontology – came to be used by information scientists to describe the construction of a canonical description of this sort. An ontology is in this context a dictionary of terms formulated in a canonical syntax and with commonly accepted definitions designed to yield a lexical or taxonomical framework for knowledge-representation which can be shared […] More ambitiously, an ontology is a formal theory within which not only definitions but also a supporting framework of axioms is included (perhaps the axioms themselves provide implicit definitions of the terms involved).” (Smith 2003)

One can observe that there can be only slight distinctions between a taxonomy and an ontology. But an important difference might be the “framework of axioms” which is only included in the model of an ontology. In this thesis, taxonomies and ontologies are regarded as separated methods. Even though taxonomies and ontologies are similar methods to express hierarchical structures. Because of the importance of ontologies to the presented approach, a brief excursus to the origin of ontologies is given in the following.

The term ontology originates from philosophy and contains the study of being or existence in general. Puppe, Stoyan, and Studer explain that by using the method of an ontology, the existence of things in the world can be described and classified. By transferring the term to the AI, it was restricted on modelling of concepts of the real world in computers. The following definition is often preferred in the research of AI: “An ontology is a formal, explicit specification of a shared conceptualisation.” In general, an ontology represents a hierarchical conception of a part of the world, called “domain”. The representation should be produced in a machine-readable language. Natalya Fridman Noy and Deborah L. McGuinness explain: “An ontology defines a common vocabulary for researchers who need to share information in a domain.” An ontology consists of a set of objects, concepts, and further entities, which are related to each other. These objects are divided into classes, also concepts, properties (also slots, or roles) and the restrictions of the roles. Additionally, so-called instances of the classes represent individual objects of the selected domain. By relating main classes and more specialised ones of an ontology, a hierarchy can be created.

Regarding the relations between objects of a domain, different kinds of relations are possible: The most common relation is called isa. Charniak and McDermott explain: “...isa says that one class is a more general version of another. Roughly speaking, the distinction is like that in set theory between element and subset.” This also means that a more specific class inherits properties of the more general one. The isa relation is often used for building taxonomies.

---

139 Philosophie-Lexikon 1991
140 Puppe, Stoyan, and Studer 2000, p.622
141 see Puppe, Stoyan, and Studer 2000, p.622
142 Gruber 1992, p.199
143 Noy and McGuinness 2001, p.1
144 see Noy and Hafner 1997, p.53
145 see Noy and McGuinness 2001, p.3
146 Charniak and McDermott 1985, pp.26/27
of animal species, wine sorts, etc. A second relation can be a *part-whole* relation. As the name says, relations between an object and its containing parts are defined. They are used in many fields: “Part-whole relations are one of the basic structuring primitives of the universe, and many applications require representation of them - catalogues of parts, fault diagnosis, anatomy, geography, etc..”\(^{147}\) But this kind of relation should not be mixed with the relation between a class and its instances. Charniak and McDermott define this relation as *inst*: “…*inst* says that a particular individual is a member of some class…”\(^{148}\) In contrast to a part-whole relation, a set is related to an atomic element which cannot be divided further. But two classes can be represented as a whole to its part. The class, which represents a part, can have further instances.

In addition to these different kinds of relations included in ontologies, different types of ontologies can also be defined. Because of the usage of ontologies in many application areas, Puppe, Stoyan, and Studer distinguish the following types of ontologies: *Domain ontologies* are only applied in certain areas whereas the conception of a *general ontology* is valid beyond a single domain. The third type of an ontology is the *method ontology* which is often used for problem solving strategies. More functional ontologies define types of special tasks.\(^{149}\)

Different languages developed are available for representing ontologies of any kind in a machine-readable format. They can be divided into informal (or graphical) and formal representation languages.\(^{150}\) The language *CML* (Conceptual Modelling Language), a semi-formal language with graphical notation, can be called as informal whereas *KIF* (Knowledge Interchange Format), which enlarges the first-order calculus, belongs to the formal languages.\(^{151}\)

As mentioned, OWL is a standard, which was developed for purposes in the context of the Semantic Web. For a realisation of data in OWL, a XML syntax is used even though the theoretical background consists of more ideas, e.g. formal-logic conceptions. As Antoniou and Harmelen say OWL builds on RDF and RDF Schema, and uses RDF’s XML syntax.\(^{152}\) Because of the combination of logic-based constructs and the syntax of the popular mark-up language XML, a wide range of applications is possible. Thus, logic-based applications as well as manipulations and retrieval with XML related programming languages could be executed.

The formal language OWL is available in three species, *OWL Full*, *OWL DL* (Description Logic), and *OWL Lite*. They are developed for the different needs of users. OWL Full uses all OWL language primitives and also allows possibilities to change pre-defined primitives.\(^{153}\) This means that every object of an ontology can be defined in any way. In contrast, the sub-language OWL DL restricts some options possible in the full version to avoid problems for further applications. So, especially logic-based applications should be used with an OWL DL ontology. Antoniou and Harmelen state about the restrictions: “…any resource is allowed to be only either a class, a datatype, a datatype properties, an object properties, an individuals,

\[^{147}\]http://www.w3.org/2001/sw/BestPractices/OEP/SimplePartWhole (last accessed October 30, 2007)
\[^{148}\]Charniak and McDermott 1985, p.26
\[^{149}\]see Puppe, Stoyan and Studer 2000, p.623
\[^{150}\]Puppe, Stoyan und Studer 2000, p.624
\[^{151}\]Puppe, Stoyan und Studer 2000, p.624
\[^{152}\]see Antoniou and Harmelen 2003, p.68
\[^{153}\]see Antoniou and Harmelen 2003, p.70
Objects have to be defined clearly and they cannot be used in different ways. Users only creating a limited ontology or hierarchic structure can use OWL Lite, a subset of OWL DL. In OWL Lite, enumerated classes, disjointness statements, and arbitrary cardinality are not available.\textsuperscript{155}

In the next section, the presented modelling methods are compared and discussed to make a clear distinction which kind of model should be used for the presented approach.

### 3.2.4 Conclusion

As shown in the last section, there are several differences how data and its information can be modelled. If XML code is directly added to textual data, the data and mark-up can be processed together. This might be a good solution for modelling for example literary texts and their characteristics like layout and structure. But the mark-up is directed towards the text structure and does not contain a completely different model like a taxonomy or ontology, especially when using suggested annotation schemes like proposed by the TEI. It is possible to add enhanced semantics to mark-up in a text, but then, it can only point on a specific text section. Even though organisations like the TEI try to introduce a general mark-up vocabulary, their scheme is still limited on encoding texts. Defining categories or other structural elements which have inherited a complex model like the above mentioned methods of network-like models, taxonomies, and ontologies, are not possible using XML or only in a limited way. Furthermore, another disadvantage, which should be stressed, is that so far XML vocabulary has been developed with focus on specific applications: “A data model, on the contrary, represents the structure and integrity of the data elements of the, in principle “single”, specific enterprise application(s) by which it will be used.\textsuperscript{156}

As mentioned, in this work, the description of literary characters is modelled for supporting analyses in literature studies. This description should contain categories, like the categories of Nieragden, and information extracted from literary texts. For this reason, it might not be enough to only use an encoding scheme of XML like the one provided by the TEI. A more elaborated method that supports the modelling of information and semantics is necessary (see Fig. 3.2). This leads to the previously outlined methods of network-like and hierarchical models. Many of these methods are used in several (research) projects and in the context of the Semantic Web.\textsuperscript{157} In the following, advantages and disadvantages of more network-like or more hierarchical models and their realised formats are discussed.

Network-like models were introduced to present graphs or indexes. There, the focus lies on the relationships between the objects. Taxonomies and ontologies are based on the strict hierarchical idea of super and sub classes; i.e. a difference lies in the conceptions of the relationships. In XTM, a format in which ideas of a network are realised, relations are flexibly handled whereas most relations used in taxonomies/ ontologies, e.g. the class relations, are defined strictly, and restricted. It is not possible to declare e.g. new relations between an

\textsuperscript{154}see Antoniou and Harmelen 2003, p.82
\textsuperscript{155}see Antoniou and Harmelen 2003, p.83
\textsuperscript{156}Spyns, Meersman, and Jarrar 2002
\textsuperscript{157}see for example the DISCOVERY project (Smith 2007)
instance and a property, which are not included in the RDFS/ OWL specification. Furthermore, the construct of a topic in XTM is rather flexible and can be used in different ways. The constructs of RDFS/ OWL are instead fixed on the repertoire of a taxonomy or ontology. The idea of XTM/ Topic Maps seems to hold the constructs like topics, and associations as much as flexible, maybe to express every possible (semantic) relationship in a network. For this reason, there is no exact definition for which purpose they can be used. But this also brings along that relationships using XTM are not always clearly defined. Certainly, machines do not understand individual relations. In contrast, applications in RDFS/ OWL with its typed concepts and relations can be understood of most people who are familiar with ontologies. It is also possible that programmes, which have included the elements of OWL can understand and present most of the OWL ontologies. There is no difference between a class in one ontology and a class in another ontology.

Focusing on the tasks for the here presented approach one can observe that the theories for literary characters contain main categories like features, which subsume more special categories. Because of the nature of the modelled theories for literary characters, a more hierarchical structure seems to be advantageous. Modelling hierarchical aspects would be rather difficult using formats for network-like structures. One would soon reach the limits of such methods. It should be mentioned that by using special associations in XTM class-class relations are also possible. But class relations are already a part of hierarchical models and formats and they do not have to be created in addition. For these reasons, it might be better to choose formats, which inherit a hierarchical model. Subjects of research, which consist of a lot of non-hierarchical relations, also cross-links between their elements might be better modelled in formats, which support network-like structures. But as mentioned, the theories for literary characters and their representation contain categories and hierarchical structures so that hierarchical methods are preferred.

If formats are only limited on a hierarchical structure and relations of super and sub class like in a taxonomy as defined in this thesis, this might not be enough for modelling objects of the theories which also have cross-links. For example, instances of different classes, which consist of related information of literary characters, might be linked to each other. Objects like properties, which attach additional information to instances, are also important. So, a single piece of information can be enriched with more aspects. In addition, the power of expressiveness, which contains disjointness or other expressions, might not be put in focus in a first development of a model for literary characters, but later, it can give ones a lot of control and precision to describe more aspects. Regarding a further processing, a usage of a genuine taxonomy would limit the range of applications. Although it would be possible to retrieve information, because of a missing framework of axioms, approaches using logics cannot be applied. Whereas in an ontology, both sides, humans and machines, could work on the stored data. Human users could observe a structured, hierarchical overview like in a taxonomy, but they could also gain more advantages like using properties. In addition, computational and (semi-) automatic approaches would also be possible, because of the inherited logic constructs. For this reason, the method of an ontology should be used to describe literary characters and their representation.

\[\text{158 for further information see Park and Hunting 2003, chapter 7}\]
Finally, the question arises if a format like RDFS or OWL (DL) should be used in this approach. It is reasonable to compare the OWL sublanguage OWL DL with RDFS, because OWL Full cannot be used for a further processing of the data and OWL Lite might be inexpressive to model a complex ontology. As mentioned, RDFS also consists of constructs, which might express a model of an ontology. But both standards have differences: “...OWL DL sind zwar syntaktisch reicher als RDF Schema, besitzen allerdings mehr Kardinalitätsbeschränkungen.”\textsuperscript{159} Eckstein and Eckstein refer to OWL constructs, which specifically relate for example classes to each other, like “same as” or “disjoint with”.\textsuperscript{160} OWL has a rich expressiveness to describe objects and their relations. In contrast to OWL, RDFS does not restrict for example cardinality, but it does not contain the full expressiveness. Because of further applications, it seems to be better to use the richness of the OWL vocabulary, even though some restrictions have to be accepted.

After the discussion of methods and models, ontologies should be more explored. It is reasonable to examine already realised ontologies. In addition, it will be discussed whether they or parts of their conceptions can be exploited for the ontology for literary characters.

### 3.3 Approaches using Ontologies

In this section, several recent developed ontologies are outlined, ranging from general ontologies (e.g. SUMO) to domain ontologies, as mentioned in section 3.2.3, and it is discussed how the ontology for literary characters might fit to or whether parts can be adopted from them. At

---

\textsuperscript{159}Eckstein and Eckstein 2003, p.275

\textsuperscript{160}Eckstein and Eckstein 2003, p.276

---
first, the more general ontologies are outlined; afterwards domain ontologies and finally the discussion are given.

SUMO (Suggested Upper Merged Ontology) belongs to the Standard Upper Ontology of IEEE and presents a “general” ontology: “The Standard Upper Ontology (SUO) will provide definitions for general-purpose terms, and it will act as a foundation for more specific domain ontologies.”\textsuperscript{161} This means that this ontology belongs to the so-called general ontologies. The intention of such an ontology can be explained as follows:

“The top-level ontology would then be designed to serve as common neutral backbone, which would be supplemented by the work of ontologists working in more specialized domains on, for example, ontologies of geography, or medicine, or ecology, or law, or, still more specifically, ontologies of built environments (Bittner 2001), or of surgical deeds (Rossi Mori et al. 1997).” (Smith 2003)

SUMO has been developed as follows: “The SUMO was created by merging publicly available ontological content into a single, comprehensive, and cohesive structure.”\textsuperscript{162} The ontology consists of basic categories, which try to capture a wide range of objects of the world. Objects are divided into two concepts, “Physical” and “Abstract”. The first category describes physical and concrete entities of the world. The category “Abstract” refers to units that contain abstract conceptions. Thus, modular ontologies can be created. On the web site of SUMO, a search for terms included in the ontology is available.\textsuperscript{163} The ontology is stored in OWL, KIF, LOOM, and other formats. Further information about this ontology will be given in the discussion about the different ontologies.

An ontology developed for the environment of the Semantic Web is the so-called DOLCE ontology (Descriptive Ontology for Linguistic and Cognitive Engineering). DOLCE is part of the project WonderWeb that tries to create ontologies for the support of the Semantic Web.\textsuperscript{164} In contrast to SUMO, in DOLCE, objects are classified as “endurants” and “perdurants”. These categories are described as continuants and occurrents: “Endurants are wholly present (i.e., all their proper parts are present) at any time they are present. Perdurants, on the other hand, just extend in time by accumulating different temporal parts, so that, at any time they are present, they are only partially present, in the sense that some of their proper temporal parts (e.g., their previous or future phases) may be not present.”\textsuperscript{165} Furthermore, properties of objects are defined as so called “qualities” and related to “quality spaces”.\textsuperscript{166} The qualities are treated separately to the endurants and perdurants. For the presentation of relations, a set of constructs like “temporary parthood” are available that mostly consists of part-whole relationships. DOLCE is available in the KIF and OWL format.

The GOLD ontology, “General ontology for Linguistic Description”, was introduced in the context of the EMeld project, which aims at the documentation and collection of endangered

\textsuperscript{161} Niles and Pease 2001
\textsuperscript{162} Niles and Pease 2001
\textsuperscript{163} \url{http://ontology.teknowledge.com/#browser} (last accessed August 20, 2007)
\textsuperscript{164} see Masolo, Claudio, et al. 2003
\textsuperscript{165} Masolo, Claudio, et al. 2003, p.15
\textsuperscript{166} see Masolo, Claudio, et al. 2003, p.16
languages. GOLD should serve as a basis for the standardised collection of language data in research work. Only a few general linguistic concepts are available, but it is scheduled that researchers include own categories that comprise the specific properties of particular languages. The ontology is built on SUMO, extending and modifying some SUMO constructs. A general division is reached by defining important linguistic categories: “The major subdivisions within the ontology include linguistic segments, grammatical properties and relations, and inventories.” According to suggestions in SUMO, entities are classified as “physical”, “feature” and “abstract”. Although the GOLD ontology is developed for a specific usage in linguistics, it inherits ideas from the general ontology SUMO. One can maybe regard the Gold ontology as a “general” ontology for a domain. GOLD is also stored in OWL.

One of the most known linguistic approaches using a taxonomy is “WordNet”. Recently, the authors of WordNet try to develop an ontology structure of WordNet. WordNet is developed at the University of Princeton as a semantic lexicon for the English language. It consists of categories for nouns, verbs, adjectives and adverbs. The so-called “synsets”, “sets of cognitive synonyms”, take an important role in the ontology. As mentioned on the web site of WordNet: “Since a semantic relation is a relation between meanings, and since meanings can be represented by synsets, it is natural to think of semantic relations as pointers between synsets.” This means that a word with more than one meaning is added to different synsets. A search for terms is available in the web. Based on the conception of WordNet, “EuroWordNet” is generated, a framework that consists of different lexicon databases for European languages, like “GermaNet” for the German language.

In the humanities, ontologies are also used for the support of research work. For example, in the “FDR/Pearl Harbor Project”, ontological sources are used to provide sophisticated retrieval in historical documents. The “DISCOVERY” project (Digital Semantic Corpora for Virtual Research in Philosophy) wants, among other aims, to create ontologies or thesauri for a semantic enrichment of “The Wittgenstein Archives at the University of Bergen” (WAB) transcriptions of the “Wittgenstein Nachlass” and works of other philosophers like Nietzsche. By bringing these systems together, a large information space for scholars in philosophy should be developed. Furthermore, in the HyperNietzsche project, “a virtual workspace with public access to original sources for Nietzsche research” is presented. There, a so called “Dynamic ontology”, “a standardized terminology and classification system, [...] also capable of expressing the changes which the objects of study and their relations undergo due to the growth of knowledge”, is developed to share information among researchers.

167 Farrar, Lewis, and Langendoen 2002
169 Farrar, Lewis, and Langendoen 2002
170 Farrar 2003
171 for example Gomez 1997
172 see http://wordnet.princeton.edu/ (last accessed October 30, 2007)
173 Beckwith and Miller 1990
175 Ide and Woolner 2004
176 Smith 2007
177 D’Iiorio 2003, p.179
178 D’Iiorio 2003, p.180
3.3 Approaches using Ontologies

Summarising, several other projects use an ontology for modelling different topics. Because of its popularity, one can assume that the method of an ontology will be introduced in more and more projects and disciplines dealing with semantic information. For a project, which aims at creating an ontology, it seems to be essential that one has to decide which kind of method and classification should be used before modelling topics. For example, projects like WordNet focus more on the relations of objects than on an elaborated hierarchy. Other projects like SUMO or GOLD take categorisation into account. The nature of the modelled topic mostly affects the selection of the modelling approach.

One can consider that most of these projects use the OWL language or other popular formats for modelling their ontology. It is an advantage using common formats so that e.g. data exchanges can easily be done. One can assume that many researchers have a general knowledge of the language specification of OWL. This observation can underline the choice of OWL for the ontology of literary characters.

A huge difference between the mentioned projects occurs in their categorisation or chosen elements for the ontologies. It seems that conceptual arrangements and graduations are often caused by the topic and its intended theories. One can group these ontologies into systems for a general classification and into systems for specific purposes. The question arises which kind of purpose should be fulfilled by creating an ontology for literary characters. This means that the ontology might belong to the specific domain of literature studies, especially literary characters and maybe narratology.

Nevertheless, one can consider if one can adopt categories of a general ontology like SUMO. Regarding the theories for a description and analysis of characters, which should be modelled in the ontology, such ontology would need categories, which contain different kinds of features and activities of characters. By investigating the OWL ontology of SUMO, which is available in the Internet, at first sight, one can observe that the category “Abstract” subsumes categories, which contain aspects like “InternalAttribute”. There, it might be possible to add inner and outer features of characters. Difficulties arise if one tries to add the different activities, e.g. verbal and non-verbal actions of characters, to categories of SUMO. In the main category of “Physical”, one can find the subsumed category “Process”. There, a wide range of different processes can be represented. They seem to be listed according to different perspectives like for example “SocialInteraction” or “ChemicalProcess”. Here, the developers of SUMO want to focus on nearly all-imaginable disciplines. It would be difficult to agree on single categories, which really fit to a description and representation of characters. All of these categories consist of distinctive aspects. If one just wants to express an action of character, one would do much effort of interpretation to specify actions. But at first, a detailed description of characters and not a complete interpretation is put in focus in this approach. If one would offer a categorisation, which already contains many interpretative aspects, one might be in danger that other researchers in literature studies would refuse to use such an ontology.

In this approach, it is intended to model theories for literary characters (cf. section 2). If one starts mingling categorisations of these theories with categories of SUMO, one might loose the focus on representing the theories. For example, one would have to spread character actions

\[http://ontology.teknowledge.com/#download\] (last accessed August 20, 2007)
over a lot of categories, but a common accepted division into verbal and non-verbal actions of characters like proposed by Nieragden in section 2.4, would not be presented by such an ontology. In addition, one would use categories, which might be developed for a categorisation of humans, but as stated in section 2.1, characters cannot be treated as human beings, because they just exist in the mind of the readers.

Another point of criticism is that general ontologies and especially SUMO claims to be general, but, as mentioned, it was built by merging a collection of other ontologies. In SUMO, there are probably a lot of important ontologies included. However, one can wonder whether these ontologies really fit to all topics and disciplines, which should be modelled by using an ontology. It seems that the specific tasks and problems of topics in literature studies and maybe also in other disciplines of the humanities, e.g. philosophy, are not taken into account. Things, which should be represented, might lose aspects by generalising them.

Furthermore, the idea of providing a common vocabulary to share compatible ontologies seems to be interesting, but it would not really make sense to compare or merge an ontology for literary characters with for example an ontology for genes or oil engineering. It is interesting to have different domain ontologies with the same vocabulary. But by this effort, one has to ask which ontologies should really be compared or merged together. It would be reasonable to interact with other ontologies in similar or related domains. But it is doubtful if in these ontologies, such a general vocabulary is used like the one presented in SUMO.

Another aspect is that even though categories suggested by a general ontology like SUMO are used for different domain ontologies, one has to be aware that the meaning of the terms of the categories can be treated in different ways. For example, in AI, the term “concept” is, as mentioned in section 3.2.3, used to define a class of an ontology, whereas in philosophy, concept means something completely different. There, it might be more an idea of something. One can assume that if researchers want to merge ontologies of different domains, such different treatments would complicate the process.

For these reasons, and because of the claim of modelling structures of literary characters, it is hardly possible to adopt classifications from a general ontology. Other ontologies, like GOLD or WordNet, are specific domain ontologies for linguistic purposes. Their categories and hierarchies also do not fit to a description of literary characters. But the idea of flexibility seems to be common in most of the projects: A set of basic categories is offered for holding a common structure, whereas graduation of further categories can be arranged more flexible. This is a useful aspect, which is also taken into account by creating an ontology for literary characters (cf. section 4).

Summarising the results of this discussion, one can state that it is rather difficult to adopt concrete categories from other ontologies. Nevertheless, general ideas of other projects can be taken to model the here presented ontology. Thereby, the following aims have to be regarded: It is intended to test and explore such ontology for literature studies. Thus, a requirement of individual usage is served. This is especially useful for the proposed approach. Instead of using the idea of an ontology in its strict sense, here, it is tried to test its flexibility, maybe also by reaching its limits and restrictions. This does not mean that it should be misused. The current implementation of the ontology pays attention to usability for human users. The
ontology should support their analyses of literary characters. Therefore, it does not serve as a strict knowledge base for logic-based applications as maybe in other projects. In contrast to other approaches, this approach is similar to Meister’s approach outlined in section 1.1, providing computer-aided text analysis. Primary literature, which plays an important role in projects working on digital text editions, is only related to the ontology. It is seen as a base for descriptions of literary characters. In the next chapter, a description of the own approach is given and more details of the structure of the ontology.
Chapter 4
A Formal Description of Literary Characters using an Ontology

In the last sections theories for the description and analysis of characters as well as basic principles and modelling languages for the information representation are described. In this section, theories and methods from both disciplines - information representation and literature studies - are brought together. For constructing a detailed classification of literary characters, this thesis uses several approaches to analyse and describe literary characters. The term classification is used according to how a class in an ontology is defined. This means that a class presents a type of container or set of objects, which have the same features. In this way, classification is defined as a graduation of features and actions of literary characters and not as a valuation.

The goal of this approach is not to develop a complete new theory of literary characters, but to bundle different theories together in order to create an ontology. A system should be realised that can comprehend and characterise characters in detail. The different approaches used form a basis for the conception of this ontology.

4.1 Modelling Theories of Literature Studies by an Ontology

According to Jannidis’s work, a character constitutes as a mental representation (cf. section 2.3) whereas Nieragden describes a categorisation for the description of literary characters (cf. section 2.4). Lotman instead, forms characters as a bunch of features (cf. section 2.2). Although these three theories developed in literature studies seem to be different, they will be merged in this approach to form a formal description of characters. By introducing an ontology, it provides us with a formalism to structure information hierarchically. The classes and sub classes of an ontology form a skeleton, i.e. a model, whereas instances represent single pieces of information of the actual modelled objects. In addition, an ontology allows for so called properties that enable links between the instances as well as the annotation of further information to an instance. By this, an ontology seems to be a powerful tool to model literary characters.

In this approach, the class hierarchy developed reflects Nieragden’s categories. Instances in the ontology represent detailed information of a literary character, usually included by a reader.
and thus, are pieces of the reader’s mental representation. By such combination of class hierarchy and instances, the here described approach forms a bunch of features or the information structure, describing the character, following the theory of Lotman. In the following, the terms mental representation and (formal) description are equally used, because by describing a character in the ontology, a reader expresses his/her mental representation.

In this work, properties provided by the ontology are used for two aspects: (i) capturing further information about the characters, e.g. narrative and descriptive aspects and (ii) so called ‘administrative’ information, e.g. like the name of the reader. By the latter it is possible to allow for different mental representations of the same character since single representations can be identified easily by such properties. Figure 4.1 depicts the idea of the developed ontology.

Also, it could be argued that since the ontology developed here cannot represent the reading process directly, other systems might be more reasonable. However, the ontology and its applications are aimed at a platform for comparisons and discussions about the description and analysis of characters. A user, who has added a character to the ontology, is also seen as a reader of the respective text. Different views on characters are desirable and thus not excluded, since they can give insight into particular mental representations. Even more, for comparisons of characters and/or mental representations, it is essential to have a formal basis of categories. By the developed ontology, such prerequisites are fulfilled. Therefore, storing mental representations separately is not necessary. By using the ontology, one should note that it is tried to describe representations of characters in a more neutral way and to avoid
4.1 Modelling Theories of Literature Studies by an Ontology

deep interpretations. Using the mental representations stored in the ontology, interpretations can be performed.

Besides the reader perspective, in literature studies also the author perspective is of interest. One can imagine that an author, who wants to structure and describe his/her own characters, can also use the developed ontology. Achieving a more detailed description of mental representations, these have to be categorised. According to Nieragden, and partly to Lotman, literary characters consist of different parts like the composition of outward and inner features, their behaviour, and actions. Here, the phenomenon of a character and the mental representation are merged together, because a character outside a human mind is not possible. Even in a more biographic novel combined with historical events, characters stay a product of fiction. Fiction, like books or films, sometimes combined with soundtracks, is formed by letters and pictures. A performance in a theatre also contains pictures, but they are not communicated by media, but directly by an actor to the audience. These forms of fiction could only be communicated by a kind of presentation otherwise they would not exist. As Jannidis reports, information about characters can only be achieved by a complex process of reading. This communication process starts from a single letter, via sentence forming and semantics to an imagination of a character. Even if a real actor portrays a character, it only exists in the imagination, a role that the actor plays guided by a director. This can also be seen as a rather complex communication process between different kinds of entities (author, narrator, director, actor, etc.) and readers (or audience). One can look at a character as a model of a creature, equipped with human or human-like properties. It is interesting to what extend characters, which push the limits of human conceptions, can be constructed, because it seems that this would overreach the imagination of both, author and reader.

As mentioned, this thesis develops the idea of a mental representation of literary characters, this representation by viewing it as a set of features. For structuring and describing character information, an ontology using OWL is created. The main classes of this ontology represent basic features of a literary character, like attributes and actions. These classes contain subclasses, which allow further classification of the features of characters. One should notice that these classes form a general structure, which can belong to several characters. On a deeper level of the class hierarchy, example classes are attached to represent special features or actions of the characters of the example corpus. The ascription of a specific feature or information about a character is realised through instantiation. For example, a feature of a character, e.g. special clothes or a specific disposition, can be described by a reference in the form of an instance. Each instance of the ontology is attached to one specific class. This class collects all individual instances under a general concept. Classes may be grouped under parent classes and so forth, forming a tree-like hierarchy.

By adding further information to the instance, a description can be enlarged. In contrast to other ontologies, one instance refers to a single piece of information of a character and not to the whole individual. Taken together, the many instances that refer to the same character form the complete information structure of a character as perceived by a single reader/user. Because of the complexity a character representation has, different meta-levels like content information, level of narratology elements, and encoding information are introduced.

\footnote{Jannidis 2004, pp.114/115}
Developing a further sub classification using the stated theories cannot be achieved, since the approaches describe only general classifications of characters. Because of this lack of categories, which could capture more character details, sub categories are introduced to help describe selected characters of an example corpus introduced in section 4.3. The selected characters are all devil characters found in the context of the so-called Faust literature. By analysing these characters, differences as well as similarities can be more readily considered. This analysis will be provided with descriptions of these characters, which are included in the ontology. Additionally, the development of specific categories for these characters should serve as examples of how the ontology can be enlarged.

In the next section, an outline of important main and sub classes developed for the description of literary characters that are included in the ontology is given.

4.2 The Categorisation of Literary Characters for a Formal Description

The ontology constructed should contain as many different characters as possible. Therefore, general features are placed in relation to the main classes of the ontology. On the top level, the ontology divides information in general notes, for example information about the text edition has been used, and all kinds of information belonging to a character. In accordance with Nieragden’s categories, the subclasses of this class consist of main attributes of a character that are divided into “features” and “acts” (cf. Fig. 4.2). On this level of the ontology, two further classes are available. The class “statement about the analysed character” should contain all statements about a certain character given by others, e.g. other characters appearing in the text. These statements are more complex than normal descriptions of a character and often communicate an opinion. There are differences between statements and descriptions. If for example in the Faust work of Nikolaus Lenau, Faust’s famulus Wagner says about the devil Mephistopheles: “Welch ein Gesicht, so fahl und grimmig kalt!” (Lenau 1910, l.223), in this way, he assesses Mephistopheles’s outward features. Instead, a normal description would be: “Aus roten Augen blitzend,/ Sieht einen schwarzen Pudel/ Das bange Bauernrudel...” (Lenau 1910, l.885-887) But it can also occur that a description is mingled with an opinion in which case it is necessary to add this kind of information to different categories. Statements are not further granulated, because it is difficult to differentiate them according to elements of opinions. The last class on this level is “general_notes about the analysed character” which contains personal information like the name or title of a character.

The features of a character are divided into inner (“inside”) and outer features (“outward”) (cf. Fig. 4.4). Inner features can include “character_features” and “emotion”. These classifications follow Nieragden’s divisions. Outer features are separated into “body_feature” and “clothes”. The class “act” is subdivided into “action_and_behaviour” and “speech_and_thought”. This classification adopts categories of Nieragden’s approach where actions are seen as physical

---

181 see Zöllner-Weber 2005
182 Nieragden 1995, p.61
4.2 The Categorisation of Literary Characters for a Formal Description

formal_description
character
    statement_about_the_analysed_character
    features
    act
    general_notes_about_the_analysed_character
    general_notes

Figure 4.2: Main classes of the ontology. These classes contain general features and actions of characters.

features
    inside
        character_feature
        emotion
    outward
        body_feature
        clothes

Figure 4.3: Sub classes of the class “features”. These classes graduate characteristics, inner and outer features, of characters.

actions and speech actions.\textsuperscript{183} As Werner Kummer states, actions and inner features often occur in a dialectic coherence.\textsuperscript{184} Therefore, relations between instances of the two classes can be constructed.

Acquiring different kinds of action, three categories according to own propositions of the author of this thesis are available: “act\_on\_object”, “act\_on\_subject”, “act\_on\_oneself”. They can show how a character acts and reacts in relation to other characters and its fictive environment. These categories can also be related, for example, when a character interacts using an object on another character. This combination can give important results about character relationships, e.g. when a devil character, which uses magical objects to influence others, only acts indirectly on them in order to conceal his intentions. The class “act\_on\_oneself” can contain actions only related to oneself, like changing clothes. The class “gesture”, another class on this level, takes an exceptional position. It is difficult to decide whether a gesture is directed towards someone. Because of this difficulty, gestures should belong to their own class.

Because of the enormous speech repertoire of characters, verbal actions are structured by subdivision (cf. Fig. 4.5). Some kinds of speech can be regarded as comments or statements about a special topic, problem, or another character (“statement\_commentary”). For example, Goethe’s Mephistopheles often comments the behaviour of other characters, like Faust, or events on the stage.\textsuperscript{185} Other kinds of speech are explanations or reports in which a character can explain something or can report things that occurred outside the plot. Further subdivisions

\textsuperscript{183}Nieragden 1995, p.38
\textsuperscript{184}see Kummer 1975, p.24
\textsuperscript{185}for example Goethe 1985, l.2627/2628, 3366-3373
Figure 4.4: Sub classes of the class “action and behaviour”. These classes graduate actions and behaviour of characters, like different actions or gestures. The example class, which is created for the characters of the example corpus, is marked with “+”.

like offerings, callings, admonitions, and reminders do not contain general verbal actions. They contain special speech that is necessary for the description of the selected devil characters. These classes can hold verbal actions for specific groups of characters like devil characters and serve as examples of how the hierarchy can be enlarged. The subdivisions of speech action can give information about the behaviour of a character in conversations as whereas which speech parts are attributed to it.

Figure 4.5: Sub classes of the class “speech_and_thought”. These classes graduate speech and thought of characters. Example classes, which are created for the characters of the example corpus, are marked with “+”.

Regarding the different relations previously mentioned in section 3.2.3, one can state that the top-level of the ontology is organised in part-whole relations. This means that characters consist of features, actions, etc. The sub-organisation of the ontology is organised as more isa relations, like a character feature is a kind of feature or a statement is a type of speech. A complete list of current classes is given in the appendix C.

In addition to the classes of the ontology, properties are created which can be attached to possible instances. The properties contain, as mentioned, information about the encoding level, the level of narrative techniques and one of the content. The encoding level supports administrative aspects like information of users who created instances.

By adding information to properties, the formal organisation of character representations can be comprised. For example, information whether a statement about a character is given by
a narrator (differentiable into narrator with external viewpoint, third-person narrator, or as first-person narrator), another character, or by the character itself. It is guaranteed that each piece of information about a character can be assessed easily, thus, a subjective statement by a character about another one possesses a different significance than a statement by an objective narrator.

All kinds of features and actions can be typed according to their degree of individuality. For example, features, which are unique, can be assigned with the property “individual”. If a character consists of typical traits, information about it can be ranked as “type_or_stereotype”. For example, early presentations of devil characters are equipped with rather stereotypical features and actions like transformations to dragons or monks. These characters only have a few and constant features. Information about their inward features like emotions or character features is excluded or only stereotypical. One can assume that some characters are more types or stereotypes than others. But because of specific expectancies of readers, authors might use clichés so that most of their characters consist of typical features. In the ontology developed here, characters are not completely ranked as types, because it might be the case that rather typical characters also show unique aspects.

Furthermore, a property is available whether a feature of a character is changeable. This shows and supports information of developments of characters during a plot. Extreme examples are so called coming-of-age novel. There, characters pass through a development and change their features. Without such property of the ontology, it would not be possible to include such changes in a static hierarchy. But one should note that a representation of a character could only arise by an entire description, which includes all features.

It might occur that direct descriptions of a character are not possible, because interpreting other information can only conclude some information. If a character beats another, one can assume a kind of violence as a part of its character features. But it is not directly mentioned that the character is violent. Using the property “indirect_interpretational_feature” can mark this kind of classification.

Properties used for describing the context of speech are also available. Speech actions can be marked whether they are performed in a dialogue or monologue as well as by an addressee. In addition, it is possible to note whether these kinds of actions are initiating or responding. This is a very important aspect of description, because this states something about the activity or manipulation of other characters. For example, characters can give more answers than questions, but this does not mean that their answers do not contain initialising intentions.

Apart from properties, it is also possible to include further information by relating instances to sections of literary texts, which express this information. Therefore, an additional XML element, “char:text_ref”, was introduced and added to the OWL vocabulary. The related text section(s) contain(s) the attribute “xml:id” according to the TEI scheme. Here, this attribute is used as an XML ID attribute which assures together with an unique value of the attribute that these text objects can be clearly identified. By adding “xml:id” to lines or sentences of texts, it is possible to identify them. The element “char:text_ref” containing the related value of “xml:id” serves as a reference in the ontology. It can be related to more than one instance.

---

186 see Schwitalla 1976, and Linke, Nussbaumer, and Portmann 1996, pp.279/280
Thus, a relation between instances and text parts, which contain same information, but is expressed in different ways, can be performed.

4.3 Introduction to the Example Corpus

The example corpus is a collection of literary texts in the context of the Faust story. They all comprise the motif of a pact between a Faust character and a devil. The corpus contains literature from different genres such as prose or drama and forms a time arch from the Early Modern Period to the 19th century. The texts containing the pact motif are of special interest, because they form a chronological line of texts with similar content that extends beyond genres and philosophical or social intentions. Their main characters all receive their motivation from the same background, the pact of a devil and a human. Only characters like Parcival, Tristan and Isolde, or Romeo and Juliet, which also appear frequently, present such a consistency through the centuries. In the following, the list of the selected literature is given:

- Historia von D. Johann Fausten
- Marlowe, Christopher: The Tragical History of the Life and Death of Doctor Faustus
- Klinger, Friedrich Maximilian: Fausts Leben, Taten und Höllenfahrt
- Goethe, Johann Wolfgang: Faust - Der Tragödie Erster Teil
- Goethe, Johann Wolfgang: Faust - Der Tragödie Zweiter Teil
- Lenau, Nikolaus: Faust

The first text is released in 1587 and is regarded as one of the first literary sources for the Faust story. The author is unknown, but without involving in a discussion about the authorship, one can say that the author was knowledgeable about scholarly books and other popular stories like Brant’s Narrenschiff or Hartmann Schedel’s world chronicle. As Frank Baron states: “...the anonymous author relied on writings of others to a considerable degree. [...] Thus, the Historia represents a work of compilation.” But he also explains that the author arranges the story by changing and transforming as well as copying passages from these sources. The story of Faust and the idea of a devilish pact is older than the first printed Faust book. In literature, a man called Faust who lived in Germany is often mentioned. There are also stories taken from the so-called hagiography writings of holy persons, which contain the pact motif. Pacts are also known in the Kabbalah and Talmud. One can say that the anonymous author mingled several sources and motifs to describe the life story of the magician Faust.

---

189 See Baron 1992
190 Baron 1992, p.95
191 See Wiemker 1961, p.XII
192 See Wiemker 1961, p.XXIV
The second text is the first drama about the Faust story by Christopher Marlowe. It seems that Marlowe comes in contact with the material by an early English translation of the Historia.\textsuperscript{193} Two versions (1604 and 1616) of this drama have been released. It can be assumed that Marlowe's drama is taken by travelling acting troupes from Great Britain back to Germany where the play or parts of it appear and are also transformed into plays for puppetry.\textsuperscript{194}

A larger time period separates Marlowe’s drama and the third text, Klinger’s novel (1791). The tradition of writing Faust stories does not stop after Marlowe, but writers are not that productive creating new variations of this material. Merely, repeating earlier themes and motifs is common.\textsuperscript{195} Klinger’s story presents the first novel in this development.\textsuperscript{196} The novel is released soon after Goethe’s fragment of his Faust drama. Thereto, Hans Jürgen Geerdts states: “Klinger wußte genau, daß er sich einerseits mit dieser Tradition auseinanderzusetzen hatte, daß er andererseits kurz nach dem Erscheinen des Fragments Goethes sich von jenem abgrenzen müßte.”\textsuperscript{197} Agreeing on this argumentation, one can add that in contrast to the other realisations of the devil and Faust characters, the devil in Klinger’s novel is called “Leviathan” and Faust is introduced as a typographer. In the analysis part of this thesis (cf. section 7.1.2), the differences between the conceptions of Goethe’s dramas and Klinger’s novel are investigated.

After Goethe’s fragment, the drama “Faust - Der Tragödie Erster Teil” is published in 1808.\textsuperscript{198} It is assumed that Goethe knows some material of the Faust story through puppetry.\textsuperscript{199} One can say that most attention in research is paid to this work and its second part, “Faust - Der Tragödie Zweiter Teil”, which is released in 1832. In 1836 after the release of Goethe’s two works, the complete Faust story of Nikolaus Lenau is printed, which is only partly printed before. The story is presented in a mixture of epic, lyric, and dramatic elements.\textsuperscript{200}

The example corpus is not arranged for the purpose of presenting a complete anthology, the text were chosen exemplarily from the Faust literature to test the selected theories for the description of literary characters.\textsuperscript{201}

\textsuperscript{193} see Hendel 1969, pp.13/14
\textsuperscript{194} see Hendel 1969, p.14
\textsuperscript{195} The Faust story appears in two kinds of performance: On the one hand, some writers arrange new editions of the story by repeating and copying, like Georg Rudolf Widmann or Der Christlich Meynende. On the other hand, there are several hints that a lot of plays telling the story of Faust and the devil are performed. But these plays are assembled from already existing sources.
\textsuperscript{196} Hendel 1969, p.15
\textsuperscript{197} Geerdts 1960, p.61
\textsuperscript{198} Hendel 1969, p.19
\textsuperscript{199} Hendel 1969, p.16
\textsuperscript{200} Sengle 1980, p.668
\textsuperscript{201} In the period of “Sturm und Drang”, further works around the Faust motif appeared, like Maler Müller “Fausts Leben dramatisiert” (1778). Especially after the middle of the 19th century, this motif is transferred into other forms of art like opera or ballet. Further, one can mention that the topic is highly varied or enlarged, like in Christian Dietrich Grabbe’s “Don Juan und Faust” (1828), Michail Bulgakow’s “Der Meister und Margarita” (1940), or Friedrich Theodor Vischer’s “Faust. Der Tragödie dritter Teil” (1862). In the 20th century, the novel “Doktor Faustus” by Thomas Mann becomes important because of its relations to WW II. Until today, authors, composers, and songwriters have picked the Faust story out as a central theme.
For detecting possible applications, the descriptions of devil characters found in the selected texts are integrated into the proposed ontology. At the moment, only the devil characters are described and included in the ontology. It is assumed that these characters have features in common, because their conceptions refer to the same or similar sources and traditions. Thereby, it is expected that common classes describing the literary characters in the ontology can be found.

During the centuries, a steady development of devil characters occurs and is influenced by philosophical schools, religious trends, and mythical images. So, differences and variations of the conceptions are expected making comparative analysis possible. Furthermore, this challenges a modelling using an ontology, having besides core classes also individual or flexible parts allowing for such variations in the characters.

Another reason for this selection is that the devil characters are a mixture of human-like, mythical and supernatural creatures and contain a huge range of features. For example, they are often depicted in human form, e.g. scholastic or monk, but also they appear as fantastic creatures, like dragons, or animals, like dogs. Thereby, it can be proven how features beyond human behaviour can be described. As mentioned in chapter 1, a goal of this thesis is to draw analytical conclusions about the characters by using the description and classification of the devil characters of the ontology.

To test the descriptive capability of the ontology, an additional character is introduced. The character is “the usurer” in the short story “The Mysterious Portrait” (1842) of Nikolai Gogol, which was first introduced as a portrait bought by a young artist. The specific attributes of this portrait are the nearly living and terrifying eyes of the portrayed man. The artist feels that he is strongly influenced by this portrait and starts to have visions in which the portrayed man appears. In the second part of this story, the man in the picture is presented as a usurer who wants to be portrayed by a locale painter so that he can stay alive through this picture. Two parallel descriptions of this character are included in the ontology, one by the author of this thesis and one by a trained colleague. In chapter 8, a comparison of these descriptions is given.

Up until now, further characters are described in the ontology. One is the character of a cleric called “Pfaffe Amis” which was described by a second colleague. This character appears in a Middle Age novel of “Der Stricker”. The life of the cleric is described in twelve stories. Mostly, situations are shown that present betrayals or tricks of the cunning character. Furthermore, a character called “Rat-Wife” appearing in the drama “Lille Eyolf” of the Norwegian author Henrik Ibsen is included in the ontology. In addition, the original text in Norwegian is related to the ontology. For testing an application described in section 6.2, the character Melmoth of the novel “Melmoth the Wanderer” (1820) of Charles Robert Maturin is also attached to the ontology.

After introducing the theoretical background of this thesis, in the next chapters, different methods and applications using the ontology are described. There, a more technical side of this approach is focused on observing methods for a further processing and conclusions about the efficiency and suitability of these methods concerning usages in the humanities are given.

Afterwards, devil characters of the example corpus are analysed and compared by incorporating the here developed ontology in the analysis proven.
Chapter 4 A Formal Description of Literary Characters using an Ontology
Chapter 5
OWL DL and Logics

Beyond structuring information by using an ontology, an important aspect of OWL ontologies is further processing of the included data. Because of their special nature, data in OWL is already structured hierarchically (super-sub class) and marked with semantic information. In comparison to other methods, ontologies, especially stored in OWL DL, consist of a framework of axioms. This means: “...OWL is a semantic web ontology language [...] whose the semantics can be defined via a translation into an expressive DL.”202 Thereby, querying such ontology based on logic reasoning becomes possible. Logic reasoning can be probably helpful (i) to check consistency during ontology development (ii) enables semi-automatic merging of (domain) ontologies as well as (iii) deduces hidden information contained in the ontology. Since the ontology for literary characters has been implemented in OWL, it seems to be reasonable to explore the possibilities of logic reasoning in the context of literary character analysis.

In general, by using logic reasoning, conclusions can be gained which are inferred from given information or other conclusions. In formal logic, given information is also called assumption. The operation is defined as conclusion. The methods induction203 and deduction204 are subsumed under the term of Logic Reasoning. Induction means inferring from special concepts to general concepts whereas deduction constitutes the opposite process from general concepts to special ones. Here, the conclusions can only receive the values true or false, unclear conclusions like in the Fuzzy Logic cannot be drawn. The assumptions of the induction have to be true so that a conclusion can also be constituted as true. The conclusion is called an inference.

To operate on data that is formatted in Description Logic, inference algorithms are developed. These algorithms are implemented in different programmes like for example DL reasoners, programmes which can query in OWL data. Before going on, a short summary of the Description Logic whose ideas are included in OWL DL is given. In sections 5.2.2 and 5.2.4 two applications for inferring on the ontology are outlined. Finally, this chapter closes with a conclusion summarising the results.

202Baader, Horrocks, and Sattler 2003, p.13
203Charniak and McDermott 1985, p.22
204Charniak and McDermott 1985, p.14
5.1 Description Logic

In the OWL specification, which is used in this work, logic-based methods as well as a kind of XML mark-up are included. Because of this special mixture, the comprehension of OWL seems to be a little bit difficult. But the knowledge of OWL is essential for understanding further applications applied in this approach.

In 1980, DL was developed on the base of semantic networks and frames. This term is used as a superordinate concept for a language family that contains logic-based representation languages. These languages allow a structured information representation. Baader et al. state: “In a logic-based approach, the representation language is usually a variant of first-order predicate calculus...” This means that the constructs of DL are related to the first-order calculus. For this reason, applications based on logic formalism like reasoning can be performed.

In DL, the information is mostly divided into concepts, roles, and individuals. The concepts form a structured terminology, which is defined as a TBox (terminological box) in DL. The main structure of a TBox is the subsumption. This means that general concepts include more special ones. Individuals in DL are integrated in a so-called ABox (assertional box). An ABox contains information of the modelled extract of the real world and can be seen as its description. Baader et al. also explain that the roles can be used to show relations between single individuals. Thus, individuals of an ABox are supplied with a name. It is possible to allocate properties to them.

The semantic of TBox and ABox is similar to a set of axioms of the first-order calculus. Their implicit information can be made explicitly by drawing inferences.

5.2 Logic Reasoning

In this section, possible applications using logic reasoning on OWL ontologies are presented. As Baader, Horrocks, and Sattler mention, logic reasoning can fulfil different purposes in the phase of creating an ontology and in the phase of using it: “During ontology design, it can be used to test whether concepts are non-contradictory and to derive implied relations. In, particular, one usually wants to compute the concept hierarchy, i.e. the partial ordering of named concepts based on the subsumption relationship.” This means that by using logic reasoning, one can investigate the structure of categories, here called concepts, and to test if every object is used in the intended and not contradictory way.

Retrieving the concept hierarchy and subsumption relationship might be useful to train machines. In automatic or semi-automatic approaches, machines can query for objects and their treatment in a specific scenario. If these machines can query an ontology by logic reasoning, they are able to find which object is subsumed by another or which objects are related to each

---

205 Baader et al. 2003, p.2
206 see Baader et al. 2003, p.46
207 see Baader et al. 2003, p.61
208 Baader, Horrocks, and Sattler 2003, p.4
5.2 Logic Reasoning

other. Afterwards, they can produce suggestions to support problem solving in the specific scenario. But because of the specific task of the here presented ontology, the support of a human user, such approaches can hardly be transferred to it.

In the second phase, after creating a domain ontology, consistency checks can again be performed by using logic reasoning. In addition, applications as follows can be performed: “...one could, for example, use the ontology to determine the consistency of facts stated in annotations, or infer relationships between annotation instances and ontology classes [...] when searching web pages annotated with terms from the ontology, it may be useful to consider not only exact matches, but also matches with respect to more general or more specific terms...”\(^{209}\) This might be an interesting aspect, but it also intends that text annotations contain terms that also are stated in the ontology.

Relating this application to the ontology for literary characters and their mental representations, information about characters has to be marked both in the ontology and literary texts. Here, the question arises whether this would be a redundant and time-consuming work. If one selects sources like ontologies and texts that are annotated by different persons, it could also occur that the terms marked in the text and the ontology do not fit together. It could also be possible that different, but synonym terms are used in both sources. But then, it will be assured that in a logic reasoning process, the synonymy of these terms has to be identified. If the relations of these terms in the ontology and the text are different, similar objects or terms cannot be identified, even though they are synonyms. If so, one might have to consult a third source like a thesaurus, which can associate synonyms. Altogether, it could require setting up a rather complex system.

But another interesting aspect might arise by merging or mapping ontologies. The tasks of merging/mapping is described as follows: “The user must establish correspondences among the sources ontologies, and determine the set of overlapping concepts [...] The reconciliation must be done regardless of whether the ultimate goal is to create a single coherent ontology that includes the information from all the sources (merging) or if the sources must be made consistent and coherent with one another but kept separately (mapping).”\(^{210}\) This would be rather interesting if two or more domain ontologies for one topic exist; all of them describing only a few aspects of the overall topic. A merging or mapping may result into a complete description of the topic.

One could also imagine that in an approach dealing with the representation of literary characters, several ontologies are developed and each presents a single representation. Then, a merging would be rather interesting to find general categories or to gain knowledge about the differences of representations. But such an approach is not intended in this thesis and therefore, it cannot be performed (cf. chapter 4).

For the ontology for literary characters, it might be useful whether two persons add categories with the same or similar meaning to the ontology, to produce suggestions for a mapping. However, then a relating mechanism has to be implemented, because the relation of synonymy

\(^{209}\)Baader, Horrocks, and Sattler 2003, p.4

\(^{210}\)Noy 2003, pp.18/19
is not included in the ontology so far. But it is doubtful whether a single reasoner can solve such problem in case of this ontology.

All these applications are useful for the development and usage of ontologies, but at the current state of the here presented ontology, it seems unlikely to realise them. Unfortunately, to the author’s knowledge, there are no other ontologies in literature studies which deal with literary characters or narratology and which could be related to this ontology. Nevertheless, it is tried to do logic reasoning on the ontology. One should note that the testing of logic-based approaches concentrates on a usage by humans and not by machines. An aim is to exploit results of logic reasoning for humans. For this reason, a catalogue of hypotheses for the testing is given in the following.

5.2.1 Hypotheses

As outlined in the last section, it is of interest which kinds of results can be gained from the ontology for literary characters by applying logic-based applications. These applications are based on Racer, an inference machine, and Prolog, a logic-based language. In the following, different tasks related to logic-based queries relevant to literary character analysis are outlined. Based on this set, Racer and Prolog will be evaluated in the next sections.

Retrieval of

- individuals that belong to a given class
  - The results should provide information about the relationship between special classes and their instances so that it is possible to observe information of a character like which character has information (feature, action, etc.) in this specific class.

- individuals that contain a given property (and maybe a given value)
  - The results should give information about the relationship between instances and special properties and to which class the instance belongs so that the apportionment of additional information can be focused on: Which information of a character has additional information stored in properties? What is this additional information? And to which category is the information attached?

Bottom up/ Top down

- This should show the relationship of classes and their super classes. Thereby, the arrangement of the features/ actions of characters in the mental representation should be given.

5.2.2 Testing an Inference Machine for Ontologies (Racer)

Before testing Racer, a short summary of its structure and functions is given. The name of the programme Racer stands for Renamed ABox and Concept Expression Reasoner Professional
and it was developed by Racer Systems, Hamburg.\(^{211}\) This programme is based on the concepts of DL and offers inference mechanisms for applications of the semantic web like ontologies.\(^{212}\)

In Racer, an interface to OWL data is implemented which allows loading, querying, and performing consistence checks. In addition, a simple editor is offered which can handle ontologies in different formats.

Figure 5.1: Extract of the Racer inference machine. Here, a graphical view of classes in a TBox is shown.

The different constructs like roles and individuals are presented in separate windows. Drawing inferences in a TBox and ABox is also done separately. As mentioned in section 5.1, a TBox consists of a structure of subsumption. By applying it to an OWL ontology, all classes are represented in a TBox, whereas instances or individuals are stored in an ABox as the description of things of the world.

The language \(nRQL\) has been developed to draw inferences with OWL and RDF.\(^{213}\) The queries in \(nRQL\) consist of a predicate, a list of objects, and a query body similar to constructs in first-order calculus. The queries for a TBox and ABox differ in their primitives and are defined separately. To give an example of such query, an ABox query executed on the ontology for literary characters is given below asking for individuals of the class \(on4\_general\_notes\).

\[
\text{RETRIEVE}(?X)(?X | http://www.figureontologie.de/unnamed.owl#on4\_general\_notes|)\]

Figure 5.2: By this query, possible individuals of the class “\(on4\_general\_notes\)” can be retrieved. \(\text{RETRIEVE}\) is the keyword that something should be queried. \(?X\) is an injective variable, which is bound to the class.

\(^{211}\) Haarslev and Möller 2004

\(^{212}\) see also Haarslev and Möller 2004, p.163

\(^{213}\) see RacerPro Users Guide Version 1.9 2005, p.87
The queries can result in different conclusions, either the names of included objects or Boolean values (true or false) can be returned. For specifying queries, two different types of variables are available. The injective variables (?X) are bound to an ABox individual, the general variables ($?X) do not have any bonds.

TBox queries can be stated by using similar constructs. They begin with TBOX-RETRIEVE and similar to an ABox query, a list of objects is given afterwards. Then, the query body is given. The described options are only single parts of the Racer tool. There are further options to manipulate (OWL) ontologies. The Racer tool can be useful by checking consistence of ontologies so that further processes can be performed without problems concerning the syntax and semantic of an ontology. Furthermore, Racer supports different overviews of an ontology. An ontology can be inspected by querying it, but a graphical view of elements included in a TBox (classes) or ABox (instances) is also available (cf. Fig. 5.1). After the introduction of Racer, the test of this programme is outlined in the following.

According to the stated problems, it was tried to query for results and to prove possibilities by using Racer. Although it was rather time-consuming to study nRQL and correct notions on the interface of Racer, it turned out that most of the given problems can be handled by Racer. Some of these queries are given in the following figures.

```
(RETRIEVE
 (?X (TOLD-VALUE ((|http://www.figureontologie.de/
 unnamed.owl#storytitle|?X)))
 (?X |http://www.figureontologie.de/unnamed.owl
 #on43_statement about_the_analised_character|)))
```

Figure 5.3: In this query, it is asked for instances that belong to a special class and contain a special property. Here, it is searched for instances that belong to the class “on43_statement about_the_analised_character” and have the property “storytitle” which is defined as TOLD-VALUE. This property belongs to the datatype properties of OWL. For this reason, it is necessary to use so called head projection operators.

```
(RETRIEVE(?X
 |http://www.figureontologie.de/
 unnamed.owl#ins7 about_the_black_poodle|)
 (:TOLD-VALUE
 |http://www.figureontologie.de/unnamed.owl#storytitle| ?X))
 ("Faust Der Tragoedie Erster Teil")
```

Figure 5.4: Here, it is queried whether the instance “ins7 about_the_black_poodle” contains the property “storytitle” with the value “Faust Der Tragoedie Erster Teil”. By declaring a variable for the query, TOLD-VALUE is bonded to the objects. In this query, the told value is the datatype property “storytitle”.

One should note that the combination of an ABox with a TBox is in principle possible. But therefore, an additional Java programme has to be added to Racer. This possibility was
5.2 Logic Reasoning

introduced after the test phase. Without this script, it is not possible to combine a TBox with an ABox.

By querying classes in a TBox, it is also possible either to retrieve all sub classes of a given class or its super classes. More queries are given in appendix D.1. After the description of queries in Racer, the usage of Racer in combination with DL is discussed in the following.

5.2.3 Discussion of DL and Racer

The conclusions drawn in the previous section cannot be generalised, because the options of Racer are analysed in context of the ontology for literary characters. In general, one can say that by drawing inferences, not completely new information can be generated. But regarding huge ontologies, it might be useful to navigate through a mass of data by querying so that it is possible to retrieve more specific objects. Though, by using an ontology, information can be structured in a stable hierarchy and one can achieve a better overview of the data by querying.

The option of drawing inferences is given by the special conception of Racer, but by using an inference tool, the scope is restricted and cannot be enlarged. A user is reliant of logic constructs that result in precise conclusions, but these constructs do not allow unclear queries like e.g. in Fuzzy Logic.

One can state that the choice of methods and tools should depend on the consideration which applications are required and if a logic-based application like Racer is adequate. In this approach, drawing inferences is only regarded as one part of the applications, because all searches and retrievals are not completely covered by using an inference tool. As mentioned, a human user has been focused in this investigation. For this reason, some aspects concerning a usage by a human have been taken into account. One difficulty is the familiarisation of the construction and syntax of DL/ nRQL. If a user is familiar with logic methods, it might be easy to combine the different components of a query in nRQL. The mental transfer from a classification in OWL to a TBox and ABox in DL might also be possible. The query language nRQL is developed for a usage on DL so it contains the ideas and constructs of it. But if a user is not familiar in such formal logic constructs, the usage of Racer would include a lot of work. The usage of nRQL and Racer contains an immense potential of possibilities, but because of its special construction and syntax it can overstrain users. It would be desirable if not all parts of the queries have to be typed in manually and if precast parts are available and can be combined individually. One should note that OWL DL is used in many research works, but the knowledge of formal logic cannot always be assumed. Although the stated problems of the task catalogue can be solved by using Racer, the effort of handling queries in Racer is rather time-consuming. This could also lead to a refusal of OWL as a representation format. Most of these outlined aspects certainly should be only regarded in context of usability by a human. By no means, this is a drawback of DL.
5.2.4 Inferences with Prolog

Another possibility of drawing inferences is given by using the language Prolog which offers helpful options to handle logic-based constructs. The name Prolog stands for PROgramming in LOGic or the French phrase programmation en logique. Prolog can be used for several purposes, like logic, symbolic computation, natural language processing, abstract problem solving, etc. It is based on first-order calculus so that it is possible to do a “logic programming”. Its general concepts are unification, backtracking, and (tail) recursion, operations, which are especially useful for taxonomies (and also ontologies). The design of a first version that was developed by Alain Colmerauer in the beginning of the 1970s was focused on Natural Language Processing. There are several projects and applications in computer linguistics and AI, which use Prolog for different purposes. In addition, inferences can be drawn by using a parser that operates a Prolog script on a so-called Prolog fact base.

Because of the closeness to natural language, Prolog constructs differ from other artificial languages, nevertheless the Prolog constructs express the same. In the following, main constructs of Prolog are described.

Data in Prolog consists of facts and rules. The facts can be seen as a vocabulary on which Prolog can work. By defining the facts so called predicates with arguments are included to describe the knowledge that is given in Prolog. Prolog operates with the closed world assumption. This means that Prolog can only answer queries positively if the fact is included. If Prolog gives a negative result, it is not intended that the query is false, but for Prolog it is false, because there are no facts. The syntax of Prolog is easy to understand. A predicate is defined by giving a head and arguments. This could look like the following example:

```
character(mephistopheles).
```

Figure 5.5: The name of the predicate is given at first place. In brackets the arguments are declared. Here, only one argument is given. The fact can be translated in the sentence “Mephistopheles is a character”.

To ask for unknown objects, variables, which are posed as placeholders, can be used. Queries are answered by Prolog until the parser has executed every fact. A fact base alone does not offer a huge expressiveness so that rules should be added. Rules can enlarge the fact base so that different relationships and combinations between the modelled objects can be reached.

Using Prolog as an inference machine for ontologies, the Prolog parser SWI-Prolog and its modules can be used. All these modules are Prolog data so that they can be loaded easily.

---

214 Colmerauer and Roussel 1996
216 See also Clocksin and Mellish 1981, p.VI
217 Colmerauer and Roussel 1996
218 For example the project Sekimo (Secondary structuring of information and comparative analysis of discourse) at Bielefeld University, see also Goecke, Naber, Witt 2003
219 See Charniak and McDermott 1985, p.504
220 http://www.swi-prolog.org/ (last accessed October 30, 2007)
in the SWI-Prolog parser. There are modules which can handle XML/ RDF data and one which can do queries on RDFS/ RDFS data. Since OWL is based on RDF(S), one can also use this module to query an OWL ontology. By transferring an ontology, the module models the data as triples. This means that every fact is stored as a predicate with three arguments in a Prolog fact base. The module can give answers about the relations between classes, properties and instances. All the defined elements can be retrieved by using predefined predicates of the module. But there are also options to modify the fact base of the ontology and to include new triples.

Queries, which were executed on the ontology for literary characters are given in the following figures.

Figure 5.6: Query for instance-class relation. Here, it is queried for every relation between classes and instances. “rdf” is a pre-defined predicate included in the RDF module which can be used for every relation between the elements of an ontology. In brackets, the triple of the arguments is given. The variables are stated in big letters.

```
rdf(INSTANCE,'http://www.w3.org/1999/02/22-rdf-syntax-ns#type',CLASS),
rdf(CLASS,'http://www.w3.org/1999/02/22-rdf-syntax-ns#type','http://www.w3.org/2002/07/owl#Class').
```

Figure 5.7: Query for instances that belong to one class. It is queried for instances of the class “#on27_action_and_behaviour”. “rdf_has” is a pre-defined predicate included in the used module. In brackets, the triple of the arguments is given. The variables are stated in big letters.

```
rdf_has(X,Y,'http://www.figurenontologie.de/#on27_action_and_behaviour').
```

Figure 5.8: Querying for super-sub class relations. Here, it is queried for hierarchical relations of classes. The “rdf_has” predicate is again used. The classes represented by the variables (SUBCLASS, SUPERCLASS, etc.) are related to each other by using the relation “subClassOf”. The query can return not only a class contained in another. It should also return the class which subsumes the super class of the first sub class.

```
rdf_has(SUBCLASS,'http://www.w3.org/2000/01/rdf-schema#subClassOf',SUPERCLASS),
rdf_has(SUPERCLASS,'http://www.w3.org/2000/01/rdf-schema#subClassOf',SUPERSUPERSUPER),
rdf_has(SUPERSUPER,'http://www.w3.org/2000/01/rdf-schema#subClassOf',SUPER).
```

By combining the predicates, a wide range of different queries can be supported (see also appendix D.2). All of the stated problems could be solved by using the module “rdf” of SWI-Prolog. It is especially useful that queries that are more focused on the proposed ontology can be combined in different ways so that results can be solved.
In the next section, advantages and disadvantages of the usage of Prolog are discussed. Afterwards, a short comparison of Racer and Prolog is given.

5.2.5 Discussion of Prolog

By using SWI-Prolog and its modules, capabilities of a full inference machine can be achieved. Queries for classes, instances and properties and also combined queries are possible so that a good retrieval can be reached. As mentioned, all stated queries could be performed.

In combination with its several modules, SWI-Prolog offers a large range of manipulating data not only for ontologies. So, it is not necessary to build own Prolog scripts to produce queries. But also own scripts can be included if necessary.

One can also imagine that different sources like two OWL ontologies or an ontology and textual data encoded in XML can be loaded in SWI-Prolog for querying. For example, if the ontology for literary characters and a literary text are stored as a Prolog fact base in SWI-Prolog, it could be possible to develop queries searching same material like names or keywords. But thereby, detailed encoding of the ontology and the texts is required. Some problems concerning such applications are already stated in section 5.2.

Unfortunately, by using SWI-Prolog, users have to know how to query in SWI-Prolog. In the pure parser, there is no graphic interface and all the queries have to be typed in manually. In addition, the results might be a little bit difficult to read if not familiar with the syntax of Prolog. For this reason, users who want to use SWI-Prolog should have a good knowledge of the language. Otherwise, the construction of the queries might be difficult. Furthermore, the representation of the objects of an ontology in Prolog differs from the representation in OWL.

5.2.6 Comparison of Racer and SWI-Prolog

At first, one should say that a huge difference is that SWI-Prolog can be used for more than drawing inferences. It is a parser that can handle all kinds of data that is transferred to a Prolog fact base. The inference mechanism is more a by-product. In contrast to Prolog, Racer is only developed to offer an inference machine.

Both of them have their own representation and syntax so that users who want to do queries should know the query structure. For this reason, the OWL data is also transferred to the special representation of the programmes. The two programmes also use different logic concepts. In Racer, the constructs of ABox and TBox are included; Prolog consists of a variation of first-order predicate logic. But it should be noticed that in Racer, some theoretical aspects and ideas discussed in the literature, might not be implemented yet. For example, to combine an ABox with a TBox, it is necessary to attach an additional Java programme. Prolog offers different modules to operate on RDF/OWL data. Actually, a complete implementation for OWL is not included yet.

Nevertheless, one can imagine that ideas stated in section 5.2 – e.g. investigating and checking the ontology or supporting mapping and merging processes of ontologies – are possible.
As mentioned, the two presented applications could give results according to the criteria in section 5.2.1. But at the current state of the here presented approach, more processing using applications of logic reasoning do not lead to further results.

As already mentioned, the applications were tested regarding a usage by humans, especially by researchers in the humanities and literature studies. Taking this aspect into account, one can state that Racer and SWI-Prolog differ from each other by their design. In Racer, a graphical user interface is integrated. Ontologies can also be shown as graphs. Racer offers different ways of manipulating ontologies. But it can only be queried by using the language nRQL, which has to be typed in manually. The parser SWI-Prolog does not provide any graphical support, which also means that queries in Prolog have to be typed in. This seems to be a disadvantage for users who are not familiar with these different languages. It might also limit further applications of ontologies, like logic reasoning. But such problems could be solved by developing a better support of human users, e.g. graphical interfaces, or by avoiding a fully manual typing.

In summary, one can say that both programmes are useful for logic reasoning. They both have advantages and disadvantages, especially formulating queries seems to be difficult. If someone is interested in more graphical representations of ontologies, Racer seems to be a better choice. If one is interested in combing or integrating logic reasoning with other applications, it might be good to use Prolog, because there, it is easy to include own scripts which can be used in combination with SWI-Prolog.
Chapter 6
Manipulating of and Information Retrieval in the Ontology for Literary Characters

In this chapter, two own developed applications, a client-server system\(^\text{221}\) and semi-automatic assignment for instances, are presented. Both allow manipulations of the ontology.

### 6.1 A Client-Server System for the Formal Description of Literary Characters

One important aim is to open the ontology for literary characters to others so that the presentation of the mental representations can be shared. For this reason, a client-server system was developed which enables users to manipulate the ontology, or in other words to include new mental representations and to search for already included representations. Furthermore, it is aimed at comparing characters. Therefore, a visualisation of the structures of the representations has been realised which allows comparing characters. The idea is to provide an easy access to mental representations of characters stored in the ontology. Thereby, researchers in literature studies and their special needs are put in focus. This means that it was tried to serve with a simple usage of the system and to avoid a difficult handling. It is also intended to support users who are not completely familiar with ontologies and its elements. In the next sections, the different parts of the client-server system are explained in detail.\(^\text{222}\)

#### 6.1.1 Conception and Design of the Client-Sever System

The client-server system consists of different parts: an edit part, search and comparison options, and links to the texts the characters have been extracted from. The system was created combing different scripting languages, web standards, and XML (cf. Fig. 6.1). The core of this system is the ontology in OWL. Manipulations like editing or retrieving of information are mostly performed by directly processing the OWL data. The different parts of the system are embedded in a HTML web site to show and group the different system elements.

\(^{221}\) Briefly, requests sent from a local browser are processed by a web server.

\(^{222}\) The system is available via [http://www.figureontologie.de](http://www.figureontologie.de). A presentation of this system is also given in Zöllner-Weber 2007.
6.1.2 Editing the Ontology

The edit area contains a tree-like structure of the ontology, which gives an overview of all already included classes. In addition, a form is given to provide insertion of new descriptions about characters. A screen shot of this area is given in figure 6.2. By using this form, it is possible to attach a single piece of information (an instance) to a selected class. Thereby, users can begin with their representation of a new character, but they can also add more pieces of information to a representation of a character, which they already included in the ontology. As mentioned, a specific piece of information like a description of a feature or a single action should be presented by one instance. Together, all retrievable instances, which are included by a user, form his/ her mental representation. A user can browse through the listed classes and decide which category of the ontology fits best for new information.

If no offered class fits for a single piece of information, a user can attach a new class to the ontology. Afterwards, (s)he can add a new instance to this class. But to avoid redundancy, the user should consider carefully whether or not (s)he wants to introduce a new class. It is not allowed to add subclasses on the level of the main classes of the ontology, because the proposed class structure should be preserved, since these classes are derived from theories for the description of literary characters, which are considered as integral parts (cf. section 4.1).

Technically spoken, the process of adding an instance or a class is executed by different scripts (using the Perl scripting language) which operate on the OWL ontology and a HTML file to generate several HTML views. During this process, requests on the OWL file are executed to receive the information about the classes and properties that are needed. Thereby, the Perl module XML::XPath – an XSLT/ XPath implementation in Perl – is used. If a user has provided all information and submits it, a result view is generated. After verification by the user, the single piece of information is added to the ontology and the visualisation is updated simultaneously. The added piece of information or the new instance can be found by using options included in the search part of the client-server system, which is outlined in the following.

223 see also http://search.cpan.org/~msergeant/XML-XPath-1.13/ (last accessed October 30, 2007)
6.1 A Client-Server System for the Formal Description of Literary Characters

Figure 6.2: The edit part of the client-server system. On the left side, a tree-like structure of the classes of the ontology is presented with buttons to create new instances or classes for the ontology. On the right side, a form is shown which will be opened to fill in the information to create a new instance.

6.1.3 Comparing included Literary Characters

The search functions of the developed client-server system offer different options: If a user is interested in receiving an overview of a character, it is possible to display the complete structure of a single mental representation of a character. But also single features included in the representations of characters can be retrieved by using the search options.

By using the first option, a single representation of a character is presented in a tree-like structure (see Fig. 6.3). The view of a tree was chosen, because it gives a clear overview of a mental representation. In this representation, all the classes are shown, also the classes, which do not have an instance of the character. Whether no information is added to a specific class, this can also give information about the structure of a mental representation and the character. The instances of other characters are filtered out.

To compare characters, a user can insert the name of a class or parts of the term. Afterwards, all characters, which have this feature or behaviour in common, will be presented. Such a result is shown in figure 6.4. There, each piece of information is separated from each other to make clear distinctions between the different representations. Instead of a comparison, it is also possible to search only for special features and behaviours of one character.
Chapter 6 Manipulation of and Information Retrieval in the Ontology

The search area of the client-server system was also implemented combining different (web) technologies, like Perl, XSLT, CGI, and XML. If a search for a character is requested, the data of the HTML form is sent via a CGI/Perl script to an XSLT engine on the web server. The result of this process is compared to the complete ontology, in order to filter out instances of unselected characters.

A second XSLT script manages the comparison of characters. The name of the class or a part of it is searched for in the OWL file. Then, the results are transformed online into a HTML that is presented to the user.

By using another comparison function, it is possible to display the mental representations of two or more characters side by side. A user can choose the representations of the characters, which should be displayed together. It can be used to compare the representations of characters visually and in detail. For example, one can observe and compare where and how many pieces of information are added to specific categories. In chapter 8, two different mental representations of a single character are compared.

A user can also inspect the full ontology by selecting the part called “Complete ontology tree”. There, it is possible to investigate all classes and instances included in the ontology. An extraction of this view is given in figure 6.5. The list of the classes and instances is linked...
6.1 A Client-Server System for the Formal Description of Literary Characters

6.1.4 Relation between the Ontology and Texts

Several text sources from which the characters originate are offered within the client-server system to establish a correspondence between information stored in the ontology and in primary text sources. Texts were collected from different publically available sources in the Internet (for example Project Gutenberg, Perseus, etc.). Then, the texts, which are all encoded in HTML are transferred manually to XML according to the TEI standard. The Text Encoding Initiative provides a service for encoding texts via Internet.\(^{224}\) There, it is possible to assemble different parts of the TEI encoding scheme for individual purposes and to use this scheme as a grammar for encoding: “TEI [...] ermöglicht die Notierung gattungsspezifischer Merkmale von Prosa, Lyrik und Drama sowie die Auszeichnung von Transkriptionen gesprochener Sprache, von Wörterbüchern und terminologischen Datenbanken...”\(^{225}\) As outlined in section 3.2, the aim of TEI is to serve for a large amount of academic interests which are reflected in the encoding scheme. Here, a TEI scheme is used which contains necessary

---

\(^{224}\) see Roma engine of TEI: http://tei.oucs.ox.ac.uk/Roma/ (last accessed October 30, 2007)

\(^{225}\) Jannidis 1999, p. 44
elements for the annotation of different genres, like drama, poetry, and novel, as well as general text divisions, like lines or sentences. Thereby, the general nature of the texts should be captured so that a further processing of the encoded texts is possible. This also means that the encoding scheme is not restricted on the texts of the example corpus and can be used by others to encode their literary texts. Namely to the presentation in XML, the texts were transformed into HTML using XSLT. It is possible to receive the complete text through the client-server system. The combination of the texts and the ontology will be explained in the following.

As mentioned in section 4.2, a single instance consists of information originating from a literary text. So, an instance forms a single piece of information describing the mental representation of a user/reader. But without a reference to the text, the instance would be represented rather abstractly. By using the system, a user can always inspect the original text source to follow the inclusion of a specific instance. For solving this problem, an additional XML element was integrated into the OWL ontology (see also section 4.2). It links the ontology to extracted parts of the literary texts. In the client-server system, such a relation is visualised using HTML links. Every line or sentence of the literary texts is encoded by using an ID attribute so that a reference from the instance to them can easily be established. On the information page of an instance, a link relates to an extracted part of a text. But one should note that this option is only possible if the text is encoded in XML according to the TEI scheme and if the user has linked the instance to the ID(s) of the text.

Figure 6.5: Extract of the view of the complete ontology tree including all classes and instances. The classes are shown in black and dark red. The instances are typed in italics. Here, all classes and instances available in the ontology are presented.
6.1 A Client-Server System for the Formal Description of Literary Characters

6.1.5 Discussion of the Client-Server System

Beyond logic-based applications, by using the client-server system, it is possible to support manipulations, e.g. editing and searching or comparing aspects included in the ontology. The combination of Perl, XSLT, CGI, and XML provides good solutions and possibilities to model and manage such a system. A platform for discussing and accessing different mental representations of characters has been created. In contrast to applications in logic reasoning, only basic knowledge in taxonomies, ontologies, and literary analysis is required. This might give an access for a big number of users. But one should notice that the usage of this system still requires basic comprehension of information representation and familiarisation with the functions of the system.

The service is addressed to interested users in literary analysis and ontologies, but it is also imaginable to adapt this system and its techniques for other research fields. By using methods of a formal ontology, the rather new aspect of comparing literary characters visually can be introduced into this field. This leads to new and individual perspectives on literary characters. It can be seen as an example presentation how the theories of Jannidis and Nieragden can be modelled and visualised by using such techniques. Thereby, it might be possible to start a discussion about modelling these or other theories of literary characters. In addition, one can think about the fact how the client-server system can support the analysis of literary characters and additional applications. In chapter 7, analysis and comparisons of literary characters and
Chapter 6 Manipulation of and Information Retrieval in the Ontology

their representation is outlined. This analysis is mainly driven by using the presented client-server system, allowing for the easily visualisation of mental representations of several characters as well as for the calculation of distributions of instances (e.g. a piece of information about a character) for characters. Such distributions might also point to important aspects of the character at hand implying new views on its analysis.

6.2 Semi-Automatic Assignment for Instances of the Ontology for Literary Characters from Literary Text Sources

The manual editing of the ontology might be a precise option, but it is time-consuming and labour-intensive. The reading process and reception of a literary character as well as an inclusion of a description or representation into the ontology might take some time. In addition, a human user who wants to include information of a character in the ontology, might have to search in the categories of the ontology to insert the information at the right place. For these reasons, the goal of another, own developed application is to save time in the description process and to support users who are not familiar with the ontology. By deriving (semi-)automatically assignments for instances, the process of extracting information from literary texts and adding it to the categories of the ontology should be supported. It is intended to support interested users who are not familiar with ontologies and its special technologies. Only the knowledge of describing and analysing literary characters and basic skills in text encoding are required.

The idea is to work on encoded literary texts and their mark-up. Based on the mark-up, assignments are generated for including new instances as pieces of information into the ontology for literary characters. Thereby, the application puts text encoding in focus and combines it with the ontology. A user can mark sections or sentences of a literary text, which are important for the analysis in his/her opinion. By selecting and marking these text sections, individual aspects are added to the text which later lead to a mental representation of a literary character.

Based on tags used with the encoding, the appropriate class of the ontology to which the marked piece of information should be included, is derived similar to a so-called decision tree. Most mark-up used for this task is taken from the TEI to use a more general text encoding scheme. Unfortunately, the TEI does not offer many options for the description and analysis of narrative elements in a text so that a few changes in the DTD have to be performed to handle this task. The categorisation is then handled by a processing algorithm. The processing algorithm has been developed to operate on the encoded data and to produce assignments for the categories. In the following, a description of this approach is outlined.

6.2.1 Encoding Scheme

As mentioned in section 6.1.4, the TEI tries to provide encoding for different purposes. For this reason, it seems to be reasonable that mark-up for literary analysis is also included in the

226 see Charniak and McDermott 1985, chapter 9.3.6
encoding scheme of the TEI. In addition to the more general scheme, mentioned in section 6.1.4, the idea is to offer an encoding scheme for users who wants to identify and describe text sections, which contain information of characters. These text sections might be important for the analysis of characters and consist of speech, actions, or different descriptions of characters or statements about them. Due to the fact that here, characters from all kinds of literary genres should be described, basic mark-up from TEI for prose, lyrics as well as drama is again included. In addition, mark-up, which describes speech parts, is taken from the TEI encoding scheme for linguistic analysis. There, encoding of for example interviews is supported.

In order to derive the above described assignments, (s)he should be able to encode paragraphs, titles, and speech parts in the text to attach general information to the mark-up which represents the meta level of the text. Furthermore, it is intended to encode descriptions of actions and features of a literary character. This is the most challenging part. As mentioned, it is not intended to develop an own encoding scheme, but to use a common accepted scheme to create a connection to other applications. Thereby, the mark-up should not be misused or used in a not intended way.

After investigating possible mark-up, a few constructs in the TEI scheme, which support interpretative notes in texts and are intended for linguistic analysis, are taken. By using these constructs also for literary genres, the encoding scheme had to be exploited and rearranged. This means that the usage of elements was enlarged. To encode parts important for a literary analysis, the following mark-up has to be included in the header of a text:

```xml
<interp xml:id="description">[Here, explanation of the term "description"]</interp>
<interp xml:id="statement">[Here, explanation of the term "statement"]</interp>
<interp xml:id="action">[Here, explanation of the term "action"]</interp>
<interp xml:id="speech">[Here, explanation of the term "speech"]</interp>
```

Figure 6.7: Interpretative notes in the header of a XML document. Here, four categories, description, statement, action, and speech, are defined to provide descriptions of characters.

In combination with other mark-up, text sections can be marked to point out important parts for characters. To give more information for this proposed application, in the next section, the four categories description, statement, action, and speech are explained in detail.

### 6.2.2 Categories for the Description of Character Information

By using the proposed categories, it is tried to group information about characters. This should provide an easier and faster processing of the categorisation. In addition, the classes of the ontology are also grouped according to the aspects they represent. It is reasonable to group...
information about characters to activities like speech and action, to descriptive text elements as well as statements about characters done by other characters in the literary texts.

For example, if a user wants to encode an action of a character like an action on someone or something, (s)he should use the keyword “action”. Such encoding would look like:

```xml
<s who="third-person_narrator" ana="#action">Before <name type="subject" key="John">he</name> quitted it, he <phr>held up <name type="thing">the dim light</name>, and looked around him with a mixture of terror and curiosity</phr>.</s>
```

Figure 6.8: Marking a sentence in a literary text. Here, a sentence, which contains a piece of information about an action of a character, is marked.

In the example, information about the category ”action” and the character or narrator who stated the information is included in the mark-up. In addition, the name of the acting character and the object involved in the activity are given. Activities can be related to different kinds of objects: characters and inanimate things. In addition, the kind of action can be specified further if necessary. Users are not completely free to use individual terms for adding information. A detailed description of the usage is given in the appendix C.

Encoding a description of a character in a literary text should be done similarly. But instead of using the keyword for action, the keyword for description should be used. Here, descriptions stated by a narrator about a character can be marked. Descriptions can contain information about outward features or inner features. For specialising this kind of information, general terms like the name or the name of a character feature should be used so that fitting classes of the ontology can be suggested in an easy way.

Another category can be used for marking different kinds of speech. Speech is divided into two different groups. The first group contains speeches like questions, orders, etc which can be marked in sentences of dialogues or monologues. Furthermore, information about the speaker and an eventual addressee in the text can be attached. The second kind of speech contains statements or commentaries that should be encoded as utterances. Similar to related objects in the category for actions, statements can also refer to objects like human beings or things.

```xml
<s xml:id="ma_271" who="Melmoth" ana="#speech">"Have <name key="Stanton">you</name> <phr ana="question">anything to inquire of me</phr>?</s>
```

Figure 6.9: Marking speech in a literary text. In this example, a sentence, which contains a question of a character, is marked.

Statements given by a narrator mostly do not appear in a dialogue and can have a stronger quality, especially if they are outlined by a narrator with external view-point. For this reason, these statements are handled separately by using the category “statement”. Here, further graduations are possible. Sometimes, it might be difficult to decide whether the category for description or statement should be used. But commented descriptions with an intended
opinion about the character, which are maybe too complex to categorise as a description, should be classified as statements whereas neutral descriptions can be marked by using the other category. After encoding the text, it can be uploaded to a server where all marked text sections and their mark-up are processed by an algorithm. In the next section, this algorithm is explained in detail.

### 6.2.3 Assigning annotated Text to Ontology Classes

An algorithm was developed for processing a text encoded in TEI as described above in order to generate an assignment of this piece of information to a specific class of the ontology. Additionally to the algorithm, a web-based user interface has been developed to facilitate the usage of this approach. The generation of the assignments is realised by a script using Perl, CGI, and the XPath module. By processing the encoded text in combination with the OWL ontology, the assignments are generated.

At first, the script processes an uploaded XML file. By working on a kind of simple decision tree, it is then tried to create assignments for including instances into the ontology. The script searches for keywords in the text to access mark-up to the classes of the ontology. Encoding concerning the proposed four categories is matched to a main class of the ontology like the class “action and behaviour” or “features”. After selecting a main class, the script uses further keywords, like names, included in the mark-up to granulate the assignment and to find a subclass of the main class. For example, if the keyword “move” is included in the mark-up, then the subclass “move” is selected. If a matching is not possible, a main class is taken.

By searching for more keywords, the values of properties of the suggested instance are generated, e.g. the type of a narrator and the name of a character can be matched on properties, which contain information about the narrator or character. Those properties which cannot be filled automatically, but which are available, are also presented to the user to be filled manually.

After processing the text, a table with all generated assignments and detail information for each assignment is displayed. The suggestions can be checked and confirmed. For checking, a user is guided to a page where all pieces of retrieved information from the text for a single instance are presented. If the user does not agree, (s)he can change the assignments. There is also the option that the user can create a new class if appropriate. This is realised by using the form for creating a new class in the client-server system.
After submitting, a new instance is included in the ontology and can be retrieved by using the above presented client-server system. The application for generating semi-automatic assignments was tested by submitting an extract of a literary text. The evaluation is described in the following.

6.2.4 Testing of Semi-Automatic Assignment of Instances to the Ontology for Literary Characters

To test the above described approach, a free available extraction of “Melmoth the Wanderer” of Charles Robert Maturin was encoded and submitted to the system afterwards. In contrast to the manual submitted descriptions of characters via the client-server system, here, text sections consisting of important pieces of information were encoded by using the proposed TEI scheme (cf. section 6.2.1). Information about several characters appearing in the novel was encoded. For example, speech parts of a dialogue between the characters were completely marked so that a full conversation could be described. But it was tried to encode only information, which might be relevant for a character analysis.

Exemplarily, the encoded text was uploaded and assignments for the main character Melmoth were verified before final submission. Figures 6.11 and 6.12 show the upload page of the application and the table with generated assignments.

![Figure 6.11: Page for uploading an encoded text. Here, users can upload their encoded XML texts so that assignments can be suggested by the algorithm.](image)

Most of the assignments matched on the correct classes of the ontology. After submitting them, new instances consisting of pieces of information about the character, were added to the ontology. By using the semi-automatic assignments, it was possible to create a mental representation of this character concerning the extract of the text.

6.2.5 Discussion of the Approach

The approach of generating assignments of new instances to be included in the ontology tries to avoid the labour-intensive and time-consuming work, i.e. an alternative to the usual manual
6.2 Semi-Automatic Assignment for Instances of the Ontology

Figure 6.12: Extract of the result of the uploaded text Melmoth the Wanderer. Each row of the table contains one assignment/annotated piece of information.

editing of the ontology. It attends users familiar with encoding texts, but who might not necessarily be familiar with ontologies. Furthermore, for users who had already used the client-server system, it might also be an interesting option to check and compare their encoding in both applications.

Unfortunately, the TEI scheme was not developed with focus on literary analysis so that only a few tags are available in the TEI. Therefore, different parts of the TEI standard have been exploited and recombined to achieve an annotation for literary characters. For this reason, the description for literary characters cannot always be generalised, but it was one way to support this kind of application. Thereby, the used keywords for features, actions, etc. cannot be generalised in all cases. But except from this, the semi-automatic assignments can avoid a longer orientation phase with the ontology and can provide an easier access to it.

In addition, by testing this application, it was interesting that if a text is completely encoded, one can receive assignments for more than one character processing the encoded material only once. If representations of several characters are added to the ontology, the analysis of their relations and interactions can be supported more easily.

In summary, one can say that the presented application gives an easy access to an ontology and one can imagine to transfer it to other topics or applications in the humanities. At the current state, it only represents a sketchy application, but its potential already shows interesting aspects for works in the next future.
Chapter 6 Manipulation of and Information Retrieval in the Ontology
Part II

Character Analysis – Impacts of the Developed Ontology
Chapter 7
A Computer-Aided Analysis of Devil Characters in the Faust literature

After the presentation of the developed ontology and applications based on this ontology, in this chapter, a combination of these methods and literary analysis is outlined. Comparisons of literary characters taken from the example corpus will be performed. In contrast to usual literary text analysis here results generated from the client-server system are used to support and guide the analysis. Diagrams based on entries in the ontology were created for each character or single mental representations, respectively. On the basis of these statistics and their visualised formal description (as trees), characters are compared with each other. The mental representation might not always be objective, but by enlarging them with citations of secondary literature, the conclusions are supported.

This procedure, supporting analyses with computer-aided methods, allows the investigation, if analyses can underline the formal description of the characters and vice versa. It should be noted that the formal descriptions were included before analysing and interpreting the characters in detail.

The analyses should give information about literary characters in general as well as specific information about the selected devil characters and their development from the first Faust story until the stories of the 19th century. A time line of these stories and the different genres of these works are depicted in Fig. 7.1. The following analysis criteria will guide the comparisons:

- What are the differences and similarities between characters according to different genres?
- Which similarities are found within the same genres? And which are individual components used by different authors?
- Are consecutive Faust stories influenced by each other?
- Are there main motifs, which guide the presentation of the devil characters?
- What are the major variations found between devil characters? Which of them are (extreme) variations?

A brief single interpretation of every analysed character is given in the following analysis concentrating on the above mentioned aspects. To help illustrate the development and variations of devil characters, characters, which are not included in the ontology, but could have influenced
Chapter 7 A Computer-Aided Analysis of Devil Characters in the Faust literature

the development of these devils, are mentioned, too. Citations from the literary texts are given in their original language, which is, except from Marlowe’s drama, German. English translations are available for several texts of the corpus: “Historia von D.Johann Fausten” is available via http://www.perseus.tufts.edu, Goethe, Johann Wolfgang: Faust - Part One/ Faust - Part Two. translated by David Luke. Oxford 1998, and Klinger, Friedrich Maximilian: Faustus: his life, death, and descent into Hell. translated by George Henry Borrow. 1840.

The diagrams given in the next sections are generated from the characters in the ontology. These figures are taken from the mental representation structures. Up to now, the ontology was composed of mostly single structures for each character entered by a user of the system. For this reason, an empirical analysis comprising comparisons of mental representations of different readers is not yet possible. Nevertheless, the proposed system supports these options. By a single example the possibilities will be demonstrated (cf. section 8).

Finally, conclusions based on the analysis and comparison concerning the development of devil characters through centuries and genres is outlined in section 7.3.

7.1 Chronological Comparisons of Different Devil Characters

In this section, devil characters of temporally consecutive works are compared with each other. A working hypothesis is that these characters fulfil a development over time and it is of interest to detect such changes. Furthermore, it will be investigated if such developments of the characters are reflected in the ontology, i.e. the modelled mental representations.

At first, the prose text “Historia von D.Johann Fausten” is compared with Marlowe’s drama “The Tragicall History of the Life and Death of Doctor Faustus”, then, followed by comparisons of Goethe’s two Faust dramas and the Faust novel of Klinger. A comparison of Goethe’s dramas with the works of Lenau and Klinger is also included. The comparisons are supported by diagrams of the occurrences of instances in the class hierarchy modelled in the ontology, which represents the mental representations. In addition, the visualised overviews of the characters and their mental representations of the client-server system are incorporated in the analysis.

By analysing and comparing the characters, their characteristics are grouped, e.g. features and (non)-verbal actions.

7.1.1 Precursors of Devil Characters in the Renaissance Literature - the First Story of Faust and Marlowe’s Drama

One of the first written works is the “Historia von D.Johann Fausten”, a compilation of other stories containing similar motifs as well as the legend of the magician Faustus. In the following, the abbreviation “Historia” will be used to refer to this work. This collection of stories is divided in three parts. In the beginning, Faustus’s birth and his career, his studies and practice in medicine are briefly stated. Because of his ambition to gain knowledge, Faustus conjures

---

227Last accessed October 25, 2007
228Different variations of the name, like “Faustus” or “Faust”, can be found in literature.
7.1 Chronological Comparisons of Different Devil Characters

Figure 7.1: Diagram of the different genres and time line of the compared works. On the x-axis, a time line from the first work until the last one is given. On the y-axis, the genres are given. But their arrangement on the axis does not state any quality. In addition, the literary works which are analysed in the next sections, are arranged according to their genres and times.

up one of the devils (Historia von D.Johann Fausten 1988, pp.15/16). After three debates between Faustus and the conjured devil, Faustus makes a pact with the devil called Mephistophiles who has to serve him for 24 years. Faustus demands that Mephistophiles has to serve him in shape of a Franciscan friar. Then, Faustus starts asking questions about the hell and the devil’s hierarchy and receives reports from Mephistophiles about these topics. The second part of the Historia continues with the interrogation of Mephistophiles about astronomy and astrology followed by Faustus’s journey to the hell and heaven. In the third part of the story, a collection of Faustus’s adventures as a magician is presented. They consist of different partly humorous and fantastic episodes showing Faustus’s magical activities at courts of aristocrats and monarchs, at a market, and in taverns. After an attempt by a physician to proselytise Faustus, Mephistophiles threatens him and demands that Faustus commit himself to the devil again. The story finishes with the 24th year of Faustus’s commitment to Mephistophiles and

---

229 Similar to Faustus’s name, different variations of the devil’s name can be observed.
230 Henning 1960, p.28
Figure 7.2: Diagram of instances of all devil characters of the example corpus. Here, an overview about the distribution of instances, included in the mental representations of the characters, is given. On the x-axis, the numbers of instances for each mental representation are stated. The numbers are absolute. On the y-axis, the compared works are depicted.

reports Faustus’s end containing a cruel killing. Mephistophiles raptures Faustus finally to obtain his soul.

The Historia has included a warning preface and closing words referring to Christian morality. It seems that the unknown author belonged to a Protestant group of Germans. Nevertheless, Faustus’s adventures show humorous events containing amusing aspects so that this work cannot be only regarded as a moral writing.\footnote{Hendel entitles the Historia as “eine protestantisch-orthodoxe Moralschrift” (Hendel 1969, p.12).} But it should be noted that this work is an early piece of prose literature and the unknown author has to comply with the conventions of his time. Literature is more limited in its allowed presentations and most works contain moralising.\footnote{see also Baron 1992, p.91}

The second work – Marlowe’s drama –, which is focused on in this section has been published in two versions: in 1604 the first version also called A-text and in 1616 a longer version called B-text. It is not clear yet which version is more authentic.\footnote{see also the comments of Seebass in Marlowe 1964, pp.71/72} Here, the A-text is taken, but occasionally also the B-text is used. As mentioned in section 4.3, Marlowe uses an English
7.1 Chronological Comparisons of Different Devil Characters

Figure 7.3: Diagram of instances for the characters Mephistophiles of the Historia and Mephistopheles of Marlowe. The histogram shows the distribution of classes and instances of the two characters and their mental representations included in the ontology. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the classes, which contain instances, are given.

Marlowe’s drama is divided into five acts and has added further characters, which do not appear in the Historia.

Similar to the plot of the Historia, Faustus conjures the devil and Mephistopheles, an ugly looking devil, appears. Faustus rejects his outward appearance and demands that the devil appears as a Franciscan friar. Afterwards, an interrogation by Faustus is portrayed in order to learn something about the devil’s world. Faustus and Mephistopheles agree on the conditions of the pact. In the following, the adventures of Faustus and Mephistopheles in Rome and at different courts of monarchs are presented which resemble the humorous situations of the Historia. But Faustus often has sorrows and doubts about the pact. For example, when an old man reminds Faustus of Christianity, Faustus is driven close to suicide (see Marlowe 1998, [5.1], pp.176-179).

Because of Faustus’s disobedience, Mephistopheles asks for a second

---

234 see Hendel 1969, pp.13/14
235 see also Mahal 1972, p.231
236 Mahal 1972, p.240
commitment, which Faustus makes again. Finally, appearing devils take Faustus with them to the hell.

Before analysing these two characters and their mental representations included in the ontology for literary characters, several hypotheses are listed. It seems that Mephistopheles of the Historia as well as Marlowe’s devil does not feature attributes of a main character. But in Marlowe’s drama, Mephistopheles shows more emotions than the earlier devil, which seems to be rather functional. So, it has to be investigated if Marlowe’s Mephistopheles already presents a further development of a more individualised character in contrast to the functional appearance of the devil character in the Historia. Another hypothesis is that features of the devil are derived from the Historia, but enlarged by Marlowe’s conception of the devil character by adding inner attributes.

According to the histogram in Fig. 7.3, the mental representation of the devil character Mephistophiles in the Historia is described in 38 instances and Marlowe’s character in 40. The numbers of instances are nearly the same, but it does not mean that the conclusions are also similar. One can observe that for Mephistophiles of Marlowe, several instances are added to classes where Mephistophiles of the Historia does not have any entries. But for this devil character, a higher number of instances is included in classes where Marlowe’s Mephistopheles has a lower number of instances. In the following, as mentioned, comparisons are performed on the basis of the diagrams and visualised overviews of these two characters. Thereby, similarities, but also occurring differences are presented and discussed. Afterwards single features and events, which can only be found in one of the character’s representation, are put in focus.

**Features**

For both representations of the characters, instances according to their different appearances are given and included in the ontology. Both have the ability to change their form into human-like shapes and fantastical forms. Especially in the beginning of the story, Mephistophiles of the Historia often changes his form. In chapter “Wie Faustus die Zauberey erlangt vnd bekomen hat”, when Faustus conjures the devil, the devil performs a series of transformations: “Es ließ sich sehen/ als wann ob dem Circkel ein Greiff oder Drach schwebet/ vnd flatterte/ [...] bald darauff fiel drey oder vier klaffter hoch ein feuwriger Stern herab/ verwandelte sich zu einer feuwrigen Kugel/ ...” (Historia von D.Johann Fausten 1988, p.16) At first, he appears as a griffin or dragon, turns into a star and then into a burning sphere. By performing these changes, it seems that the devil’s power and repertoire are demonstrated to threaten Faustus (Historia von D.Johann Fausten 1988, p.16), but also to impress him as well as the reader. This performance is repeated. This time, the devil presents himself as a burning man and a grey friar, probably to create the same impression (Historia von D.Johann Fausten 1988, p.17).

Similar to the Historia, in the conjuring scene of Marlowe’s Faust drama, the devil Mephistopheles appears at first in an ugly shape to which Faustus comments: “Thou art too ugly to attend on me.” (Marlowe 1998, p.146, [1.3] l.24) Any further description of the devil’s appearance is not given. But one can see that in the B-text, instead of the ugly shape, a dragon form of the devil is stated (Marlowe 1998, p.194, [1.3] l.22). Faustus’s comment about the dragon

---

237The devil characters are considered as male characters. Therefore, it is referred to them by using the male form of pronoun.
is the same so that one can assume that the ugly shape and the dragon form might also be both unpleasant for Faustus. Then, Faustus demands that Mephistopheles changes his form into “an old Francisian friar” (Marlowe 1998, p.146, [1.3] l.25) and Faustus adds, “That holy shape becomes a devil best” (Marlowe 1998, p.146, [1.3] l.26). In the Historia, there is a similar scene when Faustus also demands “daß/ so offt er jn forderte/ er jm in gestallt vnd Kleydung einer Franciscaner-Muenchs/ mit einem Gloccklin erscheinen solte/” (Historia von D.Johann Fausten 1988, p.21).

In both works and attached to the mental representations, the devils appear in the shape of a Franciscan friar and mostly have to stay in this “costume” while serving Faustus. Referring to the Historia, Hendel states: “Wie sehr das Faust-Buch im Dienste der protestantischen Kirche stand, geht auch einer weiteren aufschlußreichen Tatsache hervor: Mephistophilos [...] erscheint in der Gestalt eines katholischen Mönchs.”

Figure 7.4: Diagram of feature instances for the characters Mephistophiles of the Historia and Mephistopheles of Marlowe. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the feature classes, which contain instances, are given.

This statement can be underlined by the episodes and comments about the pope’s debauched life (Historia von D.Johann Fausten 1988, p.62) and by Mephistophiles’s appearance as a pope (Historia von D.Johann Fausten 1988, p.69).

Hendel 1969, p.12
Among other things concerning Marlowe’s attitude to Christian religion and church, James H. Sims mentions “the anti-papist device of dressing Mephistophiles in the habit of a Franciscan friar”. Gertrud Mander even states regarding Marlowe’s attitude: “Betrachtet man Marlowes Werk als Ganzes, dann hat das Christentum darin keinen rechten Platz, […] Marlowe war kein Christ, seine Auffassung vom Menschen ist antikisch…” But Mander’s commentary could mean that Christian themes and motifs are not elaborated. However, in Marlowe’s drama of Faustus, many different supernatural and Christian characters, e.g. devils (Mephistopheles, Lucifer, Beelzebub) and angels (Good Angel, Evil Angel), act and many reflections are presented, also including statements about God. Matthew N. Proser entitles the fictional God as “the great religious and psychological force in the play”. This shows that Christian characters are involved in the play, even if Marlowe uses them in a different way, he still needs these patterns to compose something. Later, this discussion is continued when Mephistopheles’s own statements are analysed.

A difference is that Mephistophiles of the Historia appears unsolicitedly as a grey friar (Historia von D.Johann Fausten 1988, p.17). Later, this shape is specified by Faustus’s demand to appear as a Franciscan friar, but these monks are also called “greyfriar”. The devil rather than Faustus mainly initiates this specific shape. He only agrees on the devil’s appearance and his criticism is focused on a single fraternity. In contrast, in Marlowe’s drama, Faustus himself initiates the shape of a Franciscan that means the criticism directly derives from the human side and not from the devilish part.

As mentioned, the devil character of the Historia also appears in the guise of a pope: “Vnd D.Fausti Geist trat in gestalt/ zierd vnd geschmuck eins Bapsts fuer den Keyser...” (Historia von D.Johann Fausten 1988, p.69) This occurs at the court of the Turkish emperor. There, the emperor honours the devil clothed as a pope. In this episode, criticism about credulous people is depicted; even an emperor is misguided by this illusive appearance.

In summary, one can state that the appearances as clergymen by both devils are similarly arranged. But in contrast, further appearances of the devil are only mentioned in the Historia and added to the ontology. The transformations of Mephistopheles are delineated much more excessively in the Historia than in Marlowe’s Faust drama. This can derive from two different reasons: In the Historia, the devil has to be attributed by using many mediaeval pictures of the devil to express his power and to fascinate as well as to scare. It shows that a devil can appear in different forms and people have to be aware of his ability to transform into many guises.

In his excursus about the history of the literary devil, Günther Mahal explains that the devil of the New Testament is not equipped with any outer attributes and remains abstract. This unclear image of the devil is enlarged during the process of the Christianisation. Mahal states:
“Mit der Ausbreitung des christlichen Glaubens, besonders im germanisch-nordischen Raum, beginnt der Prozeß einer aktiven, geistig-geistlichen Überwanderung dessen, was als mythologisches Gut bei den bekehrenden Völkern angetroffen wurde. […] aber diese eingessenen Gottheiten wurden nun keineswegs als nicht existent deklariert […] sondern sie wurden mit neuen Vorzeichen versehen: sie waren und blieben existent, mit allen körperlichen Ausprägungen, die ihnen anhingen, aber sie waren fortan keine Götter mehr, sondern sie wurden zu Teufeln erklärt.” (Mahal 1972, p.124)

The images of these pre-Christian, pagan gods are used to enrich the rather abstract image of the devil. As Mahal describes, the devil is equipped by using attributes of giants, mermaids, trolls, dwarves, etc. Furthermore, Mahal mentions: “Einzelne hervorstechende Eigenschaften des Teufelbildes, wie es besonders das Mittelalter kannte, lassen sich direkt von germanischen Gottheiten herleiten: die Vorstellung des Teufels als graues Männchen oder als Jäger (auch Ritter) in grünem Mantel […] stammt vom wilden Jäger Wotan; mit Wotan hat auch der teuflische Pferdefuß zu tun...” This means that the attributes from pagan gods or creatures are imported into the Christian religion and then used in a negative way. The relation to fire and brimstone is collected from the pagan god “Thor”. Additionally, the devil becomes a creature, which can change in all kinds of shapes, especially a raven, a he-goat, a wolf or as a pig. The image of the devil is strongly illustrated so that a picture of a creature arises which is various, but always scary. When the theatre in mediaeval times begins to be emancipated from performances guided by the church, further aspects are attached to the image of the devil. In these performances arranged by non-clergy people, the devil can be outwitted and betrayed. The treat he poses is taken from him and he becomes a jester and funny person. After the Protestant reformation influenced by Martin Luther’s fear of the devil, the image of the devil returns to a dangerous tempter. In Marlowe’s drama, the outward appearance of the devil is not focused as intensely, the forms may only be adopted from the English translation of the Historia. For Marlowe, this scary and dangerous aspect of the devil is not interesting. It seems that he is more interested in criticising the church and its personnel and therefore he uses the devil. Another reason why further appearances of Mephistopheles are not mentioned is that in Marlowe’s Faust drama, the whole Faust story is abbreviated retaining only essential aspects.

**Actions**

Other important aspects can be discovered by analysing the mental representations and the thereto-added interactions between the devil characters with other characters (added to the category “act_on_subject” of the ontology) and actions on objects, which are indirectly related to other characters. According to Fig. 7.5, Marlowe’s character is described by 12 instances of the category “act_on_subject”, whereas the devil character of the Historia only has 2 in-
stances, there. Other instances of both characters are distributed among the other subclasses of “action_and_behaviour”.

![Diagram of instances for actions of the characters Mephistophiles of the Historia and Mephistopheles of Marlowe. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the action classes, which contain instances, are given.]

Most of these interactions are services to Faustus by the devil characters. Especially, the conditions of the pact between the devil and Faustus are important. In the Historia, Faustus lists six items as conditions which Mephistophiles has to deliver on demand, including Faustus’s changing into different shapes (Historia von D.Johann Fausten 1988, p.20). Furthermore, Mephistophiles should only be visible to Faustus, but invisible for others. Faustus can decide the devil’s appearance. In Marlowe’s drama, Faustus demands five conditions, which are similar to the requests in the Historia (Marlowe 1998, [2.1] 197-104). Mephistopheles has to bring him whatever he wants, to appear in a form Faustus demands, and to stay invisible in Faustus’s home. In this way, both devils are restricted in their interactions to other characters during their service to Faustus. They would renege on the conditions of the pact if they become visible to and for indirect in contact with others.

In return, Mephistophiles in the Historia makes five requests: Faustus has to commit himself and his soul to the devil, to sign his contract with his own blood, to be an enemy of Christianity and Christian believers, and not to reconvert (Historia von D.Johann Fausten 1988, p.20).
7.1 Chronological Comparisons of Different Devil Characters

Similarly, Mephistopheles in Marlowe’s drama wants to have Faustus’s soul and a pact signed with blood (Marlowe 1998, [2.1] l.31/32, 34-36). None of the other conditions, mentioned in the Historia, is demanded. But Mephistopheles’s further actions and statements against Christianity demonstrate that these conditions are also implicitly included in his requests.

Mephistophiles of the Historia often creates spectacles for Faustus. After their pact, the devil puts on a kind of magical revue in Faustus’s home. He produces sounds of a battle, conjures fantastical creatures and produces a thick fog as well as gold and silver (Historia von D. Johann Fausten 1988, pp.24/25). By this, he underlines his supernatural skills to impress Faustus and the reader.

By serving Faustus, Mephistophiles creates a carriage with dragons: “...vnd sahe ein Wagen mit zweyen Drachen herab fliegen...” (Historia von D. Johann Fausten 1988, p.57) In Marlowe’s drama, this kind of magical show is missing. It seems that such mediaeval images of a devilish spectacle are refused. Only a single episode is similarly arranged in both works. In this episode, Faustus commands the devil to bring grapes in wintertime (Historia von D. Johann Fausten 1988, p.90, Marlowe 1998, [4.2] l.15a). Aristocratic characters, e.g. dukes and duchesses, show their astonishment about this attraction. Faustus explains that the different seasons on earth which allow grapes to grow in India and other countries in the East while it is winter elsewhere. Because of the devil’s ability to fly, he is able to travel to these countries and come back quickly. Here, one can detect that Marlowe might have used his translated source of the Historia. Both episodes belong to the part of the stories, where the devil tempts Faustus by journeys and other adventures.

According to the instances in the ontology, Mephistophiles of the Historia does services like stealing food, wine or silver crocks from clergymen for Faustus (Historia von D. Johann Fausten 1988, pp.26/27, 62). These actions of the devil are commented by Mahal as follows: “...als willig-hilfsbereiten und im Grunde heinzelmännisch-harmlosen spiritus familiaris, als treuen und recht einfältigen, jedenfalls aber stets loyalen und besorgten Diener Fausts;” Here, the devil takes the role of a supernatural servant, instead of a dangerous tempter. But by performing his services, Mephistophiles acts like a fairy or a puck – in negative terms-, because his activities, like stealing, often harm other characters. Mephistopheles of Marlowe provides Faustus with literature with magic spells and information to raise serving spirits and information about astronomy and botany/herbology (Marlowe 1998, p.155, [2.1] l.164-175). Mahal also entitles Marlowe’s character: “...so ist er zunächst Reisebegleiter und -marschall Fausts bei dessen “Erforschung der Kosmographie” [...] sodann kundiger Cicerone in Rom...” Furthermore, Mephistopheles is called “spiritus familiaris” and “treuer Diener Fausts” by Mahal. Here, the two characters are arranged rather similarly.

One can state that by providing women for Faustus, Mephistophiles is able to increase Faustus’s sins, especially because he does not allow him to marry. The author’s intention is thus to show the bad influence of a devil. In Marlowe’s play, this aspect is not so stressed, because it seems that Faustus’s sin is his overconfidence, rather than sinful life.

Concerning other actions attached to the mental representations, tricks are noticeable, which are performed by both characters. These tricks can be described as ribald. For example, Mephistophiles of the Historia puts antlers of a knight’s head (Historia von D. Johann Fausten 1988, p.79). There is a similar scene in Marlowe’s play when a knight gets antlers and Mephistopheles removes them (Marlowe 1998, p.171, [4.1] 1.69a/69b, 87). Because of being annoyed by two characters, which try to conjure him, he transforms them into an ape and a dog (Marlowe 1998, p.167, [3.2] 1.37-39a). In contrast to Marlowe’s play, in the Historia, most of such tricks are performed by Faustus who is equipped with magic by the devil. In Marlowe’s drama, these actions are transferred to Mephistopheles. But in all cases, the audience or a reader might gloat, because most of the tricks compromise others. In this way, the devils show a humorous, but ribald side. But they cannot be regarded as jesters who make fun of themselves or stupid people as mentioned above. They do not appear as clumsy or betrayed characters as they do in mediaeval theatre. They are regarded as too dangerous in the Renaissance and later. Since actions are often motivated by special character features, relations between the categories of “action and behaviour” and of “character feature” are analysed in the next paragraph.

One can observe that for both devil characters, several instances showing a kind of action are related to instances added to the category of violence. Especially when some characters, a physician in the Historia and an old man in Marlowe’s play, are terrified by the devils because of a trial to proselytise Faustus (Historia von D. Johann Fausten 1988, p.59, Marlowe 1998, p.178, [5.1] 1.79/80). Another violent action is described in Marlowe’s play when Faustus and Mephistopheles play tricks on the pope and his guests: “[Faustus and Mephistopheles] beat the Friars, and fling fireworks among them, ...” (Marlowe 1998, [3.1] 1.99a/99b) These actions represent antipathy against Christianity and its institution similar to the devil’s appearance as a Franciscan friar. But it might also be an aggressive reaction of fear, because the friars start cursing them and Mephistopheles replies: “We shall be cursed with bell, book, and candle.” (Marlowe 1998, p.165, [3.1] 1.82/83) Sims states: “... [Mephistopheles] is afraid of being exorcised by “bell, book, and candle” in the pope’s apartment.” Mephistopheles’s only solution is to use physical violence.

But both devils act with a grim cruelty against Faustus’s misdoings. After Faustus talks to the characters which want to proselytise him, both devils threaten and scare him. In the Historia, it is mentioned: “In solchen Gedancken erscheinet jm sein Geist/ tappet nach jm/ als ob er jhne den Kopf herumb dreht wolte/ vnd warff jm fuer/ was jhn dahin bewogen hette/ daß er sich dem Teuffel ergeben/ nemlich sein frecher Mutwillen.” (Historia von D. Johann Fausten 1988, p.103) He shows Faustus his power and by physically harming him, the weakness of the Faust character thus is being revealed. The loyal servant then turns against Faustus and demands a second pact. In Marlowe’s Faust drama, Mephistopheles behaves differently. He tries to intervene in a scene, when Faustus is full of doubts, and gives him a dagger so that

252Sims 1966, p.15
Faustus can commit suicide (Marlowe 1998, [5.1] l.50a). Faustus says: “Hell calls for right, and with a roaring voice/ Says, ‘Faustus, come! Thine hour is come.” (Marlowe 1998, p.177, [5.1] l.49/50) Afterwards, Faustus is in the act of committing suicide, but he is prevented by the old man. Mahal states to Mephistopheles’s behaviour: “...erstmals als Teufel, der offenkundig für sein Reich mit jedem Mittel kämpft: er drückt dem Reuigen einen Dolch zum Selbstmord in die Hand...”

Here, the devil shows psychological features, he is able to understand Faustus’s doubts and desperation. He tries to use this situation to avoid killing Faustus by himself, which he would rather perform at the end of the pact. In addition, he wants to obtain Faustus’s soul earlier. But the old man engages himself and tries to proselytise Faustus. Faustus begins to regret the pact with the devil (Marlowe 1998, p.177, [5.1] l.62-65). Mephistopheles does not harm Faustus like the devil in the Historia, but threatens him: “Thou traitor, Faustus, I arrest thy soul/ For disobedience to my sovereign lord. Revolt, or I’ll in piecemeal tear thy flesh.” (Marlowe 1998, p.177, [5.1] l.66/67) Faustus is so scared that he offers Mephistopheles a second commitment. Here, Faustus’s devil companion who amused him with journeys and magical attractions changes suddenly. His malignance is suddenly present and he shows his true face. But according to Fig. 7.5, the devil of the Historia shows 4 instances direct violence, whereas violent actions of Marlowe’s Mephistopheles are more covered.

In summary, one can say that most of the actions performed by these devil characters are related to the service to Faustus. Except from some actions of Marlowe’s Mephistopheles, the performances of the characters stay rather functional.

**Speech actions**

By analysing speech of the two devils – belonging to the mental representations and added to the subcategories of “speech_and_thought” – further details of interactions can be stated (cf. Fig. 7.6). Most of these verbal actions are explanatory (Historia 7 instances, Marlowe 4 instances in the category “explanation”). In the Historia, many explanations about the structure of the world, e.g. the arrangement of the cosmos and hell, its nature and the hierarchy of the devils, are given by Mephistophiles (see Historia von D.Johann Fausten 1988, chapter 12, 13, 16, 21). Most of these explanations are adopted from other sources. Analysing Mephistophiles’s information about the hierarchy in the hell, Helmut Wiemker states: “So beantwortet zum Beispiel der Geist Fausts Frage vom Regiment der Teuffel und ihrem Principat mit einer Aufzählung der höllischen Fürstentümer, welche Elemente enthält, die teils der klassischen Mythologie, teils der kabbalistischen Spekulationen entstammen [...].”

This means that descriptions and aspects from different kinds of literature are assembled and arranged for Mephistophiles’s speech. It most likely shows information about people’s belief and understanding of the world, since it seems that the devil does not present his own commentaries or statements. The character might be used to satisfy the thirst for knowledge of potential readers.

Only, the story about the creation of the world reflects something devilish and individual of Mephistophiles: “Der Geist gab Doktor Fausto hierauff ein Gottlosen vnd falschen Bericht/ sagte/ die Welt/ mein Fauste/ ist vnerboren vnnd vnsterblich/ So ist das Menschliche Geschlecht

---

253Mahal 1972, p.241
254Wiemker 1961, p.LXVI
von Ewigkeit hero gewest...” (Historia von D. Johann Fausten 1988, p.48) Mephistophiles seems to ignore the Genesis of the bible. But the devil answers to Faustus’s question what he would to do if he was Faustus: “...vnnd mich befleissen/ daß ich Gott nicht wider mich zu Zorn bewegte/ seine Lehr/ Gesetz vnnd Gebott/ so viel mir moeglich/ halten/ ja alleine Anruffen[...]
Denn ob ich schon gegen GOTT also gesuendigt/ wolte ich mich doch widerumb in seinen Gnaden erholen.” (Historia von D. Johann Fausten 1988, p.43) Here, a contradiction occurs. On the one hand, Mephistophiles tries to refuse the Christian Genesis and God as a creator of the world on the other hand he shows God respect in his statement. Because of his function as a devil, Mephistophiles still remains rebellious, yet he is able to judge right and wrong. In this speech, Mephistophiles also takes the position of conscience. He knows the rules of God. But it is not clear if he regrets his revolt against God. Except from his physical expression of violence when he harms other characters, he stays unemotional; nothing is mentioned about his inward features and his feelings.

In contrast, Mephistopheles of Marlowe presents rather individualised answers to Faustus’s questions. In their first conversation, he describes Lucifer’s revolt as follows: “O, by aspiring pride and insolence,/ For which God threw him from the face of heaven. [...] Unhappy spirits
that fell with Lucifer./ Conspired against our God with Lucifer./ And are for ever damned with Lucifer.” (Marlowe 1998, p.147, [1.3] 1.68/69, 71-73) Mahal states: “...auffällig und bemerkenswert ist hier - vollzogen durch Mephistophilis! - die (negativ-beklagende, eigenartig distanzierte) Wertung des Teuflischen...” Indeed, Mephistopheles seems to show sorrows. It is also of interest that he says “our God”. This could mean that he still accepts God as the emperor of the world. Mephistopheles’s answer about the damnation of the devils and the hell is even more surprising: “Why, this is hell, nor am I out of it./ Think’st thou that I, who saw the face of God/ And tasted the eternal joys of heaven,/ Am not tormented with ten thousand hells/ In being deprived of everlasting bliss?” (Marlowe 1998, p.147, [1.3] 1.77-81) Later, he declares the place of hell: “Under the heavens. [...] Within the bowels of these elements,/ Where we are tortured and remain for ever./ Hell hath no limits, nor is circumscribed/ In one self place, for where we are is hell,/ And where hell is must we ever be.” (Marlowe 1998, p.154, [2.1] 1.118, 119-123)

Mahal interprets this statement: “Mephistophilis’ Höllenbild und -interpretation ist damit um eine - ganz entscheidende Dimension reicher: Hölle ereignet sich nicht nur in dem religiösmythologischen Ort der Verdammten (den Faust gar nicht anerkennen will)...” It seems that the hell is not any more a real place somewhere in the world, but a state of mind of creatures which cannot reach the heaven. By presenting this image of the hell, a completely different and nearly modern opinion is given in contrast to the described hell in the Historia which is visited by Mephistophiles and Faustus and which is presented as a real and horrible place of the damned (see Historia von D.Johann Fausten 1988, chapter 24).

Faustus who is an overconfident character in Marlowe’s play is amused about Mephistopheles’s regrets of loosing heaven and tries to encourage him (see Marlowe 1998, p.147, [1.3] 1.84-87). It is nearly a humorous scene; a desperate devil is encouraged by a human. Mahal states regarding Mephistopheles’s behaviour: “Dieser Mephistophilis leidet unter dem Zwang, Teufel zu sein, Teufel sein zu müssen trotz oder gerade wegen der klaren Einsicht, daß das eigene Elend sich allein aus dem einmaligen Aufbegehren ableite, welches zum Sturz aus dem Himmel geführt hatte - und seine Tragik erhöht sich noch dadurch, daß Gottes Rache an den Aufrührern in Mephistophilis’ Worten als gerechte Sühne der Frevler erscheint!” This means that Mephistopheles knows that he and the other devils are damned because of their own faults and he might regret this revolt.

Furthermore, Mephistopheles suffers, but he and the other devils do not want to suffer alone, therefore Lucifer wants to “enlarge his kingdom” (Marlowe 1998, p.152, [2.1] 1.40). Mephistopheles says: “Solamen miseris socios habuisse doloris.” (Marlowe 1998, p.152, [2.1] 1.42) In this regard, Stevie Simkin explains: “The Latin phrase translates as the familiar modern saying, ‘Misery loves company’, and Mephistopheles goes on to admit that those who torture the souls in hell feel pain as great as they torment.”

Mephistopheles shows a complex maliciousness. On the one hand, he seems to be weak and suffers concerning his own situation, but on the other hand, he wants to attract others and

---

255 Mahal 1972, p.235
256 Mahal 1972, p.239
257 Mahal 1972, p.238
258 Simkin 2001, p.97
binds them to share the suffering. It seems that he can reduce his suffering by enjoying the pain of others. In the B-text of Marlowe’s drama, this aspect is intensified when Mephistopheles states at Faustus’s end: “Fond worldling, now his heart-blood dries with grief; / His conscience kills it, and his labouring brain/ Begets a world of idle fantasies/ To overreach the devil. But all in vain./ His store of pleasures must be sauced with pain.” (Marlowe 1998, p.239, [5.2] l.12-16) And furthermore, he says: “I do confess it, Faustus, and rejoice./ Twas I that, when thou wert i’the way to heaven,/ Dammed up thy passage. When thou took’st the book/ To view the Scriptures, then I turned the leaves/ And led thine eye./ What, weep’st thou? ’Tis too late. Despair, farewell!” (Marlowe 1998, p.241, [5.2] l.91-96)

Mephistopheles shows his gloating that Faustus having to pay for his overconfidence and that he has to bear the same suffering. But additionally, it shows an admonitory side of the devil. He, who knows the consequences of his failures, is always aware of God and his rules. Mephistophiles of the Historia also reminds Faustus: “…was hastu fuer einen grossen Vbermuth gebrauchet/ in allem deinem Thun vnd Wandel hastu dich nun/ dann Gott ist HERR/ der Teuffel ist nur Abt oder Muench [...] du soltest dem Teuffel nit so wol vertrawet haben/ dieweil er GOttes Aff/ auch ein Luegener vnnd Moerder ist...” (Historia von D.Johann Fausten 1988, p.116)

Here, the devil presents himself as a servant of God. His role is a tempter of the humans as well as an executioner of God. But this devil does not have the emotions of Marlowe’s devil. It seems that his statements are only presented as admonitions for the reader.

In summary, many similarities, but also several differences of the devil character’s arrangement exist between the Historia and Marlowe’s drama. Similarities often might occur by adopting aspects and scenes from the Historia by Marlowe. Both devils manifest themselves similarly, like a friar or magical shows. They have nearly the same name and they hold a maybe middle position in the hierarchy of hell. Mephistophiles of the Historia mentions that his master is Lucifer (Historia von D.Johann Fausten 1988, p.30). Furthermore, he reports that other devils rule parts of the hell and he seems to be subordinated to them (Historia von D.Johann Fausten 1988, pp.31, 52). Marlowe’s devil is also subordinated to Lucifer, but he gets help by some other devils, which might be subordinated to him (for example Marlowe 1998, pp.151-155, [2.1]). Their function is to make a pact with Faustus and to serve him by amusing and arranging journeys. In situations where they play tricks, they show a rough sense of humour.

Furthermore both characters also show violence. In the Historia, it is a rather physical violence, Marlowe’s devil shows physical and verbal violence. Especially in the speech parts, the characters differ. Mephistophiles of the Historia often gives precast explanations taken from other literary sources, while Mephistopheles of Marlowe’s Faust drama presents individualised descriptions and statements, especially about the hell. Thereby, emotions like suffering, but also gloating reveal. Therefore, one can state a further development between the devil of the Historia and Mephistopheles of Marlowe.

The nearly same few numbers of instances show that both devils are not the main characters. However, the distributions of the instances differ and stress different aspects like the high number of interactions of Mephistopheles in Marlowe’s drama or several explanations of the devil of the Historia.
The features of Mephistophiles of the Historia are summarised by Mahal: “Da der Ausgang des Spiels gewiß ist, genügt es für ihn, schablonenhaft und psychologisch einfältig zu sein, ein geist- und gefühlloser Bosheits-Automat [...] Des Teufels Anteil bei alledem war eher Reaktion denn Aktion, mehr abwartende Passivität als innovatives Eingreifen, mehr Vollstrecken als Bewirken.”\(^{259}\) One can agree that Mephistophiles is rather functional and is mostly used to make a pact with Faustus and to fulfil his wishes.

But, however Mephistopheles in Marlowe’s drama is not arranged in detail or individually, it should be mentioned that other characters in this drama are also not depicted individually. Excepting Faustus’s regrets at the end, this character is also only used as an example for the bad life and is not equipped with individual features or feelings. In addition, counting the text sections when he is present, Mephistopheles is a minor character. In this story, the emphasis is placed on Faustus’s life as a bad example and the moral intention. It seems that all characters act more functionally.

In contrast to the Historia, in Marlowe’s Faust drama, Christian morale is not so stressed. Faustus is presented as an individual who fails because of his overconfidence. Therefore, the devil also appears more individually. But as Mander explains: “Nachdem die Figur vorgestellt ist [...] kommt nichts Wesentliches hinzu: seine Charaktere lernen nicht aus ihrem Handeln und Erfahren, sie haben keine veränderbaren psychologischen Konturen.”\(^{260}\) For this reason, one can say even though Mephistopheles is presented with feelings, the character is not able to change in his nature. But one should also consider that a devil is not a human character so that his conception is also different. Mephistopheles has supernatural skills as well as another concept of life. As a devil, he also has to bear his destiny of being damned, which cannot be changed. Especially, this aspect is stressed by Marlowe. Mephistopheles is shown as an unhappy creature struggling with his destiny. Because of this new component, the devil character is enlarged from that in the Historia. This devil can be seen as a precursor to for example John Milton’s devil and further literary devilish characters, which show an ambivalence resulting from being bad, but which also are equipped with feelings.

### 7.1.2 Fallen Angels - Goethe’s two Dramas and Klinger’s Novel

In this section, the devil characters Leviathan of Klinger’s novel and Mephistopheles of Goethe’s two dramas and their mental representations included in the ontology, are analysed. Between Marlowe’s drama and the works of Klinger and Goethe, a larger period of time can be stated. But except from some reissues of the Historia by different authors, the motif of Faust and the devil is not developed further.

Apart from this motif, devil characters appear in other works like “Paradise Lost” of Milton so that the presentation of devil characters might be developed further outside the Faust literature. As mentioned in section 4.3, the novel “Fausts Leben, Taten und Höllenfahrt” of Klinger is released after Goethe’s “Urfaust”. In Klinger’s novel, a devil called Leviathan appears when Faust conjures him. Leviathan is sent by Satan’s order, but Leviathan is tired...

---

\(^{259}\) Mahal 1972, pp.229/230

\(^{260}\) Mander 1966, p.49
of humankind. In contrast to other Faust works, Faust is a typographer and a father of a poor family.
Figure 7.7: Diagram of instances of the characters Leviathan of Klinger and Mephistopheles of Goethe. Here, all classes, which contain instances of the mental representations of the characters Leviathan and Mephistopheles are depicted. Mephistopheles of Goethe is divided into two parts, because he appears in the two Faust dramas of Goethe. On the x-axis, the absolute numbers of instances are represented. On the y-axis, all classes, which contain instances, are given.
Faust wants to learn about the nature of the world and the humans and conjures therefore the devil. He stresses the virtue of humankind so that the appearing Leviathan accuses him of his false image of the world. Faust who is outraged, suggests a bet that he can change Leviathan’s mind concerning his negative opinion. The devil agrees on this bet and promises to show him the human world in its true nature.

Step by step, Faust is guided to different situations in which the evilness of humans is presented. From the bourgeoisie to the king’s and pope’s court, all kinds of negative behaviour like greed for money, profligacy, and corruption, appear in all social classes. Faust becomes more and more frustrated. By using Leviathan’s power, he tries to take the law into his own hands, but then he becomes responsible for new miseries of other characters. At the end, Faust’s family is destroyed by a young man who was saved earlier by Faust and Leviathan. He triumphs over a desperate Faust, kills him and carries him to hell.

Goethe’s Faust story is divided into two nearly independent dramas. In the first drama, the devil Mephistopheles receives the permission from God to seduce Faust. Mephistopheles creeps as a black poodle in Faust’s house. Faust soon recognises a devilish ghost in this animal shape and conjures the poodle so that Mephistopheles appears as a scholast. After some conversations, Mephistopheles offers a pact to Faust who refuses it at first. He believes that a devil is not able to give him more than mean enjoyment. Because of Faust’s ideas of an academic life, which is guided by discoveries, he does not want to be attracted by any other pleasures. Mephistopheles responds on Faust and they agree on an additional bet: If Faust enjoys a moment so that he wishes to stay in that moment, then Mephistopheles is allowed to gain his soul immediately.

After the pact and the additional bet, Mephistopheles tries to attract Faust, but he is tired by all of it. For this reason, the devil administers him a magical drink for rejuvenation. Faust falls in love with Margarete, a young woman, who is seduced by him with the help of Mephistopheles. Faust does not know that she got pregnant. The devil tries to distract him, but Faust remembers Margarete and demands to save her from prison where she was sent to because of murder of her child. But when Faust and Mephistopheles want to save her, Margarete refuses the offered escape and stays there.

In Goethe’s second drama of Faust, Faust awakes from a deep sleep, and is delivered from his desperation. Then, he is guided to different situations: Faust and Mephistopheles take part in attractions for the emperor. There, Faust falls in love with Helen of Troy who is conjured by him. With help of Mephistopheles, who appears as the antique creature Phorkyas, Faust is introduced into the antique world. He is able to meet Helen and to spend a short time with her. Afterwards, by using Mephistopheles’s magical abilities, Faust wins a war and therefore, he earns a piece of land at a coast. He enlarges his area and accepts that Mephistopheles kills an old couple to gain more land. Faust lives to a ripe old age. When Mephistopheles expects Faust’s death, he does preparations to gain his soul. Faust says that he would enjoy this moment and reminds to their bet. But it seems that he dies because of his old age and not because of losing the bet. Mephistopheles, who wants to catch his soul, demands other devils to help him. Appearing angels, who disperse roses, confuse the devils including Mephistopheles. Mephistopheles, confused by his own feelings for the angels, forgets to keep an eye on Faust’s
soul and the angels are able to take it with them. In the final scene, Faust appears together with female penitents and Margarete, who was also saved.

For analysing Leviathan and Mephistopheles, the following hypotheses are stated: Both devils have a detailed designed personality and have included several aspects, which show a development of devilish characters. A second assumption is that both characters inherit different features of the conception of a fallen angel, like in Milton’s “Paradise Lost”. But the character of Leviathan seems to be more powerful, whereas Mephistopheles seems to have a weaker position in the fictional world.

The mental representations of the devil characters are presented, as mentioned, in large numbers of instances in the ontology (see also Fig. 7.7). For Leviathan, 195 different instances were created; Mephistopheles in Goethe’s first Faust drama is described by 139 instances and in the second drama by 135. The character of Mephistopheles appearing in Goethe’s two dramas is identified as the same character, however it is not clear if a character appearing in two works is really identical. But here, in the second drama, the story of Faust and Mephistopheles continues. One can assume that the author does not create a complete new character, but because of the large period of time between the two works, some differences might have occurred. Regarding figure 7.7, one can observe that the mental representations of Leviathan and Mephistopheles are widely distributed over the classes in the ontology. For example, the representations of Goethe’s Mephistopheles consist of a lot of parts included in the category of speech. In the diagram, the representation of Leviathan also has a lot of instances in the categories of speech, but the instances of his representation are added to more classes of the ontology than Mephistopheles’s representations. As mentioned, the representations of Leviathan and Mephistopheles are rather large, which leads to the assumption that they also have a main position in the works of Klinger and Goethe. In this thesis, it is not possible to analyse all instances of these characters and their representations. For this reason, selected parts of the representations of the characters will be analysed in the following. According to the categories of features, non-verbal and verbal actions, aspects that seem to be important for the characters and their representations, are chosen and exemplarily analysed.

It is interesting that Klinger’s devil character is named Leviathan and not Mephistopheles. Regarding other stories in the tradition of the Faust motif, he is the only devil character with another name. This name can derive from different sources: It is a name of a biblical monster⁶⁶ as well as a title of a book written by Thomas Hobbes (1641) concerning the structure of society. The different name can be related to Klinger’s trial to write an independent Faust story. In the preface of the novel, the author states that he does not use other Faust stories and wants to create an own novel (Klinger 1986, p.8). Geerdts explains:

“Klinger wußte genau, daß er sich einerseits mit dieser Tradition auseinanderzusetzen hatte, daß er andererseits kurz nach Erscheinen des Fragments Goethes sich von jenem abgrenzen müßte. [...] Klingers eigenständige, originelle Verwertung des Sujets steht außer Zweifel. Zum anderen aber besteht kein Grund, seine Bemerkung so aufzufassen, als ob der Autor sich nicht intensiv mit dem Vorhandenen beschäftigt hätte, [...]” (Geerdts 1960, p.61)

⁶⁶Müller 1992, p.75
This means that Klinger wants to produce a different story, but with his work, he still stays in the tradition of telling the story about Faust and the devil. In contrast to Klinger, Goethe names his devil character Mephistopheles in tradition of devil characters. As mentioned in section 4.3, Hendel assumed that Goethe knows a play of puppetry and is influenced by it. A similarity between the two characters can be observed by regarding their ranks in the hierarchy of hell. Both have not the position of main devils, but they are not of the lowest rank. Leviathan is a sovereign of hell, subordinated to Satan, the emperor of hell (see also Klinger 1986, p.31). Mephistopheles says to Faust: “Ich bin keiner von den Großen;” (Goethe 1985, l.1641) In the Faust dramas of Goethe, no explicit hierarchy or a main emperor are mentioned.

Features

![Diagram of feature instances of the characters Mephistopheles of Goethe and Leviathan of Klinger. Here, the classes for inner and outer features of the ontology on the y-axis and the absolute numbers of included instances of the characters and mental representations on the x-axis are depicted.]

In their function as devils, Leviathan and Mephistopheles are equipped with magical features, like transformations or creating things (included in the mental representation and added to the categories “change_form” or “create_object” of the ontology). Some of their abilities are selected and analysed here.

---

Hendel 1969, p.16
Most of the devils’ appearances, which are also mentioned in the mental representations, are human-like and related to their service to Faust. Mephistopheles appears as a travelling scholastic (Goethe 1985, l.1321a/1321b) in Faust’s study. Later, before guiding Faust into the world, he appears as a nobleman: “Bin ich, als edler Junker, hier./ In rothem goldverbrämt'n Kleide,/ Das Mäntelchen von starrer Seide, Die Hahnfeder auf dem Hut,/ Mit einem langen, spitzen Degen...” (Goethe 1985, l.1535-1539) Albrecht Daur mentions: “Der stets Maskierte kommt, da es nunmehr weltmännisch aufzutreten gilt, in neuer Maske, kommt als edler Junker, Faust die Grillen zu verjagen und ihn endlich seiner engen Zelle zu entführen, in die Welt hinaus.”

Regarding the costumes of a scholast and a nobleman, Mephistopheles chooses his appearances according to the different situations: As a scholast, he begins to debate with Faust and as a nobleman, he wears a costume suiting to his intention of guiding Faust.

Leviathan also changes his appearance. At first, when Faust conjures him, he appears as follows:

“...Faust sah eine lange Gestalt vor sich, die sich unter einem roten Mantel verbarg. [...] Der Teufel schlug den Mantel zurück, und stund in erhabner, staatlicher, kühner und kraftvoller Gestalt vor dem Kreise. Feurige, gebietrische Augen leuchteten unter zwei schwarzen Brauen hervor, [...] Diese Furchen verloren sich in einer glatten, hellen, hochgewölbten Stirne [...] Eine feingebildete Adlernase zog sich gegen einen Mund...” (Klinger 1986, pp.41/42)

It seems that he chooses this appearance to impress Faust: His entrance, at first, covered by his coat, then opening the coat, is spectacular like for a performance on stage. Remarkable is also the detailed description of his human face. The impressive and maybe scaring eyes and his aristocratic lineaments correspond to his staging in front of Faust. One can state that Leviathan shows a kind of darksome beauty, but he is also scaring. It reminds of later descriptions, for example in Gothic novels or in vampire films. Mephistopheles’s appearance is not described in detail mostly, and therefore also not in the mental representation. He is also neither described as beautiful nor impressive. Here, the authors Klinger and Goethe might borrow the devil’s conception from different traditions: Goethe seems to use a traditional picture of the devil as mentioned in the Historia, whereas Klinger might relate his description to Milton’s Satan. When Milton’s Satan is banished to hell and lies on hell’s ground, he is also described as gigantic and powerful.

Furthermore, in his service to Faust, Leviathan appears as a rich man (Klinger 1986, p.55) and a nun (Klinger 1986, p.82). Both devils use these kinds of appearances by their service to Faust and to satisfy his desires. Leviathan’s real shape is also mentioned. It is described in detail, when he intends to carry Faust’s soul to hell:


263 Daur 1950, p.57
264 see Milton 2000
This appearance consists of terrifying elements, but at the same time, it also presents his power and majesty. Faust is paralysed and scared so that Leviathan can prevail over him.

In contrast to Leviathan, Mephistopheles of Goethe changes his shape to forms that are not mentioned in Klinger’s novel. Mephistopheles approaches Faust in form of a black poodle during a walk with Faust’s famulus Wagner (see Goethe 1985, l.1147-1177). Faust conjures the poodle and after a series of changes, also into a ghost, Mephistopheles appears as a travelling scholar (see Goethe 1985, l.1298-1321b). Thereto, Resenhöft explains that he tries to scare Faust and to elude from the conjuration. Neither in the first drama of Faust nor in the second one, Mephistopheles’s real shape is mentioned. In the second drama, Mephistopheles takes the role of a jerk to amuse the members of the emperor’s court. Later, taking part in Faust’s adventure in the antique world, Mephistopheles borrows the shape of Phorkyas, an antique monster: “Drück du ein Auge zu, ’s ist leicht geschehn,/ Laß alsofort den Einen Raffzahn sehn,/ Und im Profil wirst du sogleich erreichen,/ Geschwisterlich vollkommen uns zu gleichen.” (Goethe 1972, l.8022-8025) Resenhöft explains about Mephistopheles’s different appearances: “...die Verschiedenheit seiner Gestalten ist nicht gleichgültig für die Erkenntnis seines Wesens; sie modifizieren den Klang seiner Stimme und den Gehalt seiner Worte in entscheidender Weise.” This means that Mephistopheles uses his masks to provide his particular requests. Thus, he is also able to change his behaviour and to fit to the situations. In contrast to Leviathan, Mephistopheles has a larger repertoire of shapes or masks. Leviathan mostly appears in a human shape, whereas Mephistopheles also uses animal or fantastic forms. This might refer to older appearances of the devil. But Leviathan shows his real shape twice; he does not always cover it like Mephistopheles. One can assume that Leviathan feels safer than Mephistopheles. Both devil characters use human shapes to act on the world, mostly to serve Faust.

**Plans and Preparations for the Pact**

Similarities but also differences can be noted comparing plans and pact conditions of the devils. Comparing the intentions of the devils and the pact situations, it is also necessary to include and analyse aspects, which might focus more on the pact motif than on the character representation. In the following, verbal and non-verbal actions concerning the pact and included in the mental representations of the devil characters are mixed. Although the focus lies more on motifs than on the characters, the pact and its motivation are important for other actions of the devil characters and should not be neglected.

A part of the preparation for the pact between Goethe’s Faust and Mephistopheles is performed in the scene “Prolog im Himmel”. Mephistopheles of Goethe is allowed to appear in the heaven and is allowed to talk to God. God calls Mephistopheles’s attention to Faust. Mephistopheles, who also observed Faust, mocks about him (Goethe 1986, l.300-307). He is also aware of Faust’s excesses and demands to gain knowledge about the nature of the world. Furthermore, he mentions a strong characteristic of Faust, his dissatisfaction. But God refuses Mephistopheles’s criticism and keeps believing in Faust’s good abilities (Goethe 1986, l.308-311). Mephistopheles tries to challenge God and suggests a bet that he can seduce Faust (Goethe 1986, l.312-314).

---

265Resenhöft 1970, p.22
266Resenhöft 1970, p.17
It is not clear if God agrees on the bet, but he allows Mephistopheles to approach Faust\textsuperscript{267} (Goethe 1986, l.315-317) But because of his beliefs in the good nature of his human beings, God assumes that even when Mephistopheles tries to seduce Faust, Faust will keep his ambition (Goethe 1986, l.324-329).

According to Hermann Ammon, God assigns a new task to Mephistopheles. He should discover in Faust the good nature of God’s creatures.\textsuperscript{268} Rudolf Eppelsheimer entitles this as the positive mission of Mephistopheles.\textsuperscript{269} In this scene, God suggests a test to Mephistopheles and gives him a plenty of rope, because God’s creatures, human beings, are able to find the right way.

This permission is motivated by God’s comment:

\begin{quote}
Ich habe deinesgleichen nie gehaßt./ Von allen Geistern die verneinen,/ Ist mir der Schalk am wenigsten zur Last./ Des Menschen Tätigkeit kann allzu leicht erschaffen./ Er liebt sich bald die unbedingte Ruh;/ Drum geb ich gern ihm den Gesellen zu,/ Der reizt und wirkt, und muß als Teufel, schaffen-” (Goethe 1986, l.337-343)
\end{quote}

Thereby, the devil’s function in the world is given. In contrast to older definitions, Mephistopheles is used by God to activate the potential of human beings.\textsuperscript{270} Mephistopheles’s negative intentions are used to provoke human beings and to keep them from being inactive. In God’s plan, the negativity of the devil is qualified and still used in God’s intention. Mephistopheles seems to ignore God’s statement and demands as a prize of his suggested bet: “Wenn ich zu meinem Zweck gelange,/ Erlaubt Ihr mir Triumph aus voller Brust.” (Goethe 1986, l.332/333)

According to Eibl, Mephistopheles is not so strongly interested in gaining a single soul, but satisfying his desire for revenge.\textsuperscript{271} For this reason, he ignores God’s explanation of the devil’s function. Maybe he is not able to see himself as a function in God’s plan, otherwise he would question his existence of being a seducer.

A preparation for the pact is also presented in Klinger’s novel. Faust, who uses magic to gain more knowledge, discovers the production of the letterpress, but because of his expensive invention, he and his family are reduced to poverty. For this reason, he sends a call to the hell, which resounds there during a banquet of the devilish society. In contrast to the scene of Goethe’s drama with God and Mephistopheles, the attention to Faust is drawn by Satan. Satan, the leader of the devils, states coaxing words to his favourite Leviathan, then he requests:

\begin{quote}
Fahre hinauf, verjage den Dunst der Schulweisheit aus seinem Gehirne. [...] Er sehe Böses aus Gutem entspringen, das Laster gekrönt, Gerechtigkeit und Unschuld mit Füßen getreten, wie es der Menschen Art ist. Führe ihn durch die wilden, schrecklichen Szenen des menschlichen Lebens, er verkenne den Zweck, verliere unter den Greueln den Faden der Leitung und Langmut des Ewigen. Und wenn er dann abgerissen steht von allen natürlichen und himmlischen Verhältnissen, [...] \end{quote}

\textsuperscript{267} see also Müller 1984, p.218, Daur 1950, p.18
\textsuperscript{268} Ammon 1932, p.33
\textsuperscript{269} Eppelsheimer 1982, p.66
\textsuperscript{270} see also Daur 1950, p.21, Müller 1984, p.218
\textsuperscript{271} Eibl 1999, p.274


Chapter 7 A Computer-Aided Analysis of Devil Characters in the Faust literature

This statement contains a detailed plan and aims at gaining Faust’s soul. Satan asks Leviathan to attend to Faust by showing him the human society in the most negative way. This guidance should result in Faust’s desperation and destruction of his attitude. Finally, Leviathan should present the results to Faust and then bring him to hell. In this statement, Satan shows that he already detected Faust’s weak point, his strong beliefs in the good nature of the humans, which Leviathan might exploit. Christoph Hering explains: “...indem die triebhafte Kraft des Helden ausgehöhlt und zugleich die Wirklichkeit durch Enthüllung von Greueln entwertet wird, verliert Faust die Stärke, der chaotischen Welt der Erfahrung einen Sinn entgegenzusetzen.”

This already contains the core of the proposed guidance.

The scene in the hell seems to be an opposed situation to Goethe’s “Prolog im Himmel”. It is interesting that both, Leviathan and Mephistopheles, do not directly choose the Faust characters as their victims, they are ordered by Satan and God, respectively.

Leviathan is not amused about Satan’s order: “Satan, warum endest du dich abermals an mich? Du weißt es, mir ist das ganze Menschengeschlecht und die Erde, ihr Tummelplatz, längst zum Ekel geworden.” (Klinger 1986, p.33) It follows a grim criticism about people, especially Germans (Klinger 1986, p.33). But by Satan’s order, Leviathan has to appear on earth to make a pact with Faust.

Part of the preparation in Goethe’s first drama is also Faust’s desperate trials to gain knowledge (Goethe 1986, l.382/383). Mephistopheles already detected Faust’s wishes. After Faust’s first efforts fail, he becomes desperate which seems to be a sign for Mephistopheles to appear on stage. As mentioned above, the devil appears in the shape of a poodle and is taken home by Faust. He starts disturbing Faust’s work and is conjured by him. Before Mephistopheles can make the pact with Faust, he has to appear twice because as Daur states the first situation seems not to be good enough for a pact. Mephistopheles, who wants to disappear, is unable to move out because of a pentacle. Faust tries to take his advantage, but Mephistopheles, who feels his disadvantage in this situation (Goethe 1986, l.1403-1405, 1413-1415), and does not want to agree on a pact as weaker partner, escapes (Goethe 1986, l.1516-1524). Although Mephistopheles has to show his weakness and limitations, he is able to go a step for the pact. In a second scene, when Faust again feels desperately, Mephistopheles appears again. Now in a better position, Mephistopheles makes him the offer of a pact:

“Doch willst du mit mir vereint/ Deine Schritte durchs Leben nehmen,/ So will ich mich gern bequemen,/ Dein zu sein, auf der Stelle./ Ich bin dein Geselle,/ und mach’ ich dir’s recht./ Bin ich dein Diener, bin dein Knecht!” (Goethe 1986, l.1642-1648)

---

272Hering 1966, p.277
273Daur 1950, p.54
The devil offers to accompany Faust and to satisfy his wishes. Faust, who is sceptical, asks for the conditions (Goethe 1986, l.1649, 1650-1655). Mephistopheles suggests: “Ich will mich hier zu deinem Dienst verbinden./ Auf deinen Wink nicht rasten und nicht ruhn:/ Wenn wir uns drüben wiederfinden,/ So sollst du mir das gleiche tun.” (Goethe 1986, l.1656-1659)

The pact should persist for Faust’s lifetime. Weigand analyses that the first part of the pact contains Mephistopheles’s service to Faust, which is similar to other pact conditions in Faust works. Mephistopheles seems to be sure of gaining Faust’s soul and he ignores God’s speech.

Mephistopheles calls up Faust to make the pact with him and the devil seems to be afraid that Faust would change his mind. For this reason, he includes the promise to serve him with plenty of things (Goethe 1986, l.1672-1674). But Faust, amused over this promise, mocks on Mephistopheles by saying that the devil would not be able to satisfy him by his service (Goethe 1986, l.1675-1687). Mephistopheles answers: “Ein solcher Auftrag schreckt mich nicht,/ Mit solchen Schätzen kann ich dienen./ Doch, guter Freund, die Zeit kommt auch heran,/ Wo wir uns alles Gute schmausen mögen.” (Goethe 1986, l.1688-1691) Faust is outraged by Mephistopheles’s offer: “Werd’ ich beruhigt je mich auf ein Faulbett legen,/ So sei es gleich um mich getan!/ Kannst du mich schmeichelnd je belügen,/ Daß ich mir selbst gefallen mag,/ Kannst du mich mit Genuß betrügen,/ Das sei für mich der letzte Tag!/ Die Wette biet’ ich!” (Goethe 1986, l.1692-1698)

Here, Faust shows his negative opinion about pleasures and enjoyments. It does not mean that he does not enjoy Mephistopheles’s amusements, but he does not want to dwell on them. That is why he suggests a bet to Mephistopheles: If Faust enjoys something so much that he wants to keep a moment, Mephistopheles would win and get Faust’s soul at that moment (Goethe 1986, l.1699-1706). Faust’s antipathy against pleasure and enjoyment is based on his opinion that then he would resign on his ambitions. Faust wants to stay active and does not want to forget his ambitions by unimportant pleasures. Dwelling on something would also stop his academic research. However, he wishes to receive something from Mephistopheles’s service, although he assumes never to be satisfied in gaining knowledge. Mephistopheles quickly agrees on the suggested bet, because it seems advantageous for him. The devil specialised on pleasures, believes that it would be an easy task and he can reduce his time of the service to Faust.

---

274 But Weigand emphasises the ambiguity of the German “wenn” included in the second part of the conditions. It can be used temporally as well as conditionally (Weigand 1984, pp.415/416). Thus, the condition of the second part might be unstable, because adding God’s intention to it, it is not clear that Faust will end in the hell. But only in the hell, Faust has to serve Mephistopheles.

275 Weigand 1984, p.415

276 see Franz 1953, pp.47/48, Hohlfeld 1984, p.396

277 see Hohlfeld 1984, pp.396/397

278 see Ammon 1932, p.84

279 see Hohlfeld 1984, p.397

280 It should be noted that in literature, different opinions about this scene are given. Some researchers assume that Mephistopheles and Faust only agree on a bet (Hohlfeld 1984, p.394), some believe in a pact and an additional bet (Mahal 1972, p.358). But there is also the opinion that Mephistopheles assumes a pact and Faust assumes a bet (Weigand 1984, p.416). The author of this thesis agrees on the opinion of a pact and an additional bet, for a longer discussion see also Zöllner-Weber 2004 [Master’s Thesis]. In addition,
Regarding Mephistopheles’s intention, in addition to God’s plan, Mephistopheles also develops a plan – which occurs in the mental representation as a speech action – concerning winning Faust’s soul. In the talk with God, Mephistopheles states: “Staub soll er fressen, und mit Lust...” (Goethe 1986, l.334) Mephistopheles’s full intention is not yet elaborated in this scene. One can already observe parts of Mephistopheles’s intention. Rainer Dorner says:

“Mephistopheles aber ist sich sicher, mit seinen Mitteln, Sexualität und Geld, den Menschen dahin zu bringen, daß er “Staub ... fressen, und mit Lust” werde. Sexualität und Streben nach irdischem Besitz, beides das “Böse” für die christliche Religion und die ihr verpflichtete Dichtung...” (Dorner 1976, p.56)

As mentioned, Mephistopheles complains about Faust’s proud attitude and according to Dorner, one can say that the devil wants to misguide Faust so that he quits this attitude. Hohlfeld says that the word “Staub” is used in the sense of all mean things.281 This means by offering mean pleasures to him, Faust should betray himself and give up his attitude so that also God would fail in his opinion.282

In the scene “Studierzimmer II”, Mephistopheles repeats his intention in more detail:

“Der ungebändiget immer vorwärts dringt,/ Und dessen übereiltes Streben/ Der Erde Freuden überspringt./ Den schlepp’ ich durch das wilde Leben,/ Durch flache Unbedeutentheit,/ Er soll mir zappeln, starren, kleben,/ Und seiner Unersättlichkeit/ Soll Speis’ und Trank vor gier’gen Lippen schweben;/ Er wird Erquickung sich umsonst erflehn,/ Und hätt’ er sich auch nicht dem Teufel übergeben,/ Er müßte doch zugrunde gehn!” (Goethe 1986, l.1857-1867)

Mephistopheles wants to draw Faust’s attention to material things and mean pleasures.283 As a devil, Mephistopheles is predestinated to make mean things available and to draw human beings off from their high ambitions.

In Klinger’s novel, the agreement between Leviathan and Faust is different. At first, Faust demands that Leviathan satisfies all his wishes and that he can gain knowledge about the world (Klinger 1986, p.44). The annoyed Leviathan refers to Faust’s boundedness as a human being who is not able to understand the complete nature of things (Klinger 1986, p.45) Leviathan refuses this demand again because of his disability as a fallen angel, which is also bounded. But Faust does not quit and demands that the devil speaks in the language of ghosts to him. Leviathan complies with Faust’s demand, but Faust is not able to understand him and is frustrated by the devil again.284 The conversation between Leviathan and Faust is

---

281 Hohlfeld 1984, p.389
282 see Ammon 1932, p.90
283 see Kluge 1982, pp.219/220
284 see Mahal 1972, p.312
prevailed by refusals and both try to mock on each other. Leviathan mocks on human virtue so that Faust states: “Taste nur noch den moralischen Wert des Menschen an, wodurch er sich den Unsterblichen nähert, und der Unsterblichkeit würdig macht!” (Klinger 1986, p.49) Here, Leviathan exploits Faust’s weakness. Faust feels hurt because he beliefs in the virtue and morality of human beings. The devil provokes Faust:

“Ich will dich auf die Bühne der Welt führen, und dir die Menschen nackt zeigen. Laß uns reisen, zu Wasser, zu Land, zu Fuß, zu Pferde, auf dem schnellen Winde, und das Menschengeschlecht mustern. Vielleicht, daß wir die Prinzessin entzaubern, um welche sich schon so viele tausend Abenteurer die Hälse gebrochen haben.” (Klinger 1986, p.50)

Regine Seibert describes Leviathan’s offer as followed: “Statt dessen rät er ihm, auf spekulative Grübelei zu verzichten und den Blick auf die Erfahrungswelt zu lenken, um Aufschluß über seine Fragen zu erlangen.”\footnote{Seibert 1981, p.78} Instead of theoretical research, Leviathan wants to show him the real world of human beings. Because of the opposing opinions, Faust suggests a bet: “Topp! Ziehen wir durch die Welt; ich muß mich durch Genüß und Veränderung betäuben; [...] Laß uns herumziehen, und ich will dich Teufel zwingen, an die Tugend der Menschen zu glauben.” (Klinger 1986, p.50) One can say that Faust’s beliefs in morality are so strong that he thinks that also enjoyments and pleasures cannot have a negative affect on him. Mahal thinks that Faust quits with his first demand of gaining knowledge about the world, because Leviathan addresses Faust’s mean interests.\footnote{Mahal 1972, p.276} Leviathan agrees on the bet: “Dann will ich als Lügner zur Hölle fahren, und dir den Bundbrief zurückgeben, den du heute, mit deinem Blute, unterzeichnen wirst.” (Klinger 1986, p.50) This means that additional to a traditional pact, both agree on an bet. But it is not clear if pact and bet are merged or seen as separate agreements. However, the bet is a reason why Faust conjoins to Leviathan. Afterwards, the devil demonstrates directly his plan to Faust:

“Ich will dich von Stufe zu Stufe führen; haben wir diese Bahn durchlaufen, so wird sich schon eine andere Szene öffnen. Lerne erst kennen, was so nah mit dir verwandt ist, dann steige aufwärts. - Die Schätze der Erde sind dein - du gebietest meiner Macht - [...] du sollst mich, den Teufel, zu Beförderung der Absichten zwingen können, die ihn gut und edel nennt, die Folgen davon sollen deine Ernte, und der Lohn deines Herzes Gewinn sein.” (Klinger 1986, pp.51/52)

He plans to introduce Faust step by step in different groups of human society. One can observe that he repeats Satan’s plan. In addition, Leviathan wants to serve Faust with material things and to satisfy his wishes. This aspect is interesting because by using Leviathan’s power, Faust would also be able to do positive things. Leviathan seems to be generous, but he knows that Faust’s interventions will result in the misery of other characters. Mahal also thinks that because of Leviathan’s ability of foresight, he offers his service to Faust.\footnote{Mahal 1972, p.314}

In Klinger’s novel, the opposing opinions, influenced by different directions, of Leviathan and Faust are the centre of the bet. Summarising the preparations and pact scenes, one can con-
clude some similarities, but also differences. Both devils have to draw their attention to Faust guided by another character: In Goethe’s first drama, God mentions Faust, whereas Satan asks Leviathan to do a pact with Faust. In contrast to Leviathan’s actions, Mephistopheles acts more actively and also performs more actions, like his transformations. He already observed Faust.

A characteristic of Leviathan is that he is tired of the human beings, whereas Mephistopheles is eager for gaining Faust’s soul. Therefore, he uses all kinds of tricks, for example appearing as a poodle to make a pact with Faust. But his victim is unstable in his decisions so that Mephistopheles has to figure out Faust’s moods. He also has to work against the power of God who believes in Faust.

In addition to the contract of the pact, Faust and Mephistopheles make a bet, which seems to be an advantage for the devil. Mephistopheles is certain that he can satisfy Faust with pleasures so that he can reduce his time of serving Faust. Faust, who dislikes enjoying all kinds of material and physical pleasures and does not want to give up his ambition of being active, believes that he will not be addicted to a moment of enjoyment. Leviathan seems to be rather disinterested and does not regard Faust as coequal. But Faust demands actively for the service of the devil and tries to rule him. Between these two characters, a strong and negative tension exists continuously from the beginning of their first meeting. This results in the bet about the morality of human beings. Here, in Klinger’s novel, a different facet is introduced. As Seibert states: "Leviathan ist der Empirist, der Faust von seinen schwärmischen Idealen (i.e. dem Glauben an die geistig-morale Natur des Menschen und an das Wirken einer Providenz, von der er Rechenschaft fordert) kurieren will."²⁸⁸ Both, Leviathan and Faust, try to prove their opinion. Comparing the bets in Goethe’s and Klinger’s works, one can discover different cores of the agreements. Hereby, the two works of Goethe and Klinger differ. In the next sections, actions of the devils are analysed to describe the execution of the pacts and bets in the continuations of the plots.

Actions

Regarding non-verbal actions, added to the mental representations of both devils and which are depicted in Fig. 7.9, it seems that Mephistopheles has less actions than Leviathan. In the classes “act_on_subject”, “act_on_object”, and their subclasses, there are often not more than one or two instances. Most of these actions are related to Faust and the service to him. For example, Mephistopheles performs actions like preparing his coat so that Faust and Mephistopheles can fly on it and they discover the world (Goethe 1985, l.2065-2070) or he produces wine to amuse guests in the scene “Auerbachs Keller” (Goethe 1985, l.2265a/2265b). Then, he banter’s the guests by burning the wine and bewitches them. He also uses magical boots to reach Faust (Goethe 1985, l.10066a/10066b). All these actions are performed by using magic and they show Mephistopheles’s supernatural skills. But the actions are limited, maybe because of the form of the drama genre. Mephistopheles’s verbal actions, which are analysed later, occur more often and can reveal more of his nature.

Leviathan performs numerous actions, which are also mostly related to the service to Faust. In the class “act_on_subject”, Leviathan’s actions are described in more than 25 instances.

²⁸⁸ Seibert 1981, pp.78/79
Although the instances in the class “act_on_object” are not so numerous, the representation of his actions still consists of more instances than for Mephistopheles’s actions.

According to older images of the devil, he is able to produce treasures, money and other valuable things (see also the scenes when Leviathan produces treasures for Faust (Klinger 1986, pp.76/77), tries to impress Faust (Klinger 1986, p.52), gives Faust values so that he can seduce women in Rome (Klinger 1986, p.179)).

In the first episode of Leviathan’s guidance, the effect of these values can be observed, when the devil makes an offer to a mayor: “...seine Faust sei ganz unsinnig, in die schöne Bürgermeisterin verliebt [...] und wenn die Bürgermeisterin sich auf einige Augenblicke mit Fausten entfernen wollte, das bei dem Geräusche eines Schmauses so leicht wäre, so sollte er ihr den Adelsbrief zustellen.” (Klinger 1986, pp.62/63) The mayor agrees on that deal and Faust seduces the mayor’s wife. In this episode, Leviathan demonstrates Faust how easily people can be manipulated. By using such values, Leviathan gives Faust the power to have control over other people. Later, the patent of nobility is removed from the mayor (Klinger 1986, p.68), which also shows the fragility of honours and goods. In addition, Leviathan creates similar situations, e.g. the seduction of a monk (Klinger 1986, pp.73-75), or the seduction of a nun by Faust (Klinger 1986, p.87). These situations always present the cupidity of human beings.
The devil is able to detect the weakness and wishes of people. Mahal also states: “Leviathan [...] ist ein kühn berechnender Regisseur von Fausts Weltfahrt, der sich überall auskennt und alles Kommende voraussieht...” These manipulations belong to Leviathan’s plan to destroy Faust’s beliefs in the morality of the human beings.

Among the actions belonging to the service to Faust, they are also several murders, which are mostly ordered by Faust. For example, Leviathan burns down the hut of a hermit who acted against his vows and who committed sins (Klinger 1986, p.75). By Faust’s order, Leviathan also murders a cruel sovereign: “Der Teufel erwürgte den Fürsten auf seinem weichen Lager, faßte den bebenden Günstling, und schleuderte ihn in den glühenden Sand Lybiens...” (Klinger 1986, p.112) Harro Segeberg comments this action: “Die zügellose Wut des enttäuschten Sturm und Drang-Helden dokumentiert sich in der grausamen Vergeltung, die Leviathan im Auftrag Fausts am Fürsten übt...” Leviathan is often willed to retaliate upon other characters for their misdoings. In addition, Leviathan tries to kill the pope, but the pope seems to be protected by an act of God (Klinger 1986, p.189). Most of these characters are cruel and unfair, but by taking the law into his own hand, Faust becomes more and more depressed because of these murders. His orders executed by Leviathan are not better than the brutality of the other characters. Again, all these actions are performed in order to destroy Faust’s beliefs in morality.

It seems to be unusual, but helping and rescue operations are also a part of Leviathan’s behaviour and his mental representation. For example, Faust orders to rescue a drowning young man (Klinger 1986, p.87). Leviathan warns him that the rescue of this man will have bad consequences, but after Faust’s repeated order, he rescues him (Klinger 1986, pp.87/88). Leviathan’s rescue operations also often result in new injustice.

Furthermore, similar to Goethe’s Mephistopheles, Leviathan performs magical actions, e.g. in several instances of the class “movement”, descriptions about appearing and disappearing are stated. Often, the devil appears or disappears with spectacular effects like vapour (Klinger 1986, p.41). This kind of action refers to a more traditional image of the devil. By acting in this manner, it might be aimed at scaring or eerie effects. According to this traditional image, Leviathan’s ability to fly is also often mentioned. By flying, Leviathan together with Faust is able to reach locations in short time (Klinger 1986, pp.68, 163, 205). In addition, during a dinner, the devil presents a magical show to a mayor and his guests (Klinger 1986, p.66). Hering states: “...indem er [Faust] mit Teufels Hilfe das Wildbret beim Gelage lebendig werden läßt, was an Auerbachs Keller erinnert.” Agreeing on the opinion of Hering, one can observe some parallels between Leviathan’s and Mephistopheles’s magical shows.

Speech
The mental representations of the devils have large numbers of instances in the classes of speech in the ontology (see Fig. 7.10). For example in the representation of Goethe’s Mephistopheles, more than 30 and 40 instances, for the second drama respectively, are included in the class of statements about subjects. For Leviathan, fewer instances are included there, but his other
Figure 7.10: Diagram of instances of the characters Mephistopheles of Goethe and Leviathan of Klinger in the classes for speech. Here, all classes belonging to speech are given on the y-axis and the absolute numbers of their included instances of the mental representations of the characters are given on the x-axis.
kinds of speech are also enormous. It seems that the devil characters have a special quality by performing speech. Because of these high numbers, only important types of speech, mostly statements and reminders, are selected and analysed here.

At first, statements and commentaries by the devil characters are analysed. These statements often show, maybe not objectively, a perspective on the other characters. Goethe’s Mephistopheles continuously states commentaries about events performed on the stage. For example, Mephistopheles steadily comments the love between Faust and Margarete as well as Faust’s behaviour. He sneeringly comments about Faust’s eager behaviour to get Margarete’s attention: “So ein verliebter Tor verpufft/ Euch Sonne, Mond und alle Sterne/ Zum Zeitvertreib dem Liebchen in die Luft.” (Goethe 1985, l.2662-2864) Mephistopheles seems to be amused about Faust’s love and takes it as sentimentality. The devil also knows that he promoted Faust’s rejuvenation and thus his cupidity by giving him magic potion in the kitchen of a witch. There, Mephistopheles states more addressed to himself than to Faust: “Du siehst, mit diesem Trank im Leibe,/ Bald Helenen in jedem Weibe.” (Goethe 1985, l.2603/2604) This comment relativises Faust’s love to Margarete and it is unclear if it is more Faust’s cupidity or real love.\footnote{See Oh 1998, p.29}

In the scene where Faust escapes to solitude to avoid a seduction of Margarete, Mephistopheles emphasises his opinion: “Und kurz und gut, ich gön’ Ihm das Vergnügen,/ Gelegentlich sich etwas vorzulegen;” (Goethe 1985, l.3298/3299) Mephistopheles believes that love does not exist and human beings only glorify their appetite for sexuality.

Furthermore, Mephistopheles states about Margarete’s neighbour Marthe who helps him to arrange a meeting between Faust and Margarete: “Das ist ein Weib wie auserlesen/ Zum Kuppler und Zigeunerwesen!” (Goethe 1985, l.3029/3030) Even though the devil seems to be pleased about Marthe’s help, he mocks about her. Although his criticism might be meant appreciatory, it is debasing. In these examples, one can discover that the devil often comments the behaviour of other characters, especially human characters.

In the scene “Prolog im Himmel”, when Mephistopheles is allowed to appear together with angels in front of God, he also states - in contrast to the praise of the angels about God’s creation - debasing criticism about the human beings in general: “Von Sonn’ - und Welten weiß ich nichts zu sagen./ Ich sehe nur wie sich die Menschen plagen./ Der kleine Gott der Welt bleibt stets von gleichem Schlag./ Und ist so wunderlich als wie am ersten Tag./ Ein wenig besser würd’ er leben./ Hättst du ihm nicht den Schein des Himmelslichts gegeben;/ Er nennt’s Vernunft und braucht’s allein;/ Nur tierischer als jedes Tier zu sein.” (Goethe 1985, l.279-286) In his statement, similar to his beliefs of glorified human love, he states that human beings do not act adequately. Within God’s creation, Mephistopheles even ranks them under animals. Eppelsheimer states: “Doch ist Mephistos Kritik ganz ins Negative gewandt und als Kontrapunkt zum verkluerten Lobpreis der Hymne auch ironisch versteckte Kritik am Schöpfer selbst.”\footnote{Eppelsheimer 1982, p.64., see also Binder 1993, p.245} Mephistopheles tries to criticise God and his creation. He regards the human mind as a failure of God, because the devil believes that human beings are not able to use it in the right way. Although Mephistopheles exaggerates, he detects failings precisely. Mahal refers to a statement by Germaine de Stael: “Der Charakter des Mephistopheles setzt eine unerschöpfliche Kenntnis der Gesellschaft, der Natur und des Übarnaturlichen vo-
Because of his supernatural existence, the devil acquired a huge knowledge about things happened in the world and because of his business to seduce human beings, he has to detect weakness for taking advantage of it.

But his criticism is also extended to other not human creatures, for example Phorkyas. This antique creature, which appears in the second Faust drama of Goethe, is commented by Mephistopheles: “Dergleichen habe ich nie gesehn,/ Die sind ja schlimmer als Alraune.../ Wird man die unverworfenen Sünden/ Im Mindesten noch häßlich finden,/ Wenn man dies Dreigetümm erblickt?” (Goethe 1985, l.7971-7975) His statement about the shape of Phorkyas is rather negative. Here, another aspect can be observed: Mephistopheles’s negative commentaries, like the direct statement about the ugliness of Phorkyas, are mostly not directed to other acting characters. Thereby, the devil character might include the audience/ the reader in the events on stage and acts like a commentator and qualifies actions of other characters.

A similar effect takes place when Mephistopheles has to leave heaven: “Von Zeit zu Zeit seh’ ich den Alten gern,/ Und hütte mich mit ihm zu brechen./ Es ist gar hübsch von einem großen Herrn,/ So menschlich mit dem Teufel selbst zu sprechen.” (Goethe 1986, l.350-353) Müller explains Mephistopheles’s statement: “Dieser kennt seine abhängige Position im Weltganzen, [...] aber der Teufel ergreift jede kleinste Chance, dem Herrn ein Schnippchen zu schlagen [...]” Mephistopheles sneeringly entitles God as an old man, similar to a child which does not want to listen to its older relatives. He respects the power of God, but he always tries to liberate himself from God and ignores his speech.

Regarding the numbers of instances of the class for statements about subjects, the representations of Mephistopheles and Leviathan have similar numbers. But their statements display different functions. Leviathan promises Faust to present him the world and its humans. In different scenes, he shows Faust corrupt justice and conniving bourgeois or aristocrats. Thereby, he often adds commenting statements to the scenes. He also tries to generalise these examples to universal failures of the human beings. For example, before seducing a hermit, he states: “Ist denn eure Tugend und Frömmigkeit ein so zerbrechliches Ding, daß keiner daran schlagen darf, ohne sie zu zertrümmern? [...] Ihr seid alle Heilige, wenn euch nichts in Versuchung führt. Nein, Faust, ich will nichts hinzusetzen, und seinen Sinnen nur den Körder zeigen, um sein Herz zu prüfen.” (Klinger 1986, p.70) Here, he mocks about the human beings and their weak virtue. Then, he draws the attention to the hermit and tries to present him as a prove of his statement. His prophecy becomes true and Leviathan is again right after all. In another scene, when he and Faust visit a court of a sovereign, Leviathan debunks the favourite of the sovereign: “Glaubst du, Faust, der Mann, der so mühsam arbeitet, sich zu verbergen, habe ein Inneres, das das Licht verträgt? [...] denn auch eine Maske hat Bedeutung, und man enträtselt den Vermummten an Gang, Stimme, Atmeholen und Gewohnheiten. Nein, Faust, dieser da ist so ganz, wie er ist.” (Klinger 1986, p.101) Here, the devil again repeats his tactic and generalises an example. His comments often emphasise egoistic and cruel activities of human beings. Beginning by people of the middle-class, like the mayor, and clerics to aristocrats, Leviathan presents exemplarily step by step the badness and immorality of human society. When Leviathan presents Faust a higher social group, he presents him the cruel execution of

\(^{294}\text{Mahal 1972, p.334}\)
\(^{295}\text{Müller 1984, pp.218/219}\)
the duke ordered by the French king. Faust, appealed by the cruelty, commands that Leviathan should murder the king. But the devil refuses and states about the cruel French king:

“Ich kann meine Hand nicht an den Gesalbten legen, der so wacker für die Hölle arbeitet, […] Ist er es nicht, der den Grundstein zu dem Despotismus legt, der durch Jahrhunderte wachsen, bisher unerhörte Greuel veranlassen, und unzählige Opfer der Verzweiflung zur Hölle schicken wird? […] Faust, wenn der mächtige Satan in Frankreich König wäre, so könnte er nicht mit fruchtbarerer Hand den Samen zu dem künftigen Bösen aussäen, wie dieser es tut.” (Klinger 1986, p.147)

Regarding this statement, one can see Leviathan’s joy about the badness of the French king who helps to enlarge the number of souls gained for the hell. He relates Satan to the French king who seems to be worse than the emperor of the hell and predicts further despotism in France. The previous mentioned statements seem to be only addressed to Faust, but Leviathan’s depicting comment about the French king and despotism might be more directed to the reader. The story is situated at the time of 15th and 16th century, but Leviathan refers to later developments, which cannot be known by Faust. But a reader, familiar with the history of France, is able to detect the criticism of French monarchs whose era ends with the French Revolution. Here, one can discover Leviathan’s function as a commentator of political developments, which is discussed later on.

Leviathan presents steadily negative commentaries about the human activities, but it is not clear whether he is right. Because at the end of the story, Leviathan mentions that the poor people and their simple life have more virtue than the spoilt life of the presented human beings (Klinger 1986, p.207). This shows that his negative criticism is also used to destroy Faust’s beliefs in human morality.

After the complete destruction of Faust’s mind and beliefs, Leviathan makes his final speech and lists all crimes done by Faust. In his speech, he cleverly associates Faust’s crimes with the presented crimes of other people so that Faust has to discover the similarities between his actions and these of the others (Klinger 1986, pp.208-212). Hering comments: “...kommt es zu der großen Abrechnung, in der Leviathan mit giftigem Hohn und schriller Überlegenheit dem Helden alle Verbrechen vorhält und die vermeintlichen Hilfeleistungen als Akte vorschneller Zerstörungswut enthüllt.”

By observing the instances included in the ontology classes for statements, one can observe that Leviathan also criticises a non-human character in a very negative way. In a discussion with Faust, he poses the question that God might be a despot:

“Faust, du hast zwei Fälle gesetzt, wie, wenn es noch einen dritten gäbe? Namlich: daß ihr auf die Erde geworfen wärt, wie der Staub und das Gewürm, ohne Vorsicht und Unterschied. [...] Wenn er nun, gleich einem Despoten, eurem Herzen darum
7.1 Chronological Comparisons of Different Devil Characters

He implies that God left the human beings on the world without any support. Leviathan assumes that God implanted them the conflicting ability of being god or bad, but he occupies the right of judging them as he likes. This statement depicts Leviathan’s hate against God. His negative opinion about the human beings and their society is linked to God who might be responsible for all misery in the world. Thereby, he cleverly distracts from his own misdoings.

In contrast to Goethe’s Mephistopheles, Leviathan’s statements have a repetitive manner and are directed to destroy Faust’s beliefs whereas Mephistopheles’s comments seem to be more random. It also seems that Mephistopheles’s commentaries, which are often soft-spoken so that other characters are not able to hear them, are more directed to the audience. By covering his intention and presenting himself as a harmless companion, Mephistopheles is able to act in the world without being discovered. His position is weaker than Leviathan’s, because, even though God is not always present, the devil knows that God observes his creatures and also Mephistopheles. But Leviathan can be sure that he can gain Faust’s soul.

Nevertheless, both devil characters present a debunking view on human beings and society. Their way of demonstrating is often negative, but Leviathan’s criticism is more sarcastic than Mephistopheles’s ironic commentaries. The character feature of irony is outlined later on.

As mentioned, Leviathan also states criticism about abstract things like politics. For this reason, these kinds of comments, which are also represented as instances in the ontology, are analysed in the following. His statement about absolutistic kings of France was already mentioned. Before Leviathan is sent on the earth to serve the German Faust, he gives his resentments against Germany and its people: “...aber ein Teutscher? träge Klötze, die sich vor Ansehen und Reichtum, vor allen unnatürlichen Unterscheidungen der Menschen sklavisch beugen, von ihren Fürsten und Großen glauben, sie seien von edlerem Stoffe gemacht als sie [...] Noch ist keiner von ihnen auf eine stattliche Art zur Hölle gefahren, ein Beweis, daß dies Volk keine sich auszeichnende Köpfe hat.” (Klinger 1986, p.33)

Mahal entitles Leviathan’s speech as “Deutschenschelte”.298 One can summarise that the German nature is criticised in a very negative way. One should note that the novel is written in Saint Petersburg in Russia, strongly influenced by Klinger’s frustration about his career in Germany: “Seine Erfahrungen in Deutschland hatten Klinger entscheidend geprägt. Es konnte nicht ausbleiben, daß er die Welt des Herkommens gründlich verachtete; zu hart und verletzend war der Kampf gegen ihre Vorurteile und Kränkungen gewesen.”299 Klinger cannot go further in his political and military career in Germany and moves to Russia. By criticising Germany using Leviathan, this character is used to transport the dissatisfaction of the author. But as shown in before, the criticism is enlarged to other European countries so that it results in a social criticism about human beings mostly in politics.

298 Mahal 1972, p.306
299 Segeberg 1974, p.21
To understand Leviathan’s statements, which are also attached to the mental representation, a short excursus to Klinger’s philosophical intention is outlined. Concerning Klinger’s motivation, Segeberg explains: “...die Auseinandersetzung des Einzelnen mit der Gesellschaft, in der er lebt und dies unter einem ganz bestimmten Aspekt. Es ist die Diskrepanz zwischen festen moralischen Grundsätzen und den Erscheinungen der politischen Welt, die Klinger immer wieder schmerzlich bewußt wird.”

This means that Klinger might transport his own negative experiences to a more abstract level and attaches them to his novels. Segeberg also points out that Klinger probably uses the ideas of the French author and philosopher Jean Jacque Rousseau to express his feelings in his works.

In Rousseau’s work, the decline of human society is complained. Rousseau believes that science, vice as well as politics and the introduced social hierarchy are main reasons of human degeneration. In the novel “Emile”, Rousseau presents a solution for this degeneration by presenting a boy and his education to a “natural state” of human existence.

Klinger adopts these thoughts: “Klinger wird, wie Rousseau, diese Kritik gegen feudale wie kapitalistische Gesellschaftsformen wenden, weil auch im späten Feudalismus Privateigentum als Ursache gesellschaftlicher Widersprüche sichtbar wird.”

Leviathan also presents cruel and conniving persons to Faust as examples to approve his intention and thereby, Klinger’s own intention. But in Klinger’s novel, a positive example is only hypothetically mentioned by Leviathan. This means that Klinger uses philosophical ideas to point his criticism.

Regarding Goethe’s conception of the devil and his mental representation, one can observe that Mephistopheles, who, as mentioned above, often tries to cover his intention, does not judge human society and politics in such critical way. Direct statements about political institutions can hardly be found. Maybe Mephistopheles’s song about a flea, which is performed at a carousal in “Auerbachs Keller” in the first part of the drama, can be interpreted as a criticism:

“Es war einmal ein König
Der hatt’ einen großen Floh,
Den liebt’ er gar nicht wenig,
Als wie seinen eignen Sohn.
[...]
Und war sogleich Minister,
Und hatt’ einen großen Stern.

Da wurden seine Geschwister
Bei Hof’ auch große Herrn.
Und Herrn und Frau am Hofe,
Die waren sehr geplagt,
Die Königin und die Zofe

---

300 Segeberg 1974, p.47
301 Segeberg 1974, p.48
302 See Segeberg 1974, pp.38/39, Rousseau, Jean Jacque: Diskurs über die Ungleichheit
303 See Rousseau, Jean Jacque: Emile oder Über die Erziehung
304 Segeberg 1974, p.51
It is obvious that the mentioned flea represents an unpleasant person who endears himself to influential rulers. This person seems to be a “social climber” in a negative way and annoys other aristocrats. Some similarities to episodes in Klinger’s novel can be stated where also people leverage situations (Klinger 1986, pp.99-106). But Mephistopheles’s song is performed in a humorous scene so that the criticism is not so severe. Mahal states:

“...man hat aber, abgesehen von dem - möglichen - direkten Bezug auf FRIEDRICH II. von Hessen-Kassel das oft vertonte Lied bisher mehr vom Lustigen und Musikalischen her betrachtet und nicht die ideologiekritische Seite genügend ausgewertet, also den - äsopisch geschickt - kaum verhohlenen Aspekt des Geißelns von Kriecherei, Duckertum und Konformismus!” (Mahal 1972, p.377)

Agreeing on Mahal’s statement, conniving practices of courtiers are criticised in this song. One can observe that more political scenes are given in the second Goethe’s Faust drama. Together with Mephistopheles, Faust arrives at the court of the emperor where the devil starts to confuse the society with magical paper money (Goethe 1972, l.6119-6172). Furthermore, Faust and Mephistopheles get involved in a war and by Mephistopheles’s magical help Faust is able to win the war (scene “Auf dem Vorgebirg” in Goethe 1972). But Mephistopheles does not appear as an objective commentator and therefore, nothing is described in the mental representation in the ontology. One can state that Mephistopheles comments the behaviour of other characters, but in contrast to Leviathan, he does not serve as a commentator of politics and the human society in general.

Regarding the instances in the class of statement about oneself, one can discover that Mephistopheles comments his nature and activities several times. In Goethe’s second Faust drama, there are even more comments. Some of these statements are analysed in the following. In contrast to Mephistopheles, Leviathan does not give any statements about himself. In the scene “Studierzimmer I” of Goethe’s first Faust drama, Mephistopheles states a first explanation about his nature, instead of giving his name: “Ein Teil von jener Kraft./ Die stets das Böse will und stets das Gute schafft.” (Goethe 1985, l.1335/1336) Daur points out that Mephistopheles’s speech is meant in a sarcastic way, whereas Müller states:

“In der ersten Studierzimmerszene stellt sich Mephisto zunächst vor als ”Ein Teil von jener Kraft./ Die stets das Böse will und stets das Gute schafft” - das kann zweierlei heißen: er, der ganz nach dem alten Volksbuch, nicht der oberste Teufel selbst, sondern nur ein Abgesandter des Höllenfürsten Satan ist, gehört zu jener verneinenden Gesamtkraft, die das im Sinne Gottes Böse meint, die

305 see Dorner 1976, p.65, Rothe 1998, p.111
306 Daur 1950, p.51
Chapter 7 A Computer-Aided Analysis of Devil Characters in the Faust literature

Weltschöpfung zerstören will, und wider Willen das Gute schafft, im Sinne des ihm im Weltenplan Gottes zugedachten Reizelements [...]” (Müller 1984, p.218)

One can agree on Müller’s opinion that Mephistopheles might refer to God’s explanation of the function of evil. But he might also not be satisfied with his assigned role of serving God so that his explanation can be meant in a sarcastic way: “Ich bin der Geist, der stets verneint!/Und das mit Recht; denn alles, was entsteht, ist wert, daß es zugrunde geht;/ Drum besser wür’s, daß nichts entstünde./ So ist denn alles, was ihr Sünde, /Zerstörung, kurz, das Böse nennt;/ Mein eigentliches Element.” (Goethe 1985, l.1338-1344) Instead of creating something, Mephistopheles wants to destroy and this shows that he wants to counteract God’s creation. Faust seems not to be satisfied with Mephistopheles’s statements and Mephistopheles refers to his origination:

“Ich bin ein Teil des Teils, der anfangs alles war,/ Ein Teil der Finsternis, die sich das Licht gebar,/ Das stolze Licht, das nun der Mutter Nacht/ Den alten Rang, den Raum ihr streitig macht,/ Und doch gelingt’s ihm nicht, da es, so viel es strebt, /Verhaftet an den Köpfen klebt./ Von Köpfen strömt’s, die Körper macht es schön,/ Ein Körper hemmt’s auf seinem Gange,/ So, hoff’, ich, dauert es nicht lange,/ Und mit den Körpern wird’s zugrunde gehn.” (Goethe 1985, l.1349-1358)

Mephistopheles refers to the genesis in the bible, but as Daur explains, he distorts the facts, which are mentioned in the bible. The devil explains that the first light was created by darkness. Müller states that Mephistopheles wants to present himself in a better way. But he also mentions that Mephistopheles can only destroy something and that he has the anger against God’s ability to create things. But one should also note that Mephistopheles only mixes different definitions together and arranges them so that they might fit to his intention. He does not give individual explanations. Maybe, he wants to cover the role of the evil, which is not so praiseworthy in the history by distorting the genesis.

In the scene “Hexenküche”, he states a more honest statement about his development:

“Auch die Kultur, die alle Welt beleckt,/ Hat auf den Teufel sich erstreckt;/ Das nordische Phantom ist nun nicht mehr zu schauen;/ Wo siehst du Hörner, Schweif und Klauen?/ Und was den Fuß betrifft, den ich nicht missen kann,/ Der würde mir bei Leuten schaden;/ Darum bedien’ ich mich, wie mancher junge Mann,/ Seit vielen Jahren falscher Waden.” (Goethe 1985, l.2495-2502)

There, he refuses older pictures of the devil, which are mentioned by a witch in before, and points out that he had to change because of the changes of the humans and their society. To fit to the human society, he has to cover his devilish features. In this statement, he also displays his weak position in the world. He has to be clever to go further in his business. To the end of Goethe’s second Faust drama, Mephistopheles is afraid not to gain Faust’s soul and he strongly stresses his weakness: “Doch leider hat man jetzt so viel Mittel/ Dem Teufel zu entziehn./ Auf altem Wege stößt man an./ Auf neuem sind wir nicht empfohlen;/ [...] Uns geht’s in allen Dingen schlecht./ Herkömmliche Gewohnheit, altes Recht,/ Man kann auf

307 Daur 1950, p.52
308 Müller 1984, p.219
gar nichts mehr vertrauen.” (Goethe 1972, l.11614-11617, 11620-11622) Here, Mephistopheles moans about his unsecured position. He seems to have God’s statement in his mind and feels that he cannot be sure of gaining Faust’s soul. Daur states: “Aufgeklärtden Wandel dieser Dinge überblickend, spielt er [...] mit dem Aberglauben an die eigene Person und klagt, wie schlecht es jetzt dem Teufel geht...”

Although the devil always tries to present himself as powerful, in a few situations, like in this situation, he avows his real feelings. Later on, his emotional state is analysed in more detail.

Leviathan seems to be more established in his evil business, but however, he is not willed to talk about himself and there is also nothing more included in the mental representation of this character. But in his final speech to Faust, he gives a short statement about the position of the devils in the world: “Wir sind Sklaven des Bösen und der eisernen Notwendigkeit ohne Wahl und Willen; gezwungen, von Ewigkeit dazu verdammt, wollen wir nur das Böse, und sind Werkzeuge der Rache und der Strafe an euch.” (Klinger 1986, p.213) He describes his existence and nature to do evil things as a constraint and that he is not able to escape from his destiny or to change it. In this statement, he reveals indirectly his desperation for the first time. Leviathan also contrasts his destiny to the destiny of human beings who have the choice to be good or bad (Klinger 1986, p.213). Here, his jealousy reveals itself, which might explain his negative view on human beings. More statements that express his feelings are not stated.

In summary, both devils are not satisfied with their positions in the world, even though, they hold different positions: Mephistopheles struggles with his subordination to God, but it seems that he accepts his nature of being evil, whereas Leviathan seems to be desperate about his devilish nature.

The reminding and admonishing effects in the speech of these characters are also important. These aspects appear in different types of speech, especially in the class “admonition_remind” of the ontology. Leviathan in Klinger’s novel reminds Faust several times. Especially in the end, he lists all characters, which were seduced or hurt by Faust and tells him their often terrible destiny and ending (see Klinger 1985, pp.208-212). He also shows him that people rescued by Faust harmed other people after their rescue. Thereby, he destroys Faust’s last beliefs in morality of the human beings. A similar and also destructive effect can be found in Leviathan’s reports about the life of people harmed by Faust (see for example Klinger 1986, pp.116/117, 152). In these statements, the devil stresses his intention to demonstrate Faust the badness of human society. Furthermore, he shows him that by influencing the destiny also in a positive way, misery can occur. Leviathan’s reminders and reports are a part of his strategy to destroy Faust.

Mephistopheles of Goethe also reminds and admonishes Faust or other characters in a direct way. This kind of speech is also added to his mental representation. But his reminders to others, for example to the antique Helen or his magical assistants in the second Faust drama of Goethe, are marginal in contrast to his interactions with Faust (see Goethe 1972, l.11197-11200, 9054-9058). Especially, when Faust falls in love with Margarete, the devil give several admonitions: When Faust sees Margarete for the first time and soon demands her, Mephistopheles says in a reprehensive way: “Du sprichst ja wie Hans Liederlich,/ Der begehrt jede lieb Blum für sich...”

\footnote{Daur 1950, p.342}
(Goethe 1986, l.2628/2629) But however, the devil is soon willed to satisfy Faust’s demand. After the seduction of Margarete by Faust, he encourages him to meet her again, but when Faust and Mephistopheles arrive at Margarete’s home, Mephistopheles sings a reminding song about lost virginity (Goethe 1986, l.3682-3697). In this song, he reminds of keeping virginity before marriage and thus, he provokes Margarete who was seduced by Faust. Thereby, he presents an evil kind of irony as well as maliciousness.

In the scene “Trüber Tag. Feld”, Faust accuses Mephistopheles of not telling him that Margarete murdered her child and was sent to prison. In addition, he is outraged that Mephistopheles seems to be cold hearted regarding her destiny. Directly and without any irony, Mephistopheles states:


Daur analyses Mephistopheles’s speech as follows: “Der Teufel blickt kalt auf den Fassungslosen, der sich überhob und sich einließ mit ihm. [...] in der Verkennung seiner Kraft, als sei er dem gewachsen, wessen er mit solchem Rufe sich vermaß.”

Mephistopheles denies any guilty of Margarete’s misery. He also denies being responsible for the pact with Faust. The devil does not mention his influence on the pact and Faust’s affair with Margarete. Here, Mephistopheles shows a snaky feature, because he did not warn Faust, but he reminds him after the events. This reminder is a method to provoke Faust’s dissatisfaction and unhappiness. In this situation, he might prevail over Faust.

In summary, one can state that the speech actions are important parts of the conception of these devil characters. Their commentaries about the human characters and the society are often rather negative, but also intelligent. Because of their positions as devils and non-human characters, they are able to observe other characters and events from an external position. Especially Leviathan’s commentaries present a philosophical influenced opinion, which is attached to the conception of the character. Another important function of their speech is the reminding and admonitory effect. Although the devil characters influence and seduce the Faust characters, they judge in a very hard way. They know the distinctions between right and wrong, good and bad, very well and remind the Faust characters of these aspects.

**Character Features and Emotions**

After analysing the speech of Leviathan and Mephistopheles, more features of them, the inner features and emotions, which are also a part of their mental representations (cf. Fig. 7.8), are analysed in the following. A special and supernatural inner feature is that both characters are equipped with the ability to observe more than human characters are able. For example, Goethe’s Mephistopheles is informed that Faust tried to suicide before the devil approaches him (Goethe 1986, l.1579/1580). When Faust feels annoyed about Mephistopheles’s sneering statement about Faust’s trial, the devil comments: “Allwissend bin ich nicht; doch viel ist mir
bewusst.” (Goethe 1986, l.1582) Mephistopheles combines his observations with his experiences and knowledge about human nature to manipulate people.

Leviathan also has this kind of knowledge. In addition, he is able to prognosticate events in the future. For example, when Faust demands him to rescue a drowning man, as mentioned above, Leviathan prognosticates: “Faust, bedenke was du fordernst, es ist ein Jüngling, und vielleicht ist es besser für ihn und dich, daß er hier sein Leben endet. [...] Die Folgen seien dein Gewinn; du wirst es bereuen.” (Klinger 1986, pp.87/88)

An important character feature, which is mostly shown by Mephistopheles is a kind of irony. This seems to be a main essence in the conception of this character and therefore, it will be examined in more detail. Ironic elements are often incorporated in Mephistopheles’s statements and commentaries, but maybe they are not directly visible in instances of his mental representation. But it might be hardly to detect speech, which does not contain irony. Only as Phorkyas in Goethe’s second Faust drama, Mephistopheles acts more seriously. But there, it might not fit to his mask and the situation to give ironic and joking commentaries. According to Erich Franz’ definition, irony is stronger than humour, which is more unconscious and a kind of cheeriness, whereas irony needs intellectual power and activity of the mind.

It is true that Mephistopheles’s kind of irony is often meant negative. He thinks that the devil’s irony is destructive and cold. In addition, Mephistopheles is only able to observe the bad and mean side of the human characters. It is true that Mephistopheles’s ironic commentaries often reveal his insensible mind. For example, in his statements about Faust’s love to Margarete, he relativises this relationship, but he also tries to bring the love down to physical desire and sexuality. Mephistopheles’s behaviour and advices in a scene – which was not mentioned yet, – are even more ironic. In “Studierzimmer I” in Goethe’s first Faust drama, Mephistopheles disguised as Faust gives advice to a pupil and jokes about sciences, like philosophy, study of law, and medical science (Goethe 1986, l.1908-2049). He emphasises that medical science should be preferred in contrast to the more theoretical sciences. But it results in Mephistopheles’s advice by practising medical science to approach women. Thus, similar to the commentaries about Faust’s love, Mephistopheles perverts medical science in sense of sexuality. In another scene, when he comments the death of Margarete’s brother or the murder of an old couple, which is killed by Mephistopheles and his assistants (Goethe 1986, l.3711b, Goethe 1972, l.11350/11369), his irony turns into sarcasm. Nevertheless, Mephistopheles’s ironic statements are often funny and might be useful for the audience to observe the performance on stage with his worldly-wise point of view.

Leviathan who, as mentioned, might still struggle with his destiny, shows rarely irony. His statements only contain a harsh sarcasm. He also comments the world and the human beings in his point of view, but one cannot smile about his bitter commentaries. It seems that he is more emotional and does not have a distance to comment events in the worldly-wise and ironic way of Mephistopheles.

This leads to the representations of the emotions of the two devil characters. Regarding the class “emotion”, one can detect that Leviathan reveals much more emotional reactions than

---

311 Franz 1953, p.144
312 Franz 1953, p.145
Mephistopheles, although Leviathan does not comment his feelings. Different kinds of feelings can be stated for him. At first, his hate against human beings in general and Faust in particular can be observed (Klinger 1986, pp.114, 225). Influenced by this hate, he seems to be very vengeful and always tries to find his joy in Faust’s misfortune (see also Klinger 1986, pp.163, 178,191). Concerning this gloating, it is often stated that Leviathan smiles or laughs about Faust’s depression or about the misfortune of other characters (Klinger 1986, pp.111, 132, 192, 202). Mahal, who indicates a large number of statements about Leviathan’s laugh, explains that in modern behaviour research, this reaction is seen as an animal aggressiveness. But it might also indicate a character, which is weak or has a low self-esteem and tries to detract from it by laughing about others. In addition, Leviathan often gets angry. For example, during Faust’s and his visit at Rome, he gets angry when the pope starts to make him sexual offers and therefore, he shows him his real outward (Klinger 1986, p.192). In the end, when the pope kisses the feet of Leviathan, the devil becomes so angry that he murders him (Klinger 1986, p.193). In the conception of Leviathan, a scale of different negative feelings, like hate, gloating and anger, are shown. But apart from hate and anger, his malicious joy seems to be the only emotion, which he is able to feel himself. These reactions seem to manifest deep hurts, however a direct statement about Leviathan’s feelings is not mentioned. Positive feelings or regrets are not presented.

In contrast to Leviathan, Mephistopheles’s emotions seem to have a larger spectrum, because, in spite of his irony and callousness to others, he is able to have other feelings. In particular in Goethe’s second Faust drama, Mephistopheles shows interesting facets. As Phorkyas, he changes his sound in a surprising way. After arranging a meeting between Faust and the antique Helena, he seems to be influenced by her beauty and to regret the dissolving of her and her son Euphorion. He gives a surprising advice to Faust:

“Heft fest was dir von allem übrig blieb/ [...] Die Göttin ist’s nicht mehr die du verlorst,/ Doch göttlich ist’s. Bediene dich der hohen/ Unschätzbaren Gunst und hebe dich empor,/ Es trägt dich über alles Gemeine rasch/ Am Äther hin, so lange du dauern kannst.” (Goethe 1972, l.9945, 9949-9954)

Konrat Ziegler states: “Sie [Phorkyas] wird zur aufrichtig ergebenen Vertrauten des Liebespaares, nicht die leiseste Spur der teuflischen Bosheit des alten ironischen Tons ist geblieben, und [...] die Schlußmahnung an Faust, das Gewand der verschwundenen Helena festzuhalten, atmen reinstes tragisches Pathos.” Mephistopheles’s behaviour seems to be real. He is impressed by Helena and the love episode. Regarding the bet between Faust and Mephistopheles, in this scene, he seems to disregard his own intention to trick Faust that he holds on a joyful moment. This aspect cannot completely be clarified, but nevertheless, it depicts a different facet of Mephistopheles’s character. In the end of the second Faust drama, his ability of having positive feelings can be observed. There, he and his assisting devils, which should catch the soul of Faust, are confused by the dispersed roses of appearing angels. Soon, it turns out that the devils are not able to act against these roses and the assisting, scared devils escape back to hell. Mephistopheles tries to insult the angels (Goethe 1972, l.11685-11688, 11693-11698), but

313Mahal 1972, p.316
314Ziegler 1972, p.37
after he is left alone, he gets confused by his own feelings influenced by the angels and their roses. Surprised about his emotions, he describes his situation:

“Mir brennt der Kopf, das Herz, die Leber brennt,
Ein überteuflisch Element!
Weit spitziger als Höllefeuer! -

Auch mir! Was zieht den Kopf auf jene Seite?
Bin ich mit ihr doch in geschwornem Streite!
Der Anblick war mir sonst so feindlich scharf.
Hat mich ein Fremdes durch und durch gedrungen?
Ich mag sie gerne sehn, die allerliebsten Jungen;

Was hält mich ab, daß ich nicht fluchen darf? -
Und wenn ich mich betören lasse,
Wer heißt denn künftighin der Tor?
Die Wetterbuben, die ich hasse,
Sie kommen mir doch gar zu lieblich vor! -”
(Goethe 1972, l.11753-11755, 11759-11768)

Concerning Mephistopheles’s feelings, Eppelsheimer states that Mephistopheles falls into a crisis and questions his inner situation. Never before, the devil appears so insecurely. Although Mephistopheles feels a kind of love, he is not able to handle it and it poisons him in his devilish nature. His desire gets stronger and he wishes to kiss the angels. He also begs for the attention of the angels (Goethe 1972, l.11769-11777). Thereby, Mephistopheles turns into a queer behaviour, lost in the view of the angels, and asks for the angel’s love. Eppelsheimer comments:


Eppelsheimer’s statement can be attached by Mephistopheles’s following speech:

“Der ganze Körper steht in Feuer,
Ich fühle kaum, daß es im Nacken brennt. -
Ihr schwanket hin und her, so senkt euch nieder,
Ein büßlichen weltlicher bewegt die holden Glieder;

315Eppelsheimer 1982, p.406
316Daur 1950, p.348
Mephistopheles is confused by his own feelings and he describes the asexual angels in a more physical and sexual way. But the angels’ love represents a divine and neutral love and he interprets its effects on himself in a false way.\(^\text{317}\) It is interesting that he is able to feel divine love, a positive feeling, but he is not able to understand it. Therefore, he changes the affection into sensuality and cupidity. Mephistopheles, which is normally an ironic and discerning commentator of the events on stage, misinterprets high feelings and cannot take another position than his devilish one. However, the devil is so confused that the angels can take Faust’s soul. After the escape of the angels, he wakes up from his confusion and falls again into his old mute (Goethe 1972, l.11809-11816). He is surprised about himself, but then he discovers that the angels took Faust’s soul and he complains that his concerted salary, the soul, is gone (Goethe 1972, l.11829-11831, 11832-11843). He feels betrayed, but also detects his failure of inattentiveness.

As shown, Mephistopheles has different kinds of emotion and he is able to change in his feelings. He is even able to feel positive feelings, especially in the second part of the drama. It seems that in the conception of this character, ambiguous elements are included. In the scene with the angels, Mephistopheles reveals an inner conflict and it seems that he demands wishfully to gain divine love, which he lost. Here, he might be reminded of his previous status as an angel. But because of the devil’s failure, divine love is deprived them and therefore, Mephistopheles’s comprehension of emotions, like the divine love of the angels, is limited so that he has to stay in his negative and animal feelings.

Completing the analyses of the two devil characters and their mental representations, statements and views about these characters given by other characters or the narrator of the texts are stated in the following. These statements can present additional views on the devils apart from their own view. One can detect several instances for Leviathan’s representation in the class “statement about the analysed character”. An important statement might be included in the description of his human outward given by the narrator: “Eine feine Adlernase zog sich gegen einen Mund, der nur zu dem Genusse der Unsterblichen gebildet zu sein schien. Er hatte die Miene eines gefallenen Engel, deren Angesichter einst von der Gottheit beleuchtet wurden, und die nun ein düstrier Schleier deckt.” (Klinger 1986, p.42) Here, an impressive and

\(^{317}\) see also Hesse-Belasi 1992, p.231
7.1 Chronological Comparisons of Different Devil Characters

noble appearance is described by reminding of his angelic origin. Although he is still eternal, the dark expression of a fallen angel is incorporated in his face. By designing this character, Klinger might be included associations to Milton’s Satan, who even though he is fallen, has still features of his angelic origin.

The reactions of the other characters are rather different. When Faust and Leviathan are guests at the court of the pope, Leviathan becomes the favourite of the pope who gets intrusive. Leviathan shows him his real shape, but the pope – who is one of the most cruel and sinful characters – is not scared by the devil’s shape. He even repeats his offer.\footnote{Mahal 1972, p.321}

However, Leviathan is not identified as a devil by other characters. For example, a young friar who tries to draw conclusions by observing the physiognomy of human beings, notices Leviathan’s noble outward, but he is completely wrong in his conclusions. The friar believes that Leviathan is loyal to God and the human beings (Klinger 1986, p.134). This shows that Leviathan is able to cover his real shape but which is also described in an impressive way: “Er stund in Riesengestalt vor ihm. Seine Augen glühten wie vollgefüllte Sturmwolken, auf denen sich die untergehende Sonne abspiegelt. Der Gang seines Atems glich dem Schnauben eines zornigen Löwens. Der Boden ächzte unter seinem ehernen Fuße, der Sturm sauste in seinen fliegenden Haaren, die um sein Haupt schwebten, wie der Schweif um den drohenden Kometen.” (Klinger 1986, p.220) His devilish shape is described by using words, which express his gigantic and powerful outward features. In his appearance, he reminds of an angry god, but not of an ugly and deformed devil.\footnote{see also the descriptions about Satan in Milton’s “Paradise Lost”, Milton 2000} This corresponds to Leviathan’s status in hell. He has a rank of a sovereign in hell and in addition, he is Satan’s favourite (Klinger 1986, p.32).

Regarding statements about Mephistopheles, a lot of instances referring to the first part of the drama can be detected in the class of statements about the character. But in contrast to the statements about Leviathan, he is described in a rather different way. Most of these statements are given by Faust and contain negative titles. Faust, often annoyed by Mephistopheles, entitles him as an egoist, liar, snake, procurer, or pied piper in different scenes (Goethe 1986, 1.1651, 3050, 3324, 3338, 3699, 4030). These titles mostly refer to typical descriptions of the devil. But similar to Leviathan, Mephistopheles is also not often identified as a devil in his human shape. The only character, which feels uneasy in Mephistopheles’s presence, is Margarete (see also Goethe 1985, 1.3487-3491). Therefore, she says to Faust:
Margarete, an innocent and honest character, can see behind Mephistopheles’s mask. She has strong beliefs in God, but is scared by Mephistopheles. Although she notices Mephistopheles’s bad intentions and callousness, she cannot explain why. She discovers his antipathy against God and Christianity and his bad influence on human beings, but she treats him like a human character and does not observe that he is not human. When she is imprisoned because of the murder of her child, Faust and Mephistopheles appear to rescue her. But then, Margarete, insane because of her misery, seems to discover Mephistopheles as a devil and believing that the devil would bring her to hell, she resists escaping with Faust and him (Goethe 1985, l.4602-4604). Except from Margarete, Mephistopheles is not recognised by others. In contrast to Klinger’s character, he does not show Leviathan’s noblesse; but instead, he can cover his devilish outward features as well as his intentions in a clever way.

In summary, both devil characters present a large repertoire of interactions, speech as well as inner and outer features. But one can state that all kind of actions, except from speech, and features of Leviathan are more detailed than for Mephistopheles. This might be an aspect of individual differences between Klinger and Goethe, but also because of the different kinds of genres. In Klinger’s novel, longer descriptions are presented as well as Leviathan often repeats certain actions. In a novel, it might be more common to give descriptions of characters as in a drama where characters are described by their behaviour and actions.

Both characters have inherited magical features, like changing forms or flying, but in contrast to previous Faust works, they have developed further to main characters. They fill a central and important position in the story. Especially, their distant views on human beings and events are remarkable and enrich the literary works. Leviathan’s view is, as mentioned, influenced by philosophical thoughts of Rousseau, whereas Mephistopheles’s commentary statements are marked by strong irony and sarcasm. Leviathan and Mephistopheles plan the seduction of their human victims, but in contrast to Leviathan, Mephistopheles has from the beginning of the story a weaker position. He is faced with God’s opposite intention to save Faust’s soul, whereas in Klinger’s novel, a divine entity is however mentioned, but not present and interested in human destiny. Both devils try to lead Faust in their intended direction by using different psychological tricks like promises, but also reminders and admonitions. Mephistopheles’s intention is to seduce Faust that he wants to hold on a joyful moment and therefore, he offers him several pleasures. Leviathan, annoyed by Faust and that he has to leave hell, wants to destroy
7.1 Chronological Comparisons of Different Devil Characters

Faust’s beliefs in the virtue of human beings and demonstrates him repeating situations of cruel and unmoral behaviour of the human beings, especially of people in political institutions.

At the end, Leviathan destroys Faust’s mentality completely and takes him with triumph to hell. He seems to be full of anger against the human beings, which still have a choice of being good or evil. Because of his condemned destiny of a fallen angel, he cannot change, but one can assume his struggle with his destiny by regarding his hate and anger, although it is not directly mentioned. Even, if Leviathan reveals a strong malignity, he is featured with further attributes beyond typical imaginations of the devil. His human appearance shows a dark kind of beauty and also, his devil shape presents the power of an angelic, maybe divine creature, but in a scary way. Mephistopheles in Goethe’s two dramas is equipped with a larger scale of feelings. As mentioned, he can feel negative as well as more positive emotions. For a moment, he is able to feel divine love and confuses his own devilish nature. Regarding his plan to get Faust’s soul, it is a stupid failure; he ends as a betrayed looser without a profit. Mephistopheles is faced with his own confusion as well as divine interactions. His strange love and behaviour seem to be a new development in the tradition of the Faust literature. The character has an ambiguous nature, maybe reminiscent to his previous status as an angel. Finally, one can state the conceptions of devil characters have been developed further and the devil characters of Leviathan and Mephistopheles arrived on an elaborated stage of being main characters, more than equal to the Faust characters. Further authors, especially in the period of Gothic fiction, might be influenced by these conceptions and enlarge them. Klinger’s and Goethe’s devil characters might be evident precursors of enlarged and richly psychological images in newer literature and films.

7.1.3 Devilish Guidance - Lenau’s Mephistopheles in contrast to Klinger’s and Goethe’s Devil Characters

In this section, devil characters – Klinger’s Leviathan, Goethe’s and Lenau’s Mephistopheles – appearing in Faust works, which are released in a period of not more than 50 years, are compared. The late 18th century and 19th century seems to be a fruitful time for the production of Faust stories and the creation of devil characters. For this reason, it might be interesting to observe similarities in these works, but also individual conceptions of the different authors Klinger, Goethe, and Lenau. For example Friedrich Sengle states to Goethe’s and Lenau’s work:


\[320\]see Hesse-Belasi 1992, p.232

\[321\]for a further comparison of Goethe’s and Lenau’s Mephistopheles see Zöllner-Weber 2004 [Master’s Thesis]
One cannot dismiss influences between these three authors, but it seems challenging to regard influences and variations more in detail. Leviathan of Klinger and Mephistopheles in Goethe’s two Faust dramas are already outlined, so to avoid redundancy, in the following comparison, citations of Goethe’s and Klinger’s texts are only given if they are not mentioned in before. Already given statements and observations are shortly repeated, but not described in detail.
7.1 Chronological Comparisons of Different Devil Characters

Figure 7.11: Diagram of instances of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau. Here, all classes, which contain instances of the mental representations of the characters Leviathan and Mephistopheles (of Goethe and Lenau), are depicted. Mephistopheles of Goethe is divided into two parts, because he appears in the two Faust dramas of Goethe. On the x-axis, the absolute numbers of instances are represented. On the y-axis, all classes, which contain instances, are given.
Lenau’s poem, the latest of these four works, is about a Faust character, which searches for the sense and truth of life. A devil called Mephistopheles rescues him from falling down a mountain. Afterwards, this Mephistopheles again appears at Faust’s home and makes him the offer to help him by his search. But Mephistopheles demands that Faust has to give up his Christian religion and to start to commit crimes. Faust is doubtful, but after a while, he calls the devil and agrees on a pact. Mephistopheles formulates a plan how to destroy Faust: By Mephistopheles’s guidance, Faust should be led step by step to sexual affairs and then real love which ends up in a murder and finally, into isolation. For this reason, Mephistopheles animates Faust’s desire and arranges several situations so that Faust seduces women. But he is always reminded of the misery of these women by the devil. Then Faust falls in love with the princess Maria. Mephistopheles betrays Faust’s love to Maria’s fiancé and in a fight between Faust and the fiancé who is murdered by Faust. Afterwards, Faust falls in desperation and Mephistopheles tries to distract him. But he works further on Faust’s isolation. Finally, Faust, who is able to reach the knowledge about the truth and sense of life, suicides because of his desperation. Mephistopheles triumphs over Faust and takes his soul to the hell.

In the ontology for literary characters, the mental representation of Lenau’s Mephistopheles is described by 88 instances (cf. figure 7.11). Each representation of the characters of Klinger and Goethe has more than 100 instances. But this is also a reason of different volumes of these works. Lenau uses 3437 lines to describe his Faust story, whereas Goethe’s dramas consist of more than lines 12000 and Klinger’s novel has more than 200 pages of prose text. However, Mephistopheles in Lenau’s work has twice more instances than the devil characters of the Historia and Marlowe. Therefore, this character also seems to be a main character. But one should note that lower or higher numbers cannot always be taken for the decision whether characters are main or minor characters. Although they can show tendencies of main or minor characters, a decision about this can only be done by inspecting and analysing the characters and their representation.

By comparing these characters, following hypotheses are investigated: As already hinted in the section 7.1.2, Leviathan of Klinger and Mephistopheles of Goethe perform a kind of guidance of their human victims. In Lenau’s poem, the devil also shows a detailed plan for his intended guidance and the execution of it. The question arises whether all these devil characters also have the same intention. In addition, their abilities as supernatural characters differ from each other. Leviathan and Lenau’s Mephistopheles are able to create or transform much more things than Goethe’s Mephistopheles. These hypotheses should lead to a final statement that in the 18th and 19th century, devil characters still inherit traditional features and abilities, but their behaviour is more enlarged so that these characters arrive at a modern conception as well as that they play important roles in the stories.

Features, Plans and Preparations for the Pact

At first, outer and inner features of Lenau’s Mephistopheles in comparison to the other devil characters are stated (cf. figure 7.12). Several instances of that mental representation are included in the categories, which are related to the features of characters. In Lenau’s poem, traditional as well as uncommon shapes of the devil are introduced. Mephistopheles of Lenau appears in the first scene as a hunter who rescues Faust from falling down a mountain: “Ein finsterer Jäger blickt ins Aug’ ihm stumm./ Und schwindet um das Felseneck hinum.” (Lenau
7.1 Chronological Comparisons of Different Devil Characters

Figure 7.12: Diagram of instances for features of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau. On the x-axis, the absolute numbers of instances per class are represented. On the y-axis, the feature classes, which contain instances, are given.

1910, l.67-68) In the Faust literature, the devil as a hunter is not common. Nevertheless, apart from this kind of literature, this shape is sometimes mentioned. In fairy tales, for example in the tale of snow white, the hunter is not normally evil, he is known as a character, which helps the main characters. However, in Lenau’s poem, Mephistopheles as a hunter also rescues Faust, but his sudden appearance seems to be depicted as dark and mysterious. He holds this impression when he appears as a travelling scholastic at Faust’s home and begins to discuss with Faust about the sense of life (Lenau 1910, l.130a-218a). Mephistopheles does not disclose his identity, but later, he states that he appeared in the shape of a hunter and a scholastic (Lenau 1910, l.377-386). Here, one can observe a similarity to Goethe’s Mephistopheles, who also appears as a scholastic. But one cannot detect whether Lenau’s conception is influenced by Goethe’s work or older Faust works, because this shape might be rather common. The devil characters use this costume to act as an academic like Faust. They might copy Faust’s appearance to assimilate with him. In addition, Lenau’s Mephistopheles changes into a black

323 see George Gordon Noel Byron’s “Manfred” where a mysterious hunter appears
poodle to scare people in a tavern and plays jokes on a clergyman: “Und wie von hundert Hunden/ Erschallt ein laut Gebell./ Am Geigerbänkel sitzend,/ Aus roten Augen blitzend,/ Sieht einen schwarzen Pudel/ Das bange Bauernrudel:/ Fausts Hund Prästigar genannt, [...]” (Lenau 1910, l.882-888) The dog shows attributes, which can be related to the devilish nature of Mephistopheles. His loud barking seems to be supernatural and his red eyes can be associated with the devil and his relationship to fire. The scaring impression soon disappears, but however, Mephistopheles’s shapes do not always cover his real nature, maybe he is not always willed to cover it. In comparison to Goethe’s Mephistopheles who also turns into a black poodle, abnormal and not animal, outer features of the poodle are not mentioned in the mental representation added to the ontology and also not stated in Goethe’s first Faust drama. But at first, when Goethe’s Mephistopheles appears as a poodle, Faust seems to notice that something is wrong with the animal. He discusses his feelings with his famulus Wagner, but refuses them (Goethe 1985, l.1147-1173). Even though the devils appear as black poodles in Goethe’s and Lenau’s works, the descriptions of these animals are different as well as their usage of this shape: In Goethe’s first Faust drama, Mephistopheles uses this shape to approach Faust so that he can offer him his service, whereas Mephistopheles of Lenau appears as a dog to play jokes on people.

Furthermore, Lenau’s Mephistopheles appears as Faust’s servant (Lenau 1910, l.1502/1503) as well as maybe in his original shape, when he is conjured by Faust so that they can make a pact. But it is not clear, whether it is Mephistopheles’s real devil shape: “Was knistert hinter jenem alten Baume,/ Dem sturmgebrochen, traurig hingelehnten?/ Er ist’s! am Baum hervor, aus Moos und Moder,/ Mit seiner Augen finsterem Geloder,/ Der Teufel blickt gewärtig und bereit/ Und streckt sein Haupt in Faustens Einsamkeit.” (Lenau 1910, l.371-376) Mephistopheles is entitled as the devil and his eyes are again associated with fire, which can emphasise the assumption that he might show his real shape. His sudden entry might remind to Leviathan’s first appearance.

But in Klinger’s novel, when Leviathan appears on the earth, he is described in an impressive and scaring way, whereas Mephistopheles’s shape in Lenau’s poem seems to be only scaring, but not special. In addition, no human character, except the pope, is able to bear up against Leviathan’s devilish appearance. Anyone else is able to bear against Leviathan’s horrible devil shape. This special conception is only stated in Klinger’s novel.

It seems that the different shapes of the devil characters of Goethe and Lenau have much more in common than Leviathan and the characters appear more often in professional clothes than in individual clothes. But all three descriptions also show individual aspects. Lenau’s Mephistopheles appears as a darksome and mysterious hunter, but appearances as a nobleman like shown in Klinger’s and Goethe’s works are not mentioned. During the plot of Goethe’s two Faust dramas and Klinger’s novel, the devils appear in many shapes like a court jester, antique Phorkyas (Goethe), and a nun (Klinger), which are not taken by Lenau.

Lenau’s Mephistopheles with his scaring and devilish eyes and darksome face is rather unique in comparison to the other devil characters. As already mentioned, Mephistopheles’s eyes are often related to fire, the devilish element, but they also contain scary effects. Regarding statements about Lenau’s Mephistopheles given by other characters (statements which also
appear in the ontology), this effect is often mentioned.\footnote{see also Mahal's explanations about this scaring effect, Mahal 1972, p.401} For example, after the disappearance of the devil, Wagner, Faust's famulus who is present when Mephistopheles discusses the sense of life with Faust, states: "Welch ein Gesicht, so fahl und grimmig kalt!/ Wie hat sein Blick so schrecklich mir gestrahlt!" (Lenau 1910, l.223/224) In addition, another character states a rather clear impression about Mephistopheles, when the devil appears: "Wer bist du, frecher, grauser Wicht,/ Mit diesem Teufelsangesicht?" (Lenau 1910, l.1839/1840) One can conclude that Mephistopheles does not always cover his evil nature very well, but this can also mean that he wants to show signs of his evilness. Later on, more statements about Mephistopheles are given and analysed which present difference impressions of him.

Instances describing Mephistopheles’s inward features are not so numerous than for Goethe’s Mephistopheles and Klinger’s Leviathan. But one of his outstanding features is his irony that is reflected by several commentaries and activities. For example, as a black poodle, he makes jokes on a clergyman or teaches a minister in a rather ironic way about censorship (Lenau 1910, see the episode “Die Lektion”). For this reason, Martens states: "...präsentiert sich Mephisto, - ein Anklang, und nicht der einzige an das Goethesche Vorbild -, auch als munterer Gesell mit menschlichen Zügen, der sogar treuerzig sein kann, sich Späße erlaubt und respektlose Kommentare zu allen möglichen Gelegenheiten zum besten gibt."\footnote{Martens 1957, p.135} It is true that especially the mentioned scenes can be humorous, but his mockery is often sarcastic. He shows a lot of intelligence and knowledge about human society, but his ironic commentaries present his indifferent and malicious nature. Regarding Mephistopheles’s intention to destroy Faust, he might not be this jolly fellow entitled by Martens. Nevertheless, in this way, a similarity to Goethe’s Mephistopheles and his ironic criticism about human beings can be observed.

In his attitude to satisfy his desire for revenge, an emotional aspect in the conception of Lenau’s Mephistopheles, this devil has much in common with Klinger’s and Goethe’s devil characters. Before Mephistopheles starts to work on his entire plan concerning Faust, he refers to his previous status as a fallen angel and his damned destiny: "So wird mein Schmerz am Göttlichen sich rächen,/ So will Verstoßener ich mein Leiden kühlen,/ Verderbend mich als Gegenschöpfer fühlen.” (Lenau 1910, l.773-775) Here, one can feel his anger about his role as an outcast from heaven.\footnote{see Martens 1957, p.135} His pain and suffering turns into revenge against God and Faust becomes an object of this revenge. Other emotions or feelings seem to be not possible for Mephistopheles. His anger and desire for revenge remind of Leviathan’s anger. Positive feelings reminding to an angelic origin, shown by Goethe’s Mephistopheles, are not mentioned in Klinger’s and Lenau’s conceptions of a literary devil. After explaining the desire for revenge of Lenau’s Mephistopheles, in the following, his special kind of revenge, his plan, and preparation for the pact will be outlined.

In contrast to Klinger’s and Goethe’s conceptions, the devil independently approaches Faust. In Lenau’s poem, other characters, like Satan in Klinger’s novel or God in Goethe’s first drama, do not point out Faust’s speciality to Mephistopheles. It seems that he chooses his human victim independently. The first prerequisite for the pact is the mentioned rescue of Faust by Mephistopheles. Faust, who is driven by doubts and desire to discover the truth of human
life, climbs therefore up a mountain, but he is in danger to fall down and is rescued by the
darksome hunter who is Mephistopheles. Carl Gibson interprets Mephistopheles’s function as
“Deus ex machina” which is important for the continuance of the plot.\textsuperscript{327} Mephistopheles intervenes in this event and Faust who is even more doubtful and feels betrayed by God, becomes susceptible to an evil influence. Similar to Goethe’s first Faust drama, in two situations, the pact is prepared. In the scene “Der Besuch” when Faust tries to find truth by dissecting a dead body, Mephistopheles suddenly appears and jokes about Faust’s trial. The devil interprets Faust’s work as futile (Lenau 1910, l.184-186). Gibson states: “...Mephistopheles bestrebt ist, dem skeptischen Wissenschaftler Faust die Falschheit seiner Forschungsrichtung und die Unangemessenheit seiner Methode nachzuweisen, ...”\textsuperscript{328} This leads to Mephistopheles’s intention who wants to provide a different way, apart from Faust’s academic research, to the truth:

\begin{quote}
\textquote{Mein wackrer Mann, ich find’ an dir Behagen, 
Drum will ich dir ein Wort des Trostes sagen: 
Dein Schöpfer ist dein Feind, gesteh dir’s keck, 
Weil grausam er in diese Nacht dich schuf, 
Und weil er deinen bangen Hülferuf 
Verhöhnt in seinem heimlichen Versteck.}

Du mußt, soll sich dein Feind dir offenbaren, 
Einbrechen plötzlich als ein kühner Frager 
In sein geheimnisvoll verschansztes Lager, 
Muß angriffsweise gegen ihn verfahren. 
[...]

Wo nicht, dich als entschloßner Mann erheben 
Und kühn zur Wahrheit dringen durch die Schuld. 
Wer glaubt, gehorcht, des Fragens sich bescheidet, 
Als frommes Rind sein Plätzchen Wiese weidet, 
Dem wird wohl nimmer mit dem Futtergrase 
Die Wahrheit freundlich wachsen vor die Nase. 
Den Menschen gab der ewige Despot 
Für ihr Geschick ein rätselhaft Gebot; 
Nur dem Verbrecher, der es überschritten, 
Wird’s klar und leser in das Herz geschnitten.”
\end{quote}

(Lenau 1910, l.191-200, 207-216)

In this speech, Mephistopheles tries to present God as an enemy who seems to be absent and refuses the desired truth of life. One can observe Mephistopheles’s hate against God and his trial to instigate Faust so that he declines his believe in God. Afterwards, Mephistopheles argues that observing truth is only possible by making oneself guilty. By committing crimes, the Christian commandments should be violated. Gibson explains Mephistopheles’s intention:

\begin{itemize}
\item \textsuperscript{327}see Gibson 1989, p.92
\item \textsuperscript{328}Gibson 1989, p.96
\end{itemize}
7.1 Chronological Comparisons of Different Devil Characters

“Anders als Goethe [...] fördert Lenaus Mephistopheles eine prometheische Auflehnung des faustischen Menschen, der Teil der Creatio imperfekta ist. Wahrheitsfindung, letzte Erkenntnis ist nach Mephisto nur in der direkten Auseinandersetzung mit Gott, im übertragenen Sinne nur durch die systematische Destruktion des Gottesbegriffes, möglich.” (Gibson 1989, p.97, see also Sengle 1980, p.669)

Here, the revolt of a human being against God is meant. This can be enlarged by Stefan Greif’s statement about devil characters appearing in literary works of the 19th century: “...wenngleich sie im Einklang mit ihrem Höllemamt deutlicher die Konsequenzen für den Menschen nachskizzieren und jenen Vernunftatheismus predigen, demzufolge jemand, der einen Gott über sich duldet, ein zwar “gutwilliger” aber im Grunde doch “schwacher Tropf” bleibe.” This means that God’s commandments impede the knowledge of truth and therefore, Mephisto’s advice Faust to violate Christian beliefs and also human law. In addition, Gibson relates Mephistopheles’s statement to Friedrich Nietzsche’s philosophy:


By this, Mephistopheles presents a rather modern postulation, but it fits well to an antagonist of God and Christian religion. If Faust gets guilty and leaves his conscience behind him, he is able to discover truth. But his advice to Faust to abandon Christian religion and all the related laws, which are the base of (European) human society, makes a life in society impossible and contains an isolation. But one can anticipate that Mephistopheles is aware that this kind of life is not possible for a human being like Faust who still tries to keep Christian beliefs. But it is Mephistopheles’s intention and reckons with Faust’s destruction. In the end of the scene, Mephistopheles disappears with a stimulating offer to make a pact with him, but without identifying himself as the devil (Lenau 1910, l.217/218). In contrast to Goethe’s and Klinger’s devil characters, Lenau’s Mephistopheles imposes his offer upon Faust, before Faust states the wish to make a pact with the devil. In fact, Mephistopheles arouses this wish in Faust.

After the devil made his offer, Faust contemplates about his doubts and sense of life and finally conjures the devil (Lenau 1910, l.363-376). The devil appears, but he demands that Faust burns his bible he brought with him (Lenau 1910, l.411/412, 419-422). This demand can be regarded as a request to secede from God and it shows Mephistopheles’s antipathy against God and Christianity. After a short time of hesitation, Faust burns the bible and asks for Mephistopheles’s promise to show him the truth (Lenau 1910, l.483-485). Mephistopheles submits his offer and already includes the conditions of the pact:

329Greif 1996, p.11
Chapter 7 A Computer-Aided Analysis of Devil Characters in the Faust literature

“Ich will dafür, bei meinem Leben,/ Die Wahrheit dir zum Lohne geben/ Und Ruhm und Ehre, Macht und Gold/ Und alles, was den Sinnen hold./ Von deiner Seel’ es sich versteht,/ Daß sie mit in den Handel geht./ Laß bluten die verharschte Hand,/ Zu schreiben mir das Unterpfand;/ Und daß dazu beitrage jeder,/ Reich’ ich dir diese Hahnenfeder, …” (Lenau 1910, l.519-528)

In contrast to the agreements in Goethe’s drama, the contract and its conditions are clearly formulated. Mephistopheles promises to show him the truth, whereas Faust should give him his soul. Regarding the pacts in the here compared works the conceptions of the pact and other agreements are rather individual. Leviathan and Faust agree on a bet about human morality, Goethe’s Mephistopheles and his Faust make a pact and a bet concerning Faust’s ambitions not to rest. In Lenau’s poem, the devil offers a pact to lead Faust to the truth. Except from Goethe’s Mephistopheles, the other devils are sure that they will win. Leviathan knows that he can arranges situations so that Faust’s beliefs in morality can be destroyed. Mephistopheles of Lenau knows that Faust is not able to understand his conception of the truth. This means that both devils betray the Faust characters. Goethe’s Mephistopheles also seems to be sure that he can win the bet, but as mentioned, he ignores God’s power. In addition, Faust in Goethe’s work seems to be stronger than the other Faust characters.

As mentioned above and which is also included in the mental representation, Lenau’s Mephistopheles wants to have revenge. Therefore, in the scene “Der Teufel”, he states a detailed plan how he wants to destroy Faust:

“Von Christus ist er los; noch hab’ ich nur
Zu lösen meinen Faust von der Natur.
Gelingen wird’s, ich hab’ es mir durchdacht:
Tief in die Lust, bevor die Lieb’ erwacht!
Mit Weibern zärtlich rohes Spiel getrieben!
Manch Kind gezeugt! - So wird der grade Stand
Sich zwischen Faust und der Natur verschieben
Und er im Unmut stürmen an den Rand.
Dann faßt die Liebe ihn am steilen Bord
Und stürzt hinab ihn jählings in den Mord.
Und schlug er der Natur dann manche Wunde,
So läßt sein Stolz ihn nicht Versöhnung suchen;
Nein! weil er sie gekränkt, wird er ihr fluchen
Und los sich reißen wild aus ihrem Bunde.
Ist mir der Bruch gelungen zwischen beiden,
Von jeder Friedensmacht ihn abzuschneiden,
Dann setzt er sich mit seinem Ich allein,
Und in den Kreis spring’ ich dann mit hinein.
Dann laß’ ich rings um ihn mein Feuer brennen,
Er wird im Glutring hierhin, dorthin rennen,
Ein Skorpion sein eignes Ich erstechen. -”
(Lenau 1910, l.752-772)
Similar to Leviathan’s plan, in Lenau’s poem, Mephistopheles’s plan should be executed step by step. According to Deliivanova, the first step contains Faust’s separation from God, who is already done by making the pact with Mephistopheles. The next steps are entitled by Gibson: “Mephisto verfolgt das über Goethes Konzeption hinausgehende Ziel, Faust von “jeder Friedensmacht” abzuschneiden; über die einzelnen Stationen “Lust”, “Liebe” und “Mord” ...“. Mephistopheles’s intention is to stimulate Faust’s sexual desire so that he starts to seduce women. At Lenau’s time and in his work, sexuality beyond marriage is against Christian rules and human society. Faust should violate the law as well as human relationships. This can also be interpreted with Gibson’s “Natur”. Nature of human beings can be meant as relationships and their organisation in social life. This organisation contains rules, which are related to the Christian commandments. Committing a murder because of love should also violate these rules. This is the next step of Mephistopheles plan. Faust should fall in love, but his love should be destroyed by his crime. Deliivanova interprets this as the destruction of the natural harmony of a human being. Afterwards, Faust would not be able to live in human society. Or as Martens states: “Um es theologisch zu sagen: Mephisto vernichtet beide Möglichkeiten, “nach dem Geiste” und “nach dem Fleische”, mit Gott und ohne Gott, zu leben. Er treibt Faust in die Sünde, aber, und damit ist die Formel der weltschmerzlichen Problematik erfüllt: er macht es ihm gleichzeitig unmöglich, in der Sünde zu existieren.” The last step results in Faust’s isolation from all normal human relations and his desperation, which lead to destruction. By stimulating Faust to commit crimes and to violate human society, Mephistopheles can succeed in his revenge. Maybe, he wants to arrange a situation for Faust in which he is damned to stay. Here, Lenau’s Mephistopheles and Leviathan of Klinger have similar interests. They want to destroy the mentality of the Faust characters before they take their souls. These devil characters are more malicious than Goethe’s Mephistopheles. Furthermore, it seems that their actions are more planned. Goethe’s Mephistopheles only presents general statements about his planned seduction of Faust.

Non-Verbal Actions

After the interpretation of the pact preparations, the plan of Lenau’s Mephistopheles and the pact with Faust – which was more guided by the plot – as well as the comparison to Leviathan and Goethe’s Mephistopheles, further actions are stated and compared. One can detect that the mental representation of Lenau’s Mephistopheles does not contain so many instances including activities than for Leviathan’s representation (cf. Fig. 7.13). But in comparison to Goethe’s Mephistopheles, Lenau’s Mephistopheles performs more actions. Because of the different genres, more or less actions are stated for the different characters. Lenau’s work is a mixture of dialogue structures and telling of events, which might be reasons, why more instances are included in the categories for actions of the ontology. But because of the concentrated narration, there are fewer instances describing actions than for Klinger’s Leviathan.

330 Deliivanova 1995, p.670
331 Gibson 1989, pp.106/107
332 Deliivanova 1995, p.41
333 Martens 1957, p.135
334 see also Mahal 1972, p.414, Gibson 1989, pp.106/107
Most actions of Lenau’s Mephistopheles are related to Faust. Thereby, they often contain magic. His magical transformations into different shapes and forms were already mentioned. Regarding instances in the subclasses of “act_on_object”, one can observe that the devil creates, destroys or uses several things. In the scene “Der Jugendfreund”, he creates a black fog so that Faust can flee from an old friend who is anxious about Faust’s mental changes after he made the pact with Mephistopheles (Lenau 1910, l.735a). Mephistopheles might do this, because he feels that Faust’s friend might influence Faust too much. Later on, by using his magic, he creates a magic ship to amuse the depressed Faust:

“Mephistopheles.
Das Schiff geht stets nach unserm Willen,
Im wind’gen Meere, und im Stillen;
Es ist vollkommen windgerecht,
Denn jeder Wind ist unser Knecht,
Ein jeder muß uns vorwärts schieben.
Das aber ist nicht übertrieben.

Faust.
Und wenn die wilden Stürme rasen?
This magic ship is constructed and prepared so that it cannot be destroyed by the nature’s elements like storms or reefs. The ship can sail by every kind of weather. This shows that Mephistopheles has the ability to control and manipulate the nature, as he wants. But he is not only able to control nature he can also arrange the interior of the ship:


For Faust’s amusement, Mephistopheles can arrange the different seasons inside the ship. In addition, Mephistopheles equips it with literature and offers him a cook who can create culinary pleasures (Lenau 1910, 1,2577-2591). For Faust’s sexual appetite, six females should serve him (Lenau 1910, 1,2592-2595). Faust should be distracted by intellectual and sensual pleasures to avoid his boredom and depression, not to reflect too much about his life. Mephistopheles is afraid, when they sail on the sea, that especially the silent sea would remind Faust of the heaven and God (Lenau 1910, 1,2615-2622). Faust who does not want to travel in a comfortable and luxurious ship, refuses Mephistopheles’s magic ship and the devil destroys it by the fire of his eyes: “Der Böse zürnt, aus seinem Auge fährt/ Ein Blitz aufs Boot, der’s zündet und verheizt.” (Lenau 1910, 1,2635/2636) Here, the association to fire appears again, but in combination with destruction. In contrast to Goethe’s Mephistopheles, Lenau’s devil character can create difficult things by using magic. Goethe’s Mephistopheles is often restricted in his magic. He often needs assistance to perform things. For example, he commissions a witch to prepare a rejuvenation drink for Faust, especially to stimulate his cupidity (Goethe 1985, scene “Hexenküche”). In the war in Goethe’s second Faust drama, he uses three giants to win the war. It seems that the ability of Goethe’s Mephistopheles is more restricted to illusive magic, like his hypnotism of the guests in “Auerbachs Keller” (Goethe 1985, 1,2313-2321). Leviathan does similar illusive actions, for example the magic show at a dinner table. But he is also able to create money or valuable goods and to destroy them again like Lenau’s Mephistopheles. This means that
Lenau’s Mephistopheles is equipped with magic abilities which are also partly mentioned and added to the mental representation of Klinger’s and Goethe’s devil characters.

In Lenau’s work, Mephistopheles’s manipulative actions can be especially observed by actions related to human beings (which are attached to the classes “act_on_subject” and “act_on_object”). To stimulate and activate Faust’s sexual desire, Mephistopheles takes him to a tavern where a wedding party is celebrated. Mephistopheles tries to call Faust’s attention to women, but Faust hesitates. To guide him to the first step of his plan, the devil asks for a violin and begins to play wildly. With his play, he drives the people into an ecstasy and also Faust who begins to dance with a young woman called Hanne (Lenau 1910, l.827-875). Mephistopheles intensifies his play so that Faust and Hanne become intoxicated by the music and Faust seduces her. By playing violin, Mephistopheles unleashes restrained emotions in the people’s mind. Hansgeorg Schmidt-Bergmann explains: “In der Szene “Der Tanz” verführt die dionysische Machtigkeit von Mephinos Geigenspiel die Begehrenden zu einem “bacchantischen Kreisen”, [...] immer stürmischer wird der von Mephisto entfesselte Reigen [...] bis zur Auflösung des Ich und zur ekstatischen Feier des Augenblicks.”335 Here, attributes of the antique gods Bacchus and Dionysus are ascribed to Mephistopheles.336 This means that the devil uses the power of music to seduce Faust. The devil, which seems to know a lot about the human psyche, stimulates Faust’s senses so that Faust loses control over his restrained sexuality.

Manipulative influences can also be observed in Klinger’s and Goethe’s works. Leviathan always knows how to manipulate other characters like the mayor or the hermit, so that they react in his intended way. Goethe’s Mephistopheles manipulates especially Faust by talking, but he also brings stolen jewels to Margarete so that she feels flattered (Goethe 1986, l.2731-2736). It seems that a clever and psychological manipulation is an important ability of the devil characters appearing in the compared works.

Another manipulative action is the ability of Lenau’s Mephistopheles to ban people. In the scene “Der Mord”, Mephistopheles bans servants of the duke, who was killed by Faust, so that both can escape: “Der Böse läßt nur einen Augenblick/ Die Höll’ in seine dunklen Züge blitzten,/ Und die Trabanten stürzen bleich zurück.” (Lenau 1910, l.2025-2027) It is not clear what kind of method Mephistopheles uses, but thereby, he can fend off the servants. It might be hypnosis or the devil bans them by frightening. This reminds of Leviathan’s behaviour when he shows his devilish shape so that other characters are terrified. But in contrast to Leviathan, the effect of Lenau’s Mephistopheles lasts only for a short time and is not so strong. Goethe’s Mephistopheles does not show his real shape, he always stays covered by his masks. Further actions, which the mental representations of the compared characters have in common, are supernatural moves, which might be inherited by older images of the devil. Lenau’s Mephistopheles is also able to fly like Leviathan and Goethe’s Mephistopheles (Lenau 1910, l.1255a). Furthermore, he often uses his ability to appear and disappear. For example, as a scholastic, he suddenly appears at Faust’s home and disappears in the same way (Lenau 1910, l.220-227). One can assume that the devil uses the surprising effect to impress as well as to scare Faust.

---

335 Schmidt-Bergmann 1984, p.110
336 Wine, ecstatic celebrations as well as intoxicated music are often related to Bacchus and Dionysus.
Before analysing speech parts included in the ontology, conclusions for the non-verbal activities are summarised: In the centre of the actions performed by Klinger’s, Goethe’s and Lenau’s devil characters, activities concerning the Faust characters can be stated. Most of them have a strong manipulative manner to guide Faust in an intended direction. Lenau’s Mephistopheles plans to guide Faust by detaching him from Christianity and God and let him committing crimes so that Faust’s relations to the human society are destroyed. Thus, Mephistopheles intends an isolation, which should end in a depression of Faust. Leviathan intends Faust’s mental destruction and therefore, he guides him by showing him cruelty and corrupt actions of human beings. Goethe’s Mephistopheles intends Faust’s seduction to mean pleasures, but he does not intend Faust’s destruction. This shows a complex conception of these characters. All devil characters try to gain new souls for hell. Although the nature of the more modern devil characters does not change, their manipulations expand to more abilities, especially their manipulative speech which is analysed in the following.

Speech Activities

![Diagram](image)

Figure 7.14: (a) Diagram of instances for speech of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the speech classes, which contain instances, are given.
In contrast to Klinger’s and Goethe’s devil characters and their mental representations, for Mephistopheles of Lenau, less instances in speech categories are included in the ontology (cf. diagrams 7.14 and 7.15). Nevertheless, numerous speech actions are performed by Lenau’s Mephistopheles. Most speech actions are statements and commentaries. Especially, similar to the statements of Goethe’s Mephistopheles, Lenau’s devil comments Faust, his attitude and behaviour. But in contrast to Goethe’s character, Mephistopheles of Lenau states commentaries in dialogues with Faust. He does not hide his opinion or does not only state it when Faust is not present. For example, he directly states to Faust: “Dein halbes Leben ist verflossen. Es ward vergrämelt und vergrübelt. Einsam in studiis verstübelt. Hast nichts getan und nichts genossen. Hast noch die Weiber nicht geschmeckt. Noch keinen Feind ins Blut gestreckt. Das Beste, so das Leben beut. Hast du zu kosten dich gescheut.” (Lenau 1910, l.493-500) Mephistopheles does not hide his point of view. His plan to let Faust seduce women and commit crimes, which he describes in a later scene, is already included in this speech. By commenting Faust’s academic life, Mephistopheles tries to draw Faust’s attention to the way of life he prepares for him.

![Diagram of instances for speech of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau.](image)

**Figure 7.15:** (b) Diagram of instances for speech of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the speech classes, which contain instances, are given.

Furthermore, in the scene “Der Tanz”, when both watch dancing women and Mephistopheles calls Faust up to start dancing, he comments Faust’s behaviour: “Dein heißes Auge blitzt es
7.1 Chronological Comparisons of Different Devil Characters

klar:/ Es ist der Lüst' toller Schar,/ Die eingesperrt dein Narrendünkel,/ Sie brechen los aus jedem Winkel.” (Lenau 1910, l.784-787) These words are again directed to Faust and again he comments Faust’s attitude, his depressed sexual desire. One can observe that Mephistopheles only gives a description of Faust’s mental state, but doing so, he tries to provoke him. His intention to guide Faust is often revealed through his statements. After Mephistopheles’s provoking statement, Faust still hesitates and the devil tries to provoke him more: “Ein wunderlich Geschlecht fürwahr,/ Die Brut vom ersten Sünderpaar!/ Der mit der Hölle es hat gewagt./ Vor einem Weiblein jetzt verzagt./ Das viel zwar an Liebeszierden./ Doch zehnmal mehr noch an Begierden.” (Lenau 1910, l.812-817) In a mocking way, Mephistopheles comment Faust’s hesitation to get in contact with the dancing women. He astutely states that because of Faust’s strong desire to find sense of life, Faust is able to make a pact with him, but he is afraid of sexual desire. Here, his commentary reminds of statements about Faust given by Goethe’s Mephistopheles. But Mephistopheles of Goethe does not comment so directly, his intentions are more covered. In addition, his comments are more humorous, whereas Lenau’s Mephistopheles seems to be very sarcastic.

Especially in the end, when Faust suicides and believes that he can still be rescued by God, Mephistopheles coldly states:

“Du töricht Kind, das sich gerettet glaubt,/ Weil’s nun mit einmal sein geängstet Haupt/ Dem Alten meint zu stecken in den Schoß/ Und ihm den Knäuel zu schieben in die Brust./ Den’s frech geschürzt, zu lösen nicht gewußt./ Er wird nicht Mein und Dein mit dir vermischen,/ Das tote Glück dir wieder aufzufrischen./ Du warst von der Versöhnung nie so weit,/ Als da du wolltest mit der fieberheißen/ Verzweiflungsgluth vertilgen allen Streit,/ Dich, Welt, und Gott in Eins zusammen-schweißen.” (Lenau 1910, l.3425-3435)

Here, Mephistopheles emphasises that the pact is binding and Faust has to give his soul in return. For this reason, Martens states:


One can agree on Martens’s opinion that in a cruel manner, Mephistopheles shows Faust the consequences quite plainly. Even after Mephistopheles has completely destroyed Faust’s life, he goes on to torment Faust in his death.

In addition, one cannot feel any humour – which is also missing in the mental representation – in his statements about other characters apart from Faust. For example Mephistopheles states about God: “Der alte Zwingherr hält die Erde/ In knechtisch frömmlender Gebärd.” (Lenau 1910, l.513/514) Mephistopheles presents a rather negative opinion about God who seems to oppress his creation, especially human beings, like a tyrant. Thereby, as already mentioned,
Mephistopheles tries to separate Faust from God. Because of his hate, he describes the cosmos, also God’s creation, as follows:

Da kam aus Schattendickicht eine Eule
Und schwirrt’ unheimlich krächzend um sein Ohr,
Und der geneckte Hirte sprang empor,
Griff in die Flamme mit gewalt’ger Hand
Und raffte ungeheuren Brand
Und schwang ihn um sein Haupt in wilder Hast,
Die Eule scheuchend fort, den schlimmen Gast.
Wie jener Hirt in Waldeinsamkeit
Ums Haupt im Kreise schwang das Flammenscheit,

So schwingt der ew’ge Hirt mit starker Hand
Im Kreis ums feste Haupt den Weltenbrand,
Zu scheuchen fort aus seiner Nacht die Eule,
Die sonst ihm krächzend naht: die Langeweile.”

(Lenau 1910, l.2879-2890)

This description is explained by Gibson: “Der gesamte Kosmos ist, nach Mephistopheles’s spekulativem Entwurf, nur der formale Ausdruck des permanenten Kampfes, den der “ew’ge Hirt” gegen die Langeweile austrägt.” But by stating these negative commentaries about God, Mephistopheles shows a lot of himself. Similar to Leviathan, he still suffers under his damnation and always tries to destroy God’s integrity. Lenau’s Mephistopheles as well as Leviathan of Klinger gives negative statements to present themselves indirectly in a positive way because instead of the absent God, they are present and available for the human beings. Goethe’s Mephistopheles jokes about God, but it seems that he respect him more than the other devil characters do that, and he does not hate him in this way the others do.

Apart from the commentaries about Faust and God, Lenau’s Mephistopheles gives several statements about politics, which are added to the mental representation. This is rather interesting, because similar to Klinger’s conception of the devil, Lenau also attaches own criticism to his devil character. In the scene “Die Lektion” and “Das Lied”, one can observe a strong criticism about the bad conditions of the society of Lenau’s time. Gibson says: “In den Episoden “Die Lektion” und “Das Lied” geht Lenau aber über die reine Belustigung hinaus und verfolgt eine substantielle Kritik an Kirche und Staat.” Mephistopheles and Faust visit a court of a king and the devil praises Faust as a great writer so that he gets the chance to write a song for the wedding of the king. Afterwards, a minister of the king asks Mephistopheles, who again appears as a scholastic, about politics. By answering in an ironic way, Mephistopheles presents his methods of ruling a folk:

“Ihr Herrscher über Volk und Land,
Das ist der Klugheit rechter Stand:
Verkümisiert stets, doch nie zu scharf,

337Gibson 1989, p.120
338Gibson 1989, p.109
Dem Volk den sinnlichen Bedarf
Und lenket so all sein Begehren
Nach dem, was ihr ihm könnt gewähren.
So wird es, nach dem Nächsten greifend,
Niemals weitsichtig, überschweifend
Nach dem gelüsten frechverwegen,
Was nicht in Eurer Macht gelegen.
Das Volk sich gerne selbst belügt,
Es ist am Ende hochzufrieden
Und untertäniglich vergnügt,
Wenn ihm des Zwingherrn Huld beschieden,
Was ohne ihn und seine Kette
Das dumme Volk von selber hätte.”
(Lenau 1910, l.1070-1085)

Mephistopheles advices to rule people in an oppressing way so that they will not become rebellious. Schmidt-Bergmann states that Mephistopheles teaches the minister how to ensure a regime. He explains: “Diskutiert wird die ewig aktuelle Frage, mit welchen Mitteln ein Volk am effizientesten zu unterdrücken sei; Mephistopheles plädierent entschieden für “der Plage rechtes Maß”. But Mephistopheles continues his political education of the minister and presents the intellect and resulting demands for freedom as dangerous things for a ruler (Lenau 1910, l.1090-1093, 1096-1101). Furthermore, he discovers the ability of reading as even more dangerous, because the idea of human rights could arise (Lenau 1910, l.1116-1119). As Hammer mentions, when Lenau refers to the French Revolution, when making his character Mephistopheles speak ironically about the mind as a dangerous factor for a rebellion. One can agree on that because terms like freedom and human rights are strongly reminding of the paroles of this historical event. Schmidt-Bergmann who does not refer to the French Revolution, explains Mephistopheles’s statement in a general way: “Den schlimmsten Feind despotischer Regierungskunst erkennt Mephistopheles im frei sich entfaltenden Menschengeist, der schließlich zur Idee der absoluten Freiheit führt. Deshalb muß er in allen seinen Erscheinungsformen erstickt werden.” After stating the problems of a ruler, Mephistopheles offers a solution to avoid a revolt: “Ich rat’ Euch hier das beste Mittel:/ Wie fü r die Taten einst die Alten/ Zensoren hielten, sollt Ihr halten/ Zensoren als Gedankenbüttel.” (Lenau 1910, l.1120-1123) Mephistopheles’s advice contains the method of censorship to prohibit revolutionary ideas. He continues:

“Einst schlief ich unter grünen Bäumen,
Da ist sein Bild mir klar erschienen,
In meinen patriotischen Träumen:
[...]

339 Schmidt-Bergmann 1984, p.117
340 Schmidt-Bergmann, p.109
341 Hammer 1991, pp.18/19
342 Schmidt-Bergmann 1984, p.109
Chapter 7 A Computer-Aided Analysis of Devil Characters in the Faust literature

Mir ward in jenen Visionen
Beglückter Zukunft schönster Gruß:

Ich sah das Heer von Maulspionen;
Welch ein prophetischer Hochgenüß!

So schaut’ ich damals mit Ergetzen
An Menschenmundes offner Pforte
Spione lauern und die Worte
Auffangen mit Verrates Netzen.

Hat es die Politik gebracht
In ihrer Kunst zu solchen Flügen,
Dann ist begründet Eure Macht,
Dann ist Regieren ein Vergnügen.”

(Lenau 1910, l.1130-1132, 1142-1145, 1152-1159)

Here, Mephistopheles develops the idea of a form of government, which uses censorship and betrayal by spying on people to control them. These methods make a revolution impossible. The ruler is always informed about his people and their activities so that he can operate against them. Mahal relates Mephistopheles’s political statements to Lenau’s biography:


Similar to Klinger, Lenau includes his own bad experiences in his writings. But one should note that Klinger, who struggles with his frustration about his career, is not forced to publish his work outside the country like Lenau. During the time of the statesman Metternich in Austria, Lenau and many other authors have to write under pseudonyms and publish it for example in Germany instead of Austria.

Regarding Mephistopheles’s function in this scene, one can observe that on the hand, the devil is versed to keep company with human beings and to make them believe that he agrees on their opinion, on the other hand, he is used to present a criticism against politics. The devil as an observer from outside is able to detect the bad conditions of the society. But instead of complaining about it, Mephistopheles praises censorship and oppression in a devilish way. This is a kind of irony, which is more sarcastic than Klinger’s Leviathan and Goethe’s Mephistopheles irony. Leviathan always informs Faust about misdoings of human beings and a reader does not have to interpret his statements. But by stating comments about politics, Lenau’s Mephistopheles uses a lot of irony so that the reader has to decode the sense. In contrast to Goethe’s Mephistopheles, Mephistopheles of Lenau presents political criticism in a rather aggressive way. One can agree on Gibson’s statement, who says: “Überall da, wo
Goethe allgemein bleibt, wird der engagierte Vormärzdichter konkret.” In Goethe’s Faust dramas, general human problems, like love, relationships or the contrast of good and bad, are presented. It seems that Goethe is not interested in the discussion of political problems, whereas Klinger and Lenau take more position in this discussion. The reasons of these different conceptions might be observed in the individual context and time of the three authors.

Concerning the statements about himself, which are added to the mental representation, one can detect that Lenau’s Mephistopheles states more than Leviathan, but less than Goethe’s Mephistopheles. The desire for revenge of Lenau’s Mephistopheles is already mentioned above. There, he shows a kind of emotion, but he does not state it in front of other characters. His presentations to other characters are rather different. Before revealing himself, he presents himself: “Auch ich bin Arzt, des Kuren oft gelungen./ Es macht mir Spaß, des Nachts mit klugen Leuten/ Das Menschenlos zu prüfen und zu deuten.” (Lenau 1910, l.144-146) This statement has a lot of irony included, because he “cures” human beings with devilish methods. This might be a separation of Christian religion as well as animations to commit crimes or other seductions. Schmidt-Bergmann mentions: “Der Mephisto Lenaus ist ein “Geist der Negation”, ein moderner Desillusionierter, der Fausts “Verfolgung einer überhirnigen abenteuerlichen Idee” (III, 298) höhnisch kommentiert und den Schein des Lebens zerstört, dem Faust immer wieder aufsitzt.” This leads to Mephistopheles’s comprehension of the truth and sense of life. By destroying moral values of the human society, he wants to guide human characters so that they can be freed from their social restrictions. But Mephistopheles tells the truth here. He only states his intention in a metaphoric way.

In the scene “Die Warnung”, Mephistopheles gives a second self-description to duke Hubert:

“Ich bin was meine Miene spricht
Nur recht ins Gesicht geschaut,
Wenn auch dem Herrn ein wenig graut,
Ihr seht so feinen Kopf nicht mehr.
Betrachtet diese Stirnenfalte,
Da diese finstre, tiefe, kalte,
Von einem Aug’ zum andern quer.
Einst kam ein Mathematikus,
Ein scharfer Ritter Minusplus,
Der schlaue Bursch fixierte mich
Und nannte diesen Faltenstrich
Das Minuszeichen alles Guten,
Vom Kreuze Plus das Gegenteil,
Wobei er dacht’ ans Christenheil.
(Lenau 1910, l.18141-1854)

Here, Mephistopheles does not cover his negative nature, which is reflected in his face. The described wrinkle reminds of a description of Leviathan’s darksome wrinkles between his eyes

---

Gibson 1989, p.109
for a further comparison of Goethe’s and Lenau’s Mephistopheles see Zöllner-Weber 2004 [Master’s Thesis]
Schmidt-Bergmann 1984, p.114
when he appears in front of Faust (see Klinger 1986, pp.41/42, also section 7.1.2). In both devil conceptions, evilness is revealed through their appearances. But in contrast to Leviathan, Mephistopheles’s face seems only to be scaring and he does not have aristocratic lineaments like Leviathan. Lenau’s Mephistopheles also stresses in his statement his antagonistic nature and intention against God. Here, one can be reminded of the self-description by Goethe’s Mephistopheles: “Ich bin der Geist, der stets verneint!” (Goethe 1985, l.1338) Both emphasise their negativity. In contrast to the other two devil characters, Leviathan of Klinger does not state any self-description.

More similarities can be stated by regarding instances of the mental representations of the category “calling_up_on_sb” and its subclasses. For Goethe’s Mephistopheles in the first and second Faust drama, the most instances are included there. But also Lenau’s Mephistopheles has instances in these categories, whereas for Leviathan not so many instances in these categories are included. It is interesting to observe that he does not need to call up for example Faust to perform something. It is Faust himself who demands and orders Leviathan to do things like betraying or killing people. In contrast to Klinger’s novel, Goethe’s and Lenau’s Mephistopheles actively urge the Faust characters to do actions. Lenau’s Mephistopheles calls up on Faust to seduce a woman in the tavern (Lenau 1910, l.788/789) and the wife of a smith in another scene: “Die junge Wirtin tat nur, ob sie grollte,/ Sie lugte auf den schönen fremden Ritter/ Wohl öfter hin und länger als sie sollte;/ Die Weiberzucht hat mür’ und morsche Gitter./ Mach schnell, mach schnell, versäume nicht dein Glück,/ Sie gab dir einen süß;verstohlenen Blick!” (Lenau 1910, l.1524-1529) Afterwards, Mephistopheles already presents him a plan how to seduce the smith’s wife and how he wants to distract the smith (Lenau 1910, l.1504-1513). The devil includes appetent feelings in the behaviour of this woman, but it is not clear if she really has these feelings. In a clever way, he activates Faust’s sexual appetite by including or projecting this desire onto the smith’s wife. A seduction by Faust would fit to Mephistopheles’s plan that Faust should act out his sexuality. But Faust has doubts and is unsteady. This shows that Mephistopheles has to be more active to guide Faust in his intended direction. Goethe’s Mephistopheles also operates with tricks to stimulate Faust’s cupidity. Therefore, he makes Faust drinking a rejuvenation drink, as mentioned in section 7.1.2. Faust falls in love with Margarete, but he hesitates to seduce her. Faust even hides himself in a cave, but Mephistopheles seeks him out and argues:


Here, Goethe’s Mephistopheles does not argue with Margarete’s cupidity like Lenau’s Mephistopheles, but with her yearning and love to Faust. Both devil characters do not mention the feelings of Faust, but they describe the emotional state of the women. In a clever way, they influence their human victims and although the Faust characters hesitate, finally, they are guided in the intended direction. It seems that Leviathan does not have to influence Faust with his arguments. Faust is often willed to seduce women and to commit crimes. But Leviathan’s
speciality is also to demonstrate him situations of cruelness so that Faust is outraged and orders Leviathan to react on the shown cruelness. As mentioned above, Faust then performs self-administered justice and thereby, he commits new crimes. Leviathan’s strategy differs a little bit from the other devil characters, but it has similar results.

In addition, Goethe’s Mephistopheles states other calls, for example to attack and murder Margarete’s brother Valentin who ambushes them in front of Margarete’s home (Goethe 1985, l.3706/3707, 3711). Especially in the second Faust drama of Goethe, Mephistopheles gives a lot of orders to other creatures like assisting devils (Goethe 1972, l.11656-11675) or lemures (Goethe 1972, l.11523-11528). It shows that he uses his power to perform things, which cannot be done alone and his inability to act alone. Lenau’s Mephistopheles and Leviathan do not need any assistance and for this reason, they do not have to give any orders to someone. In Lenau’s poem, Mephistopheles appears as the only devil and it seems that he holds the complete evil power to act and react on his own. Here, conceptions of the three authors differ from each other. Lenau presents a character, which is autarkic, whereas Klinger and Goethe install their devil characters in a hierarchy of the hell. Leviathan as a sovereign of the hell is equipped with evil and magic power so that he might act nearly independently. But he is bound to the orders of Satan. It seems that Goethe’s Mephistopheles ranks in a middle position, but not the highest position in the hell (Goethe 1985, l.1641), because he has not the power of Leviathan or the Lenau’s Mephistopheles. In addition, he is still integrated in God’s plan and therefore, he indirectly serves God.

These mentioned kinds of speech and non-verbal activities, which influence the Faust characters, are contradictory to admonitory speech parts of the mental representations of the devils. But they also belong to the devilish guidance. Especially Lenau’s Mephistopheles uses a special technique to admonish Faust. Mephistopheles reminds Faust of situations in the past and activates Faust’s conscience. Thereby, Mephistopheles relates his speech to previous scenes. For example, in the scene “Die Schmiede”, after Faust seduced Hanne, the woman in the tavern, again appears, but now as a beggar woman together with Faust’s child. Mephistopheles presents her to Faust by using expressions, which were stated by Faust in the tavern. For understanding Mephistopheles’s method, Faust’s description in the tavern and Mephistopheles’s sneering and admonitory speech are given in the following:

Mephistopheles.
Kennst du dein Hannchen noch aus jener Schenke?
O wiederhole die verliebten Schwänke:
(Nachspottend.)

Faust.
“Die mit den schwarzen Augen dort
Reißt mir die ganze Seele fort.
Ihr Aug’ mit lockender Gewalt
Ein Abgrund tiefer Wonne strahlt.

Wie diese roten Wangen glühn,
Ein volles, frisches Leben sprühn!
's muß unermöglich süße Lust sein, 
An diese Lippen sich zu schließen, 
Die schmachtend schwellem, dem Bewußtsein 
Zwei wollustweiche Sterbekissen.

Wie diese Brüste ringend bangen 
In selig flutendem Verlangen!

Um diesen Leib, den üppig schlanken, 
Möcht' ich entzückt herum mich ranken. 

Ha! wie die langen schwarzen Locken 
Voll Ungeduld den Zwang besiegen 
Und um den Hals geschwungen fliegen, 
Der Wollust rasche Sturmesglocken!

(Lenau, 1910, l.790-807)

Mephistopheles uses nearly the same words spoken by Faust in before, but he relates them to his sneering commentaries about Hanne’s present situation and misery. The devil presents Faust’s previous sexual desire for Hanne, but he also shows him the resulting consequences and Faust’s fault. Deliivanova states: “Mephistos böse spottende Wiederholung der Verführungssituation beim Tanz (“Der Tanz”) grenzt in dem Vergleich von “damals” und “jetzt” an den Sadismus, ist dabei vollständig wahr.”346 This means that Mephistopheles does not state untrue things. But one should also note that Mephistopheles influenced Faust in a strong way before Faust seduced Hanne.

In the same way, Mephistopheles reminds Faust of his statement about his love to the truth. At first, Faust refuses his love to women and wants to apply it to the desired truth (Lenau 1910, l.357-360). But later on, when he falls in love with Maria, a princess, and after he murdered Maria’s fiancé, Mephistopheles repeats Faust’s statement (Lenau 1910, l.1972-1977). Here, the devil acts very cruelly, because Faust is confused about his committed murder. But Faust’s confusion seems not to be enough for Mephistopheles, who works on Faust’s destruction. For this reason, he confronts Faust with his betrayed love to the truth.347 Deliivanova also mentions: “Die Erinnerung an begangene Vergehen in Momenten, in denen Faust von Gewissensbissen gequält wird, wird von Mephisto in der Tat kaum versäumt.”348 This means

346Deliivanova 1995, p.158
347see Deliivanova 1995, p.159
348Deliivanova 1995, pp.157/158
that Mephistopheles, who always remembers Faust’s statements, uses them to blame Faust for his crimes. Deliivanova entitles his method as a “weapon”.

But Mephistopheles also reconstructs an event, which is not directly mentioned in the text. In the scene “Der See”, Mephistopheles reminds Faust of the seduction of a nun:

“Blick’ auf die Mauern dort, sind Altbekannte;  
Vor ihnen ist dein schmachtend Lied erklungen,  
Woran die schöne Nonne heiß entbrannte;  
Sie hast du damals feurig übersprungen.  
[...]

Blick’ auf den Mond, es ist derselbe noch,  
Er stand, wie jetzt, genau so voll, so hoch,  
Nur daß er damals eurem Glutverlangen  
Und heute eurem Kummer aufgegangen.  
Der Mond, der deinem Auge strahlt so helle,  
Dringt auch der Nonne mahnd in die Zelle.  
[...]

So sprach der böse Führer; plötzlich sprang  
Er in den See hinab, der ihn verschlang;  
Nach kurzer Weile taucht’ er jetzt empor,  
Und was er hat heraufgeholt vom Grund,  
Streckt seine Hand den Blicken Faustens vor:  
“Das ist aus jenen Zeiten noch ein Fund!”  
Da schimmern schreckhaft hell im Mondenscheine  
Von einem Kind die nassen Totenbeine.”  
(Lenau 1910, l.1705-1708, 1713-1718, 1727-1734)

Mephistopheles reconstructs Faust’s love affair with the nun and shows him the consequence that the seduced nun murdered her child. Here, one can again observe Mephistopheles’s ambivalent behaviour. He animates Faust to enjoy pleasures and to act out his sexuality, but he does not miss to show him the terrible consequences and to remind him of his faults. Thus, the devil is able to work towards Faust’s desperation and mental destruction. Deliivanova adds that Mephistopheles’s method pushes the plot further. Faust gets more desperate and is driven further to commit more crimes. By stating events that are not directly mentioned, Mephistopheles’s function goes beyond the plot level. A reader get an insight of situations not told in the story. Furthermore, the plot itself can be shortened, but without loosing content.

Comparing Mephistopheles’s techniques with the behaviour of Klinger’s Leviathan and Goethe’s Mephistopheles, one can say that all of them admonish and remind of faults. However, Leviathan avoids remembering Faust steadily as Lenau’s Mephistopheles, but in his final

---

349 Deliivanova 1995, S.158
350 Deliivanova 1995, p.161
351 see Deliivanova 1995, p.160
speech, he lists all Faust’s misdoings. In contrast to the devil character of Lenau, Goethe’s
Mephistopheles uses his admonitions to defend himself when Faust tries to blame him for Margarete’s misery. It seems that Goethe’s Mephistopheles acts more situationally. In addition, the admonitions belong more to Mephistopheles’s other commentaries about events on stage. One can also define his reminds as commentarial.

Lenau’s Mephistopheles repeats his method and applies it directly to move further Faust’s desperation. His technique of citing Faust’s statements is rather unique and effective. He knows how to handle Faust and uses his sneering reminds as a weapon against Faust. The here compared devil characters have in common that they appeal to Faust’s conscience after their human victims committed crimes. Although they are often involved in these crimes or they influence the Faust characters to commit them, they disclaim any guilt. Here, traditional, devilish behaviour, like seductions, is combined with psychologically elaborated admonitions. It is also interesting that the devil characters are always aware what is right or wrong according to the rules of the human society. Because of their evil role, they have to know what might be wrong so that they can seduce human beings to do such things. But their admonitory functions might also be a relict of older pictures when the devil was used as an executioner by God. Although, in Goethe’s two Faust dramas, the role of God has been changed and he believes in the good nature of the human beings, Mephistopheles still tries to judge Faust. In Klinger’s and Lenau’s works, God seems to be absent. Nevertheless, by reminding and judging, the devil characters still act as executioners.

Summarising the results of the comparison of speech, one can say that Lenau’s and Goethe’s Mephistopheles as well as Leviathan perform similar kinds of speech activities, like e.g. often sneering commentaries about other characters and situations or admonitory speech. Although the speech parts of Lenau’s Mephistopheles are not so numerous as for the other devil characters, he has large speech parts in Lenau’s work and therefore, corresponding instances in the mental representation of the ontology. In contrast to Leviathan and Goethe’s Mephistopheles, Mephistopheles of Lenau states direct criticism of politics, which can be related to Austrian politics in this time. Furthermore, his admonitory technique is part of his strategy to destroy Faust’s mind. One can summarise that these devil characters have aspects in common, but differ because of individual conceptions by the authors.

In the following, statements about the compared characters are given and analysed. These statements about Lenau’s Mephistopheles are again less numerous then for the mental representation of Leviathan and Mephistopheles in Goethe’s two Faust dramas. Two statements describing reactions on his appearance and face are already given above. Faust’s famulus Wagner and the duke Hubert are scared by Mephistopheles or observe the evilness in his appearance (Lenau 1910, l.223/224, 1839/1840). In addition, the duke seems to be annoyed by him, but not completely scared.

Similar to Wagner, the smith’s wife utters when she watches Mephistopheles: “(Auf Mephistopheles deutend.)/ Doch wer ist der, um Gottes willen?“ / Fragt sie erschrocken, mit verfärbten Wangen.” (Lenau 1910, l.1538a-1539) She is terrified by him and detects that something is wrong with him, but it seems that she is not able to figure out his true nature. These reactions resemble to Margarete’s behaviour concerning Mephistopheles in Goethe’s first drama. One can regard that especially human characters, which might be related to Christianity or care
about what might be right or wrong, are able to discover the evil intentions of Lenau’s and Goethe’s Mephistopheles. Wagner and Margarete detect the enmity of Goethe’s and Lenau’s Mephistopheles against God and his creatures. But not all characters, which identify Lenau’s Mephistopheles, believe in God. Before Faust’s desperation results in his suicide, he and Mephistopheles meet sailors in a tavern near the sea. There, Mephistopheles offers his service to a sailor called Görg, but the sailor refuses it and states: “Ihr seid mir der fatalste Wicht,/ Der mir vorkam in meinen Tagen!” (Lenau 1910, l.3244/3245) Görg does not believe in anything, but he discovers Mephistopheles’s evil intentions, because he might be able to discern right and wrong. A positive statement is given by the minister who discusses politics with Mephistopheles: “Und Ihr, hochpreislicher Scholast,/ Ihr wißt gewiß so manches noch,/ Was recht in meine Pläne paßt;/ [...] Ihr seid ein Mann, noch fand ich nie/ Solch ein politisches Genie.” (Lenau 1910, l.1048-1050, 1054-1055) The minister might play up to Mephistopheles so that the devil gives him advices. Nevertheless, he does not discover Mephistopheles’s true nature. After Mephistopheles advises how to oppress people, the minister states a little bit surprised: “Ihr seid sehr wunderlich, Scholast!/ Ich sah noch niemals Euresgleichen;/ Betracht’ ich Euch genauer, fast/ Will mich’s unheimlich überschleichen.” (Lenau 1910, l.1202-1205) He seems to be more surprised about Mephistopheles’s direct suggestions to oppress people than scared. His enthusiasm prevails over his suspiciousness, because he approves Mephistopheles’s cruel suggestions. Neither the minister is able to identify Mephistopheles as the devil nor he detects irony in the devil’s speech. Comparing these reactions to reactions on Leviathan, one can observe, as mentioned in section 7.1.2, that Leviathan in his human shape is not identified as the devil. Here, Lenau’s and Klinger’s conceptions are more related to each other than to Goethe’s devil character.

One hypothesis stated in the beginning of this chapter was the guidance of Faust by the devil characters. As analysed above, all compared characters present a plan how to seduce and guide their human partners. It was outlined that Leviathan and especially Lenau’s Mephistopheles state a detailed plan in contrast to more general statements by Goethe’s Mephistopheles. Lenau’s character presents a plan, which he exactly follows afterwards to destroy Faust. The intentions of the guidance and manipulation of the devil characters are rather individual. Mephistopheles of Lenau wants to isolate Faust from the society and to drive him to a desperate death. Leviathan wants to show Faust cruelty and corruptness of the society so that Faust’s beliefs are destroyed. This mental destruction seems to be similar to the intention of Lenau’s Mephistopheles, but the motivations are different. Their motivations and intended guidance are influenced by different philosophical directions that are attached to the conception of these characters. In addition, Leviathan kills Faust who does not suicide like in Lenau’s poem. In contrast, the general plan of Goethe’s Mephistopheles to pull Faust down to mean desires sounds rather harmless. Concerning the execution of the guidance followed after the plan, one can say that Goethe’s Mephistopheles also guides Faust, but his guidance seems to be more unclear and hidden. Leviathan’s guidance is more planned and affected by his negative opinion about human beings, whereas Lenau’s Mephistopheles guidance is also well planned, but motivated by his desire for revenge. But in summary, one can observe strong and psychological influences by all devil characters on their human partners. Evilness here appears in all kind of facets combined with intelligence and knowledge about the human nature, which might make these devils more dangerous than before.
Another hypothesis concerned the abilities of the devil characters. Lenau’s Mephistophelés as well as Leviathan, as mentioned above, show a large scale of magical productions. But Goethe’s Mephistophelés needs assistance from other supernatural creatures. But in their transformations, the conceptions of Goethe and Lenau are rather similar. Both appear as a scholastic and a black poodle. Leviathan presents himself in many different human shapes, which are not related to the shapes of other devil characters. But also other shapes like the hunter (Lenau), court jester (Goethe) or Phorkyas (Goethe) not mentioned for the other devil characters can be observed in Lenau’s and Goethe’s work. These appearances might be influenced by images outside the Faust literature. Apart from their magical features and abilities, especially for Lenau’s and Goethe’s Mephistophelés, irony and as commentarial functions concerning events and the behaviour of other characters are important. Leviathan’s rather serious commentaries are also numerous, but he often repeats his point of view, whereas the other devil characters comment things in more various ways. Goethe’s Mephistophelés shows nearly humorous commentaries, whereas the others present things in a sarcastic and embittered way. This might be related to their negative feelings and desire for revenge. Lenau’s Mephistophelés as well as Leviathan still seems to suffer because of their damnation. In contrast, Goethe’s Mephistophelés does not suffer so much and is able to feel positive emotions. However, by stating feelings, these characters appear as main characters, which is a further development from older conceptions of the devil in Faust stories. As mentioned in section 7.1.2, Goethe’s Mephistophelés shows an ambivalent nature, which leads to a rather modern devil conception. In addition, because of his confusion in the end of Goethe’s second drama, he seems to be the first devil in the Faust tradition, which looses the promised soul. The two other devil characters retain a negative attitude. In contrast to Goethe’s Mephistophelés, they are developed further in this negative direction of maliciousness and cruelty. Both are not satisfied to take Faust’s soul, they also destroy the personality of their victims. Furthermore in Lenau’s poem, this aspect is intensified, Mephistophelés drives Faust so far in his desperation that he kills himself. He states triumphantly after Faust’s suicide: “Da bist du in die Arme mir gesprungen,/ Nun hab’ ich dich und halte dich umschlungen!” (Lenau 1910, l.3436/3437) Mephistophelés seems to savour his triumph less than Leviathan, but both stress their role as a winner so that they can satisfy their thirst for revenge.

One notices that even though there are several similarities, the conceptions of the devil characters are rather individual and do not always follow traditional conceptions. Regarding the positions of these characters in the stories, they are coequal to the Faust characters. They often drive the plot further. This shows a further shifting in their conceptions. It seems that devil characters are not merely functional any more. But although these modern conceptions of devil characters present many facets, they are still restricted in contrast to the human characters, which can feel real love and mercy. The devil characters are mostly restricted to negativity and have to fulfil their role as seducers. Other roles are not intended for them.
7.2 Comparisons of Devil Characters according to the Genres of Drama and Novel

After the more chronological oriented comparisons, an analysis which focuses on different genres is presented, including comparisons of the Faust dramas of Marlowe and Goethe as well as the first Faust story, the Historia, and Klinger’s novel. Goethe’s devil character however appears more often in the analysis, because his work stands in many relationships to other literary works.

7.2.1 Continuance of a Devil on Stage - Mephistopheles in Marlowe’s and Goethe’s Dramas

In this section, Marlowe’s and Goethe’s Mephistopheles are compared. The focus lies on the identification of developments from Marlowe’s dramatic conception of his devil character to the later conception of Goethe. By discovering similarities and differences in the mental representations included in the ontology, one might draw conclusions regarding which traditional images are maintained and which are further developed. Therefore, an important aspect of the analysis will be early and later theatrical conceptions of the devil characters. Similar to chapter 7.1.3, to avoid redundancy, already stated citations are only repeated if necessary.

One working hypothesis is that inner features and qualities of the devil character, which appear for the first time in Marlowe’s play, are elaborated in Goethe’s dramas. In this way, the conception of a more minor character develops further to a main character. Another hypothesis is that traditional appearances of a devil on stage are kept, whereas things like actions, which might be more important for Marlowe, are lost later.

Regarding figure 7.16, one can see that Marlowe’s Mephistopheles is described by less instances than Goethe’s Mephistopheles. The representations are taken from Goethe’s both Faust dramas and therefore the numbers of instances are much more higher than for Marlowe’s Mephistopheles and one can detect that the representation of Marlowe’s character is limited on only a few categories. This can already hint at the conclusion that Marlowe’s character is a minor character and as outlined in section 7.1.1. Nevertheless, this view does not take considerately the quality of his features and activities into account. In the following, these features are analysed in comparison to Goethe’s devil character.

Inner and Outer Features

In contrast to Goethe’s Mephistopheles, the described features of Marlowe’s Mephistopheles are only stated in a few instances and in categories of the ontology concerning inner and outward features (see Fig. 7.17). As mentioned in section 7.1.1, in Marlowe’s drama, Mephistopheles only appears as a Franciscan friar, whereas Goethe’s Mephistopheles presents himself in a poodle shape and different human shapes, like a scholastic, nobleman, or a court jester. In addition, when he borrows the shape of Phorkyas, an antique appearance is attached to his conception. It seems that from Marlowe to Goethe, the repertoire of the devilish appearances has been enlarged. One could assume that particular these transformations of shapes might
Figure 7.16: Diagram of instances for the characters Mephistopheles of Marlowe and Goethe. On the x-axis, the absolute numbers of instances are represented. On the y-axis, all classes, which contain instances, are given.
be special for Goethe, but as analysed in section 7.1.3, several devil characters in the 19th century – similar to Goethe’s Mephistopheles – also show numerous appearances.

It is interesting that Goethe does not adopt the shape of a friar. But one reason might be that in Goethe’s two Faust dramas, Christian morality and criticism about the church and clergymen are not the main topics anymore. Although, as mentioned in section 7.1.1, Marlowe uses Christian terms and characters in a more modern way, he still criticises the Christian church.

For Marlowe’s and Goethe’s Mephistopheles, detailed descriptions about their lineaments are not given. It might be special for the drama genre that characters and their features have to be described in other ways, apart from statements by a narrator. However, Goethe’s Mephistopheles shows implicitly numerous facets of his inner features by stating and commenting them. As mentioned, especially his irony plays an important role in his statements. In Marlowe’s drama, one cannot draw conclusions about Mephistopheles’s statements about his inner features, because nothing is mentioned in the drama and therefore, also not in the mental representation. According to conclusions in section 7.1.1, Mephistopheles is more functional and not a main character. Therefore, the description of the character might be limited. Yet similar to Goethe’s Mephistopheles, he also implicitly shows violence and aggression when he beats clergymen in Rome or threatens other characters by transforming them into animals (Marlowe 1998, p.167, [3.2] l.37-39). The violence of Goethe’s Mephistopheles mostly reveals itself by threatening or
commanding other characters be murdered.\textsuperscript{352} In contrast to Marlowe’s Mephistopheles, he orders the executed acts by others and does not perform them on his own.

Apart from their character features, Marlowe’s as well as Goethe’s Mephistopheles is equipped with feelings. But these feelings are not so often stated. Mephistopheles in Marlowe’s drama mentions that he suffers under his damned destiny (Marlowe 1998, p.147, [1.3] l.77-81, p.154, [2.1] l.118, 119-123). As analysed in section 7.1.1, in Marlowe’s drama, the hell seems to be more an inner state than a real place. Mephistopheles, who is damned to stay in this state, is not able to reach heaven, another and better state. Marlowe’s rather modern conception of the hell and heaven is not taken by Goethe. In Goethe’s first Faust drama, the heaven with God and his angels is shown in a very traditional way. Also, at the end of Goethe’s second Faust drama, when Mephistopheles tries to catch Faust’s soul, it is mentioned that the hell opens and lets out assistance devils (Goethe 1972, l.11643a). This indicates that Goethe presents a different and more traditional conception of the hell and heaven. In addition, Goethe’s Mephistopheles does not seem to suffer as much. Marlowe’s devil conception might be the first one, which is equipped with feelings, but this suffering is not adopted by Goethe. In contrast, Goethe’s Mephistopheles shows positive feelings to the angels. There, it might be reminded of his angelic origin. Nevertheless, it might be credited to Marlowe and authors like Milton that later devil characters are enriched with emotional features like in Goethe’s Faust dramas. The conception of Marlowe can be seen as a signal of the beginning of further developments for a main character.

\textbf{Non-verbal and Verbal Activities}

By paying close attention to the numbers of instances included in categories concerning verbal actions and non-verbal actions (cf. Fig. 7.18 and 7.19), one can observe that Marlowe’s character is less represented in these categories than Mephistopheles of Goethe. However, the difference between the numbers of instances of Marlowe’s and Goethe’s Mephistopheles in the categories for non-verbal actions is not so great. In Marlowe’s drama, the devil character performs several actions. In relation to Goethe’s two longer dramas, the devil character of Marlowe’s shorter drama performs many actions. These activities are mostly done in connection with his service to Faustus. For this reason, Mephistopheles often uses his magic. For example, Marlowe’s Mephistopheles provokes Faustus with things or conjures people like Helen of Troy (Marlowe 1998, p.176, [5.1] l.25a/25b) or Alexander the Great (Marlowe 1998, p.170, [4.1] l.61a). The episode with Helen might be rather special, because it is not just an attraction for Faustus; actually he falls in love with the appearing Helen. It seems that he is nearly obsessed by her. Goethe also arranges a love affair between Faust and Helen, which is initialised by Mephistopheles in the shape of Phorkyas. But in Marlowe’s play, Mephistopheles only has the task of making Helen appear. It seems that he does not influence Faustus. In contrast, Goethe’s Mephistopheles, as mentioned, plays an important role by introducing Faust to women. His intention is to draw Faust’s attention so that he wishes to hold on for the moment. Marlowe’s Mephistopheles does not state any plans to seduce Faustus. Here, one can also detect that his conception is not so detailed as in Goethe’s dramas. In addition, female

\textsuperscript{352}cf. animating Faust to murder Valentin (Goethe 1972, l.3711) or ordering to murder Philemon and Baucis (Goethe 1972, l.11359-11369)
apparitions, like Helen of Troy, are created by Mephistopheles, but they are not real human characters.

In Marlowe’s drama, it can be assumed that the pact with the devil is already a huge crime or sin, whereas in Goethe’s Faust dramas, God allows Mephistopheles to get in contact to Faust. This means that a pact between the devil and a human being is not regarded as a sin. But for Faust, the moment, which he wishes to hold on, is something like a sin. Therefore, Mephistopheles has to make an effort and has to influence and mislead Faust. Christian sins – except from the love affair with Margarete and her misery that can be seen as a sin – are not the main topic of Goethe’s Faust dramas. Because of these different intentions, the conceptions of the devil characters in Marlowe’s and Goethe’s plays differ.

Goethe’s Mephistopheles uses his magical skills or is assisted by other magical creatures as well as using his own psychological influence to perform actions. In Marlowe’s drama, Mephistopheles also has the ability to understand Faustus’s nature. In one scene, he observes Faustus’s doubts and desperation about his situation and gives him a dagger to suicide. But this is a singular manipulation and in contrast to the steadily manipulative acting devil character in Goethe’s Faust dramas, the actions of Marlowe’s Mephistopheles appear rather functional. But one should note that in the B-text of Marlowe’s play, Mephistopheles mentions the manipulation of Faustus (Marlowe 1998, p.241, [5.2] 1.91-95). He says that he blocked Faust’s mind when he tried to engage with Christianity and God. There, he also states: “What, weep’st thou? ’Tis too late. Despair, farewell!/ Fools that will laugh on earth must weep in hell.” (Marlowe 1998, p.241, [5.2] 1.96/97) This commentary shows a dead hearted nature. It is reminiscent of the commentary about Margarete’s misery of Goethe’s Mephistopheles and Faust’s outrage about it (cf. section 7.1.2). In the following, different kinds of speech of the devil characters will be compared.

The numbers of instances concerning the mental representations of Marlowe’s and Goethe’s Mephistopheles, included in the categories for speech in the ontology, differ very much. The speech parts of Marlowe’s devil character are often restricted on explanatory answers to Faustus. By giving explanations about the world and its nature, Mephistopheles serves in a traditional way and has to satisfy Faustus’s curiosity. But his answers are rather individual, e.g. Mephistopheles’s statement about the hell and heaven and do not always present facts about the world of Marlowe’s time. He also gives contradictory explanations. For example, he comments Faust’s desperation not to reach heaven anymore: “But think’st thou heaven is such a glorious thing?/ I tell thee, Faustus, it is not half so fair/ As thou or any man that breathes on earth.” (Marlowe 1998, p.157, [2.3] 1.5-7) It is not clear what is meant with heaven, but Mephistopheles might be reminding of a more traditional picture of the heaven in contrast to his statement about the hell. Furthermore, his view on human beings also seems to be contradictory. On the one hand, he says that human beings are better than the heaven. But on the other hand, he is envious of them and tries to seduce them so that human beings have to share the suffering of the devil in hell. In contrast, Goethe’s Mephistopheles remarks the imperfection of human beings, when the devil appears in heaven (see also 7.1.2, Goethe 1986, 1.279-286). Furthermore, his opinions about e.g. human love, especially Faust’s love to Margarete, as mentioned in section 7.1.2, are rather negative. Marlowe’s Mephistopheles seems to admire human beings more as God’s creation than Goethe’s devil character does. The
negativity of Goethe’s Mephistopheles is also observed by other characters such as Faust or Margarete. Faust’s reactions to Mephistopheles’s sarcastic commentaries often result in insulting the devil (e.g. Goethe 1985, l.3324, 3326, 3338, 3699). Another reaction is, as mentioned in section 7.1.2, Margarete’s antipathy or even fear of Mephistopheles’s appearance (Goethe 1985, l.3487-3491). But his negativity and evilness are only discovered when other characters get to know him better. Otherwise, he is able to conceal his intentions. Such commentaries or reactions cannot be found in Marlowe’s drama.

Coming back to the speech of the devil characters, one can detect that the explanations of Goethe’s Mephistopheles, which present facts about the world, are less numerous instances in comparison to his statements and commentaries. As already observed, he comments the characters and events occurring on stage. Thereby, he presents an ironic and distanced view. But his statements, especially the definitions of the evil, are not always illuminating. In a clever way, Mephistopheles tries to confuse and to avoid clear answers. He only seems to state things suitable to the situation and intention. Other commentaries are mostly directed to the audience and not to the characters on stage. In Marlowe’s drama, for example Mephistopheles’s statement about his suffering feels more honest. But Marlowe’s Mephistopheles does not have

---

353 see section 7.1.2
7.2 Comparisons of Devil Characters according to the Genres of Drama and Novel

Comparing more kinds of speech, one can observe that Marlowe’s Mephistopheles does not state any admonitions as Goethe’s Mephistopheles. Also, other speech acts are only described for Goethe’s devil character. In summary, one can say that Marlowe’s non-verbal and verbal activities are not as numerous as in Goethe’s dramas, but there are tendencies towards an individually acting devil character.

Concluding this comparison, one can state that the conception of Marlowe’s Mephistopheles is located on a level between a functional character restricted to traditional or typical features and a more modern and individual conception. This character, which is equipped with feelings and often states individual commentaries, might be a rather exceptional conception of the devil for this time, even if he stays a minor character. The later devil character of Goethe’s Mephistopheles might inherit some parts and is developed further to a modern conception.

Figure 7.19: Diagram of instances for speech of the characters Mephistopheles of Marlowe and Goethe. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the speech classes, which contain instances, are given.
It is not clear whether Goethe adopts aspects directly from Marlowe’s drama, since he might have been influenced by other conceptions of the devil coming after Marlowe. One can however assume that Marlowe’s conception sets a standard for modern and individual devil characters, which are enlarged to main characters equal to the Faust characters.

Some of these new developments are that Goethe’s Mephistopheles uses his psychological power to influence and mislead Faust. In addition, he is featured with strong sarcasm and irony. Thereby, he becomes an observer of human characters and events occurring on the stage. In contrast to Marlowe’s Mephistopheles, his speech part is largely expanded. Although Goethe’s Mephistopheles has a weaker position, his skills make him similar dangerous or even more dangerous as Marlowe’s Mephistopheles.

7.2.2 Sophistication of Maliciousness - the first Mephistophiles and Leviathan of Klinger

Similar to the last section, here, one of the earliest devil characters appearing in the Historia is compared to the later character of Klinger. In contrast to the compared characters in section 7.1.3, both characters are integrated within a prose text. For this reason, early and later conceptions as well as further developments of devil characters should be identified concerning this genre. Working hypotheses for this section are: Although traditional aspects of devil characters are kept, many differences can be detected between the devil in the Historia and in Klinger’s novel. The earlier conception might be used as a draft for Klinger’s devil character, but Leviathan appears as a stronger variation. In addition to this hypothesis, another one is that in spite of different variation, the later devil character is still restricted on traditional conceptions and images, which are influenced by the Historia.

Mephistophiles of the Historia is described by less than 40 instances, whereas the mental representation of Leviathan contains more than 190 instances (cf. Fig. 7.20). In several categories, one cannot find instances describing Mephistophiles, but there are several instances included describing Leviathan (cf. for example classes “face” or “irony” in Fig. 7.21). There are however categories, which only hold instances of Mephistophiles but not of Leviathan. These observations and further aspects are analysed in the following.

Names and Features

A difference can already be observed by regarding the names of the devil characters. In most of the other Faust stories, the name Mephistopheles/ Mephistophiles is used following the Historia. But in Klinger’s work, the name Leviathan is chosen (see also section 7.1.2). Furthermore, Leviathan, unlikely Mephistophiles, appears to be a sovereign in hell.

Regarding the instances included in the feature categories of the ontology, one can detect that there are also less instances for Mephistophiles than for Leviathan. But both take on a diversity of shapes. In the Historia, especially in the beginning of the story and as mentioned in section 7.1.1, Mephistophiles transforms into fantastical forms, like a dragon or a star. As already stated, this belongs to a devilish spectacle to impress and terrify Faustus. Leviathan does not
change his form when he appears in front of Faust, yet his appearance seems to provoke a similar effect. Both devil characters might intend a demonstration of their power.

Leviathan of Klinger does not choose fantastical shapes like Mephistophiles, but he shows his devilish outward form several times in order to terrify other characters. This is a new variation not mentioned in the Historia.

After making the pact in the Historia, Faustus commands Mephistophiles to appear as a friar when serving him. Then once only, the devil dresses himself as the pope (Historia von D.Johann Fausten 1988, p.69).\textsuperscript{354} In contrast, Leviathan who is not restricted on the shapes can choose dresses depending on different situations, for example as a rich man (Klinger 1986, p.55) or a nun (Klinger 1986, p.82). Leviathan’s appearances in ecclesiastic guise might have a similar intention to those of Mephistophiles. In both works, thereby, a criticism about the church and clergymen is stated, it might also be a mockery.

For Leviathan, a detailed description of his human face and tall shape is given that is completely missing in the Historia. One reason might be that Mephistophiles is a more minor and functional character. Another reason might be Klinger’s intention, (cf. section 7.1.2), to

\textsuperscript{354}see also section 7.1.1
Figure 7.21: Diagram of instances representing features of the characters Mephistophiles of the Historia and Leviathan of Klinger. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the feature classes, which contain instances, are given.

emphasise Leviathans angelic origin by presenting Leviathan’s impressive and nearly beautiful face. Later devil characters appearing after the Historia might influence Klinger’s conception. In the Historia, the appearance of the devil character has no angelic signs. Apart from his stated shapes, his outward features are neither described in detail or commented by others in the Historia nor described in the mental representation. Therefore, it is not clear which effect is produced when other characters regard him. In contrast, commentaries and impressions by other characters about Leviathan’s face are stated several times. His human appearance mostly produces positive effects for example by a young friar (Klinger 1986, p.134) or the pope (Klinger 1986, p.170). But his devilish outward form terrifies most of the people (see also section 7.1.2).

More inner features of the devil characters are violence and maliciousness. In the Historia, these features can be detected implicitly by regarding several actions of the devil character. His function is to frighten, to murder, or to show brute force. These are rather stereotypical actions that allow for some conclusions about inner features, but give no detailed insights. Motivations like intended desire for revenge or hate are not given. He might only be serving as a danger, which enters in human life. In contrast, Leviathan is often shown by bearing hatred towards human beings, especially Faust. Direct explanations of these feelings are also missing,
but one can understand them as anger, which is his motivation of his malicious activities and manipulations. Even though only negative emotions are attached to Leviathan, this character appears more enriched than the Mephistophiles of the Historia. One can assume that these differences are based on developments of the devil character during the centuries, which result in the conception of the character Leviathan.

**Actions and Speeches**

In the categories for non-verbal actions, there are also fewer instances included for Mephistophiles's mental representation than for Leviathan’s. But here, both often have instances in the same categories. For Mephistophiles, even more instances are added to the categories “create object” and “change form”. Mephistophiles’s and Leviathan’s transformations are already mentioned above. By regarding other actions, one can observe that both devil characters serve human characters by producing treasures or valuables to Faust or other characters. But in the Historia, these items are mostly created by Mephistophiles to provide for Faustus so that he can live in comfort. Leviathan offers valuables to other characters to seduce them (cf. section 7.1.2). Thereby, he demonstrates their greed for money and corruptness to Faust. This is a part of Leviathan’s plan, mentioned in section 7.1.3, to show Faust the badness of the human society. Christian morality is only included indirectly, because Klinger refers to philosophical thoughts, which might be influenced by Christian beliefs.

Such intentions based on philosophical thoughts are not included in the story of the Historia. But Faustus’s debauched life and his pact with the devil might already serve as a bad example for the reader. In Klinger’s work, the original idea of the pact appearing in the Historia seems to be displaced by Leviathan’s presentation of the bad effects of the decadent society on human beings.

Furthermore, Mephistophiles in the Historia does not often frustrate Faustus during his service. If Faustus demands something, Mephistophiles does not deny it, except from Faustus’s wish to marry (Historia 1988, pp.27-29) or things concerning Christianity. Although Mephistophiles also betrays and distracts Faustus, the devil does not want to destroy his mind and beliefs like Leviathan does. In the Historia, Faustus only complains about his fate when Mephistophiles’s service reaches an end and Faustus is aware of loosing his soul (Historia 1988, pp.113/114). But in Klinger’s novel, Leviathan steadily works on Faust’s desperation and frustration. This means that he already tortures Faust on earth.

Furthermore, one can observe that Leviathan performs many interactions with other characters which are mostly missing for Mephistophiles (see instances in the category “act_on_subject”). Most of Leviathan’s interactions are manipulative. He corrupts other characters with things they desire so that their corruptness and greed are again revealed. As mentioned, interactions with other characters are not so numerous for Mephistophiles of the Historia. But by terrifying or harming people, he often acts and reacts in a violent way. Thereby, his actions are very coarse and stereotypical. Leviathan’s interactions also harm others, but he does it in a more elaborated and nearly elegant way. He often knows how he can ingratiate himself with and influence others. Nevertheless, his services or offers to them often result in their misery.

In summary, both devil characters have several kinds of actions in common, but Leviathan’s actions appear more cleverly, whereas Mephistophiles acts rather stereotypically. Yet, one can
Figure 7.22: Diagram of instances representing actions of the characters Mephistophiles of the Historia and Leviathan of Klinger. On the x-axis, the absolute numbers of instances are represented. On the y-axis, the action classes, which contain instances, are given.

already see a huge development between these devil characters. Comparing different kinds of speech show more developments of these characters. This is discussed in the following.

For the mental representation of Mephistophiles, instances are only included in some speech categories. In contrast, instances describing Leviathan’s speech actions are spread over nearly all speech categories. But by comparing the numbers of instances in the speech categories, one can see that his statements and commentaries are predominant. Mephistophiles’s speeches are restricted on explanatory answers to Faustus. This kind of speech belongs to his service and thereby, he has to answer for example Faustus’s questions about the organisation of the cosmos (Historia 1988, pp.46-47) and the hell (Historia 1988, p.31). This behaviour corresponds to Mephistophiles’s more functional role in the Historia. Leviathan performs a lot of speech, like commentaries, reports, and admonitions. His real manipulative quality is shown—as mentioned—by his statements, which influence the human characters, especially Faust. One can observe that in contrast to the early conception of Mephistophiles in the Historia, Klinger’s character is enriched with a large repertoire of speeches and eloquence. In general, one can say that a literary devil of the 18th century and later on stimulates and provokes human characters by talking. Leviathan still uses brute force like Mephistophiles of the Historia, but only to act out his desire for revenge. However, Leviathan’s force is mostly expressed by
his verbal actions. To succeed, Mephistophiles is restricted to coarse actions and reactions. But in the end, both devil characters triumph over their human victims. One should note that Leviathan triumphs not only by gaining Faust’s soul, but he also destroys Faust’s mind. This is a further enlargement in contrast to Mephistophiles’s simple intentions of gaining Faustus’s soul.

In summary, typical features like different appearances and actions, e.g. violent behaviour or harming people, are already described for Mephistophiles in the Historia. They also belong to Klinger’s conception. One can assume that these aspects might be rather typical frameworks in which devil characters in the Faust literature are arranged. In addition, new features and activities are attached to the literary devils. Thereby, many variations, especially in Klinger’s work, are possible.

7.3 Conclusion to the Computer-Aided Analysis

After comparing the characters of the different Faust works, a brief summary of the conclusions from the previous sections and general conclusions referring to the criteria in the beginning of chapter 7 are given. In figure 7.24, a sketch of the changes and the developments of the devil characters between the different works are depicted.
Mephistophiles of the Historia, one of the earliest devil characters appearing in the Faust literature, is rather functional and not developed in detail. In his conception, he is limited on a few features and behaviours. One can clearly define him as a minor character. He is a devil character between Medieval and Renaissance conceptions, half serving ghost and half dangerous seducer. Nevertheless, he influences other characters with his evil power. Especially in the end when he takes Faustus’s soul, he controls the situation. Furthermore, he is already equipped with aspects, which are often attached to later conceptions of devil characters. Especially his magical transformations, supernatural productions, his violent and brute behaviour and maliciousness are adopted by later Faust works.

In Marlowe’s play, the devil character inherits several things, like his shapes – which are observable in the mental representations of both devil characters – from the English translation of the Historia. But in addition, even if his conception is still as a minor character, he presents individual ideas like his comprehension of the hell and heaven. Furthermore, he suffers because of his damned fate. This aspect enriches the devil conception and leads it into a new direction. He might be a precursor for the conceptions in later centuries. At first, after Marlowe’s drama, the devils in the Faust literature do not often inherit these aspects. The Faust works, released in the next centuries, are often enlarged copies of the Historia so that also the devil characters do not develop further. But apart from these Faust works, literary devils like Milton’s Satan can undergo possible developments. One can assume that new ideas and motifs are taken from these conceptions and introduced into the Faust literature. In the 18th and
19th century, a lot of Faust works and thereby also devil characters appear. However, although they are developed in a short time span and appear successively, the characters are rather individual. One of the most varying characters is Leviathan of Klinger. His appearance and manners are exceptional. From outside, he is more a dark angel than a devil, but in contrast, his inner features are more evil than his previous “colleague” in Marlowe’s play. Featured with intelligence and an experience of human nature, he acts out his hate against human beings by tormenting Faust even in his life. Thereby, the quality of the character becomes equal to the conception of the Faust character and in the end, Leviathan appears as a triumphant judge.

Then, in Goethe’s first and second Faust drama, one of the most well known devil characters is conceived. His position in the fictional world and relationship to Faust are much more complex than in earlier works. Like Leviathan, he is equipped with intelligence and cleverness. His influential force lies in his speech. Often, his ironic commentaries show his serenity. Furthermore, he is able to conceal his intentions. But he still uses magic to manipulate other characters, especially Faust. Although he is often able to guide Faust in his intended direction, he is the first devil who loses in the end. Because of his ambivalent nature, he can still feel transcendent love of the angels. This feeling confuses his evil side. He has not the dark beauty of Leviathan, but in his inside, he still has parts of a fallen angel.

Lenau’s Mephistopheles, also featured with high intelligence, acts similar to Leviathan. Faust cannot escape from his manipulative and evil guidance. By gaining Faust’s soul, he seems to be the most active devil. His strong influence even begins before the pact. By seducing Faust to commit crimes and admonishing him afterwards, he destroys the mind of his human victim. His desire for revenge has no limitations and because of the absence of a divine authority, he can triumph about causing Faust to commit suicide.

After summarising these results, conclusions concerning the criteria in the beginning of this chapter are stated in the following. In the beginning of this chapter, criteria concerning similarities and differences between characters according to same, but also different genres were stated. In addition, it was asked for motifs or images, which influence and guide the presentation of the devil characters. Another question was which kinds of variations concerning the devil characters can be found.

As mentioned, a huge development from the Mephistophiles of the Historia until Lenau’s Faust can be shown. Devil characters become main and modern characters, which means that they can also vary and can be contradictory in their features and motivations. This development takes place independently from the genre. The choice of the genre depends on the single author, but it seems that they each adopted conceptions from different genres. Furthermore, that observed similarities support the assumption of a traditional core of a devil’s conception. Initially, the individual ideas of the authors add their special quality to these conceptions. Although the conceptions vary, it seems that variations are restricted to a specific frame and on what might be acceptable for a literary devil. Therefore, variations, which include possible, maybe positive changes in the conception of a devil, are excluded. This might explain why the devil characters remain fragmented or partial. It means that because of these restrictions, the characters do not present the large scale of features and actions of for example human characters. Nevertheless, the analysed characters can be seen as ancestors of later conceptions like Heinrich Heine’s ballet or in Thomas Mann’s novel that start playing with the
devil’s conception in many ways. A rather positive conception of the devil is given by Mikhail Bulgakov’s “The Master and Margarita”. The influence of the conceptions of devil characters in the Faust literature might go beyond the borders of this special literature and be adopted by later evil conceptions, which today appear in printed books, paintings, and films.

Because of these special characters, it is not efficient to draw conclusions about the more general developments of characters and genres. But one can assume that the writing style and ideas included in genres like prose and drama are steadily expanding until the 19th century. In novels, for example in Klinger’s work, one can discover a lot of elaborated descriptions of characters and situations. In earlier works, like the Historia, characters appear rather schematic. In addition, especially in later Faust works, philosophical ideas are often included in the works. In dramas, e.g. Goethe’s Faust dramas, speech parts might be more important and rule the scenes on stage. But it is not clear if these observations can also be stated for literature of the 20th century.

The analysis and comparisons above are guided by diagrams performed on the ontology and the mental representations of the characters included in the client-server system. By considering the diagrams, it is possible to get visualised and structured overviews of characters. In this way, it is possible to show what might be the main aspects of characters or the distribution of information in the mental representations. Furthermore, visual comparisons of two or more characters can be done. Thus, providing useful analytical tools, assumptions for characters can be verified in a better way and emphasised aspects can be expressed by numbers. Even though the numbers are taken from single descriptions so that they are not completely objective, the figures used can give a clear picture of a mental representation. More detailed observations about features and actions of characters can be supported by taking single entries of instances. A very practical, but useful advantage is that these entries also hold information about text parts on it, it is easy to retrieve them. The additional information included in instances can also support the analysis. In general, the mental representations (of the client-server system) and the diagrams developed from the classes and instances of the ontology offer a clearer and structured view of characters, thus provide extra support for comparative analysis. In addition, by using the suggested class hierarchy for different representations, it is certain that mostly objective comparisons may be performed.
Chapter 8
Comparison of Mental Representations of Different Readers

In the last chapter, literary characters and their developments were analysed and compared by using mental representations of characters included in the ontology. However, these representations or descriptions are not directly included in the text, but in the mind of a reader. Therefore, it might be interesting to analyse the nature of mental representations. In this chapter, the focus lies more on the structure of mental representation of readers. Although mostly single representations of literary characters are included in the ontology so that a comparison in this way is not possible, two different representations of the same character – called the usurer, appearing in a short novel of Nikolai Gogol – are available in the ontology. These formal descriptions are exemplarily analysed here to develop assumptions of general behaviour of readers and to outline the advantageous of the ontology for this purposes.

For analysing the nature of the mental representations, the approach of Schneider is used (see section 2.5). Schneider’s approach especially his categorisations are useful to interpret similarities and differences in the formal descriptions/ mental representations of characters focusing on readers and their mental representations. Schneider’s approach is used to interpret observations of the representations. In addition, own assumptions are also outlined. But it might be difficult to state conclusions about the progress of reception by using the ontology, because direct observations concerning the reading process are not included. In the ontology, only results of this reception of a character can be recorded. Nevertheless, on this basis, knowledge about the progress of reception might be evolved as different behaviours of readers might be reflected in the formal descriptions.

8.1 A Comparison of Different Descriptions of Gogol’s Usurer

For the comparison, as mentioned, a character of a short story is used. So, the analysis can be restricted on a limited number of instances. Apart from the author of this approach, a second person was asked for describing a character. For this task, the application of the client-server system presented in section 6.1 was used. Both “describers” have an academic background in literature studies so that their abilities are nearly equal. In addition, a detailed introduction about the nature of ontologies and the client-server system was given to the second person.

The author thanks her colleague Sarah Messina for her work.
The second person was asked to prepare the text in order to give a description of the character. Both persons read independently the text and marked sections where pieces of information of the character are given. Differences might appear, because a German and an English text edition were used and due to translations, choices of words might be different. After the preparation, both persons separately included their formal descriptions in the ontology using the client-server system.

At first, similarities are stated and analysed. Afterwards, differences and larger variations are given. In the end of this chapter, it is tried to generalise the results and to outline some conclusions about the reception and description of characters. To differentiate between the two persons, in the following, the person not being the author of the thesis is named with the first one and the author with the second one.

Figure 8.1 shows the results of both mental representations. One can observe that one person has included more instances than the other one. But this does not mean that more information about the character is given in the larger description.

One can regard that both persons added rather similar instances concerning the outward features of the character. For example, both related an instance to the information about the exceptional Asian clothes of the usurer. In addition, they included instances concerning the lineaments of his face as well as his bushy eyebrows. It seems that both persons noticed these
features and interpreted it in the same way, because according to Schneider, this information might be explicit. Strong signals referring to the appearance of the character are given in the text: “Of tall, almost colossal stature, with dark, thin, ardent face, heavy overhanging brows, and an indescribably strange colour in his large eyes of unwonted fire, he differed sharply and strongly from all the ash-coloured denizens of the capital.” (Gogol 2003) Here, many adjectives are used which seem to create a persistent impression on the reader. One can assume that the mental representations of the two persons were guided by the text-specific categorisation outlined by Schneider. There is only a small difference of the description concerning the face of the usurer, because the second person included it in the category “total_face” of the ontology and the first person included it in the category “face”. These choices might depend on individual decisions if the statement comprehends the complete appearance of the face or not.

The description of the second person contains more instances in the category “eye” than the other one. One can observe that two characteristics of the eyes of the usurer are combined together in an instance of the description by the first person, whereas in the second description, they are separated into two instances. This cannot be regarded as a real difference. Furthermore, the second person added an instance concerning the nearly human eyes of the usurer’s portrait. It is a speciality of Gogol’s story that at first, the usurer appears as a portrait and in the second part of the story as a real living character. For this reason, it is difficult to state if the portrait and the usurer can be treated as one object or two separate ones. The second person decided to add this information to the character of the usurer. The first person seems to treat the portrait and the usurer as two objects. One can regard that this “confusion” leads to different interpretations. Nevertheless, it seems that readers mostly notice manifest features of characters stated in a story.

Comparing the instances included in the categories that describe activities of characters, one can observe that the first person included fewer instances than the second person. Some activities are discovered and described by both persons. For example, both added an instance describing the action: “He lent money willingly, and on very favourable terms of payment apparently, but, by some curious method of reckoning, made them mount to an incredible percentage.” (Gogol 2003) One can assume that this sentence gives information about general activities of the character. Therefore, both persons might identify it as important information, which is essential for the character. In addition, this activity is described in detail so that it is easy to extract information. Other actions done by the usurer are also described. But similar to the features of the character, the first person summarises these actions, whereas the second person split them into two instances. Both persons also described actions that cannot be find respectively in the other description. Concerning the different treatment of the portrait and the usurer, the second person included descriptions about activities of the usurer as a portrait, which are not described by the first person. It seems that the usurer, especially his eyes, are alive in his portrait: “A convulsively distorted face gazed at him, peeping forth from the surrounding canvas; two terrible eyes were fixed straight upon him; on the mouth was written a menacing command of silence.” (Gogol 2003) It is not clear if it is an illusion by the observer of the portrait or if it is real. Here, the interpretations of the story by the two persons are different.
An interesting observation is that both persons refer to the same information, but added it to different categories of the ontology: “... and that a portion of the usurers vitality had actually passed into the portrait, and was now troubling people, inspiring diabolical excitement, beguiling painters from the true path, producing the fearful torments of envy, and so forth.” (Gogol 2003) This information is attached to “act on oneself” by the first person and to “act on object” by the second person. One can assume that this action can be added to both categories. The first person concentrated on the usurer and his development. This means that it seems to be important to describe that something happened with the usurer whereas the second person focused on the activity of the usurer on an object, his movement into the portrait. The information itself can be seen as explicit, but it can be interpreted in different ways. Such differences can also be stated in the categories for speech. For example, the statement of the usurer is differently categorised:

“He threw himself at his feet, and besought him to finish the portrait, saying that his fate and his existence depended on it; that he had already caught his prominent features; that if he could reproduce them accurately, his life would be preserved in his portrait in a supernatural manner; that by that means he would not die completely; that it was necessary for him to continue to exist in the world.” (Gogol 2003)

The first person added it to the category “explanation”, the second person included it into the category of statements about oneself. This statement by the usurer can be explanatory, but it also has commentaries about the usurer himself included. One can detect that the client-server system does not regulate individual decision processes, but this is not intended. Thereby, individual processes can be observed.

Larger differences can be detected by regarding the category “statement about the analysed character”. The second person included several statements about the usurer, but the first person did not add any description to this category. One can assume that these kinds of information, statements about a character given by other characters, are difficult to grasp. If a reader focuses on a character, (s)he might not always note statements of other characters. Maybe, the second person as the creator of this system was better trained in observing information.

But one can also see that the second one did not always include a description where the first person included a description. For example, the first person describes an emotion of the usurer that he is afraid to die completely. This information is expressed by his statement, when he wishes to be portrayed by a painter. This is clearly implicit information, which might not easy to be extracted. It also shows that different readers assume aspects like emotions by interpreting statements of characters. The first person might have used parts of Schneider’s social categorisation to interpret the statement of the usurer.

In summary, one can state that a lot of similarities of the mental representations can be observed. It seems that explicit information is noticed by both readers. Aspects that are stressed in a story, e.g. by repetitions, are often included in both mental representations of the usurer. An example for this is the repeated statements concerning the remarkable eyes of
the usurer. By giving a most detailed description about a feature, a similar effect – to show the importance – is reached.

Another important aspect that should be kept in mind when analysing histograms derived from the mental representations as depicted in figure 8.1 is that several pieces of information can be summarised in one instance instead of separating them by different instances. Even though the second person included more instances, she mostly referred to the same information also mentioned by the first person. But actually not more information has been extracted. Therefore, it is important to examine single instances of the ontology when comparing the mental representations.

Furthermore, differences can occur because of individual choices concerning the categorisation of information about a character. One can observe that it is easy to identify and separate features, non-verbal and verbal actions, but in the sub categorisation, readers might not always agree on that (cf. classes “total_face” and “face” mentioned above).

Information that is more implicit and has to be interpreted, like the emotions of the usurer, applying the categorisations of Schneider, does not always lead to the same conclusions. It depends on experiences of categorisations of human beings as well as specific interests in literature (cf. section 2.5).

For stating more assumptions about the character of the usurer, it would be necessary to compare further descriptions/ representations of other readers. Nevertheless, by this small example, it seems that the ontology and its comparison possibilities are useful in such studies. Although this small study can only present assumptions, several advantages can already be observed. In general, it would also be interesting to compare descriptions of characters, which have a more complex structure and appear in longer stories. In addition, it might be interesting to analyse influences on the mental representation of characters by different literary genres. For analysing different mental representations, it is advantageous that the descriptions of characters are preserved in the ontology. The categorisation and structure of the ontology provide good possibilities for comparisons. It is also possible to generate statistics by using the numbers and distributions of instances in the ontology. A major aspect in such studies is the observation of the reading process. The ontology allows drawing conclusions about the reading processes in a retrospective, i.e. the results. But one can imagine combining the ontology with other methods to gain more information during reading processes concerning literary characters.
Part III

Final Conclusions
As outlined, the interdisciplinary field of computer philology is rather challenging and working in this field often meets several problems, e.g. modelling of semantics. Nevertheless, by using computational or computer-aided methods, research can be driven further. Computer-aided approaches may also become more enhanced. In this thesis, an ontology was introduced to model theories for the description and representation of literary characters. Here, the idea of a mental representation of characters by Jannidis was combined with further theories like Nieragden’s general categorisations of characters. Thereby, individual comprehensions of characters by readers are put in focus. To give examples, mostly devil characters derived from different Faust works are described in the ontology. With the support of the ontology and its applications, analyses and comparisons were performed to gain knowledge about differences and similarities of these characters and their mental representations. Here, it was concentrated more on the analysis of the development of characters than reception processes. By adding opinions by other researchers, the results of the representations could be generalised and developments and variations in this special kind of literature could be observed.

Different applications have been developed and used to explore possibilities of the ontology. In chapter 5, it was shown that even on such a specific ontology, it is possible to apply logic reasoning using Racer and Prolog. Most queries developed for the ontology could infer information: It was searched for combinations of classes and instances to gain information about the relations of categories and specific information about characters. Furthermore, queries concerning instances and properties were performed to achieve additional information attached to specific aspects of characters. Information about the hierarchy of the ontology was also retrieved. These queries could be performed by using the inference machine Racer as well as the logic-based language Prolog and the parser SWI-Prolog. But by using these applications, one was faced with a few problems: queries of logic reasoning can only make implicit information explicit. Furthermore, more individual queries, which cannot be expressed by logic constructs, cannot be retrieved. Nevertheless, one can imagine that logic reasoning is useful for approaches, which intend a usage and retrieval more by machines than by human beings. For solving tasks in a special and restricted scenario, logic reasoning might be interesting, but in this approach, the usage and results present only a single part of applications. Here, it is concentrated on human users and their interests, especially literature studies. This means on the one hand that technical knowledge cannot always be required. The queries have to be given in the specific formulations of Racer and Prolog, which might exclude human users, who are not familiar with logic reasoning. On the other hand, users should achieve information
that might be usable for them. It should be focused on what human users might aim at when using the ontology for literary characters. The applications of logic reasoning alone might have only a limited scope.

One should also note that in this thesis, a single domain ontology is developed. Furthermore, there are rather no other ontologies in literature studies. It was not possible to test merging or mapping processes, which might result in an extension and/or unification of possible literary character representations.

Apart from logic reasoning, two own developed applications are presented which give access to the ontology. At first, in section 6.1, a client-server system was introduced to manipulate the ontology and to search as well as to compare mental representations of literary characters. As outlined, the system presents a platform for the discussion and access of representations of characters. Even though the system requires knowledge in ontologies and the usage of web interfaces, it is tried to provide an easy access so that instead of focusing on a complex manipulation of the system, users can concentrate on the material itself, literary characters. The inclusion of new subcategories and information about characters as instances as well as different retrievals and comparisons are the core of this system. Complete representations of characters and specific parts of them can be retrieved by using search options of the system. Results are mostly presented by different visualisations of character representations. In contrast to the logic-based applications, this system seems to be more intuitive for a usage by a probable user, i.e. researchers in the humanities. As outlined in chapter 7, this system could support comparisons of literary characters in an essential way.

A second application developed in this thesis is a method to add semi-automatically instances to the ontology (cf. chapter 6.2). This approach aims at users well trained in text encoding but who do not have insides into ontologies. In addition, it is worked on reducing the sometimes labour-intensive work of manual insertion of a representation of a character. A TEI encoding scheme was adapted to enable automated parsing of the text and to produce assignments where the different instances might be included into the class hierarchy of the ontology. The user has just to confirm or select a different class.

Both presented applications allow for the same results but by means of different approaches. But the semi-automatic assignments put texts and their encoding in focus. One can imagine combining this application with other encoding works. It might be possible to add the annotations necessary for the assignments to already existing annotations.

Furthermore, on the basis of results derived from the character representations included in the ontology, the devil characters of the example corpus were analysed and compared to each other (see section 7.3 for conclusion of this analysis). By using histograms of the distribution of instances for certain classes and visualised representations of the characters included in the client-server system, it was possible to examine them in detail and to detect similarities and differences, since the categories of the ontology ensured a common base for comparisons. The system allows direct and visualised comparisons of the (complete) representations of characters on the one hand. On the other hand, it is possible to examine the distribution of instances of characters in selected classes to reveal probable specialities of characters. In combination, these possibilities allow an analysis, which is impossible when performing a classical analysis
on paper. In particular, a classical analysis will become tedious when dealing with a large collection of characters to be compared.

One should note that ideas and motifs, which are not guided by characters, cannot completely be supported by the ontology since here it is intended to model the description of literary characters, not motifs. Nevertheless, if information about characters and these motifs overlap, they can be captured by the formal description of the ontology.

Concerning the comparison of different mental representations of the same character by different readers, the developed ontology and its applications can be used to reveal information about readers, their opinions and comprehensions about characters, since the content of the ontology represents results of the reading processes. Regarding the results of the comparisons, one can state that the ontology is a good method to provide such examinations. The ontology and its applications enable users to receive advantages like structured overviews of characters, observe different representations, and an easy finding of information about characters, also in the texts, if references are included. By using the mental representations of the ontology, it is possible to clarify aspects and to preserve opinions about characters. Although the ontology is restricted in flexible handling of information and can only present things, which are included at a particular date, here, it can illustrate and store mental representations of characters. By using this ontology, the result of a reading process can be shown, but not directly the action of reading and its different states. For example, changes of characters and their features can be marked in the ontology, but not the process of changes itself.

Apart from these restrictions, nevertheless, it is rather advantageous to model theories of literary characters by using an ontology. Thereby, a more productive and creative access to literature and characters is given. In addition, discussions about characters and their mental representations can be activated and supported by using the client-server system developed for the ontology.

The method of an ontology might not always be used strictly in the way intended in AI. It also differs from ontologies used in approaches in linguistics and natural science. But by introducing computational approaches to humanities, here literature studies, methods and applications have to be arranged for the purposes of this field. Especially in this approach, it is not intended to generate automatically results like information for the machine itself, but to support the work of human beings in a more effective way.

The introduction of computational methods in the humanities seems to include a lot of tasks and problems and according to other research fields, these methods hesitatingly enter this field. But by developing and presenting new computer-aided applications, approaches in the humanities can use the advantages of computational methods, like ontologies, and they can be driven further. In the humanities, research should come over a dislike of computers to be able to explore new possibilities.

In this approach, applications prototypes were developed. It is planned to elaborate options, enlarge the systems, and optimise the usage. Especially the application for semi-automatic assignments for instances should be developed further. In addition, it will be tried to make the developed applications more known so that more researchers can describe literary characters by using the ontology and its applications. One can imagine that by enriching the ontology
with more descriptions, more conclusions about characters and their mental representations by
different readers can be drawn. This can be elaborated by attaching more specific information
about readers to the ontology. One can also imagine that empirical studies, which take e.g. the
background of the readers into account, can gain more knowledge about reading processes. It
would be interesting to enlarge the observations about the devil characters and to examine more
general developments of literary characters. By adding extreme examples, which go beyond a
normal character conception, to the ontology, one can test its flexibility and limitations. One
should also regard non-hierarchical approaches of literary characters and compare them to the
approach of this thesis.

But it might also be possible to relate the ontology with other computational applications in
literature studies or to adapt the conception and design for projects in other fields of the hu-
manities. It was already tested to adopt the design and parts of the approach in a philosophical
context.\textsuperscript{356} One can try to map or merge ontologies, which might have aspects in common
with the ontology for the mental representation of literary characters.

Finally, this work might give an impression of that the combination of a computer-aided
approach and literary analysis can be fruitful. In this interdisciplinary approach, all parts of
the disciplines could be stimulated by each other: the method of an ontology and its possibilities
could be explored in a wide range. The literary analysis could be essentially supported by the
ontology and the own developed applications. The presented approach is a starting point of
the usage of ontologies and the results of this method seem to persuade of new perspectives.

\textsuperscript{356}see Zöllner-Weber and Pichler 2007
Primary literature


Secondary literature


Naber, Daniel: OpenThesaurus: Building a Thesaurus with a Web Community. 2004 (last accessed August 21, 2007).


Appendix A
Glossary of Terms of Information Modelling

**Annotation/ Encoding**  The process of annotation means adding extra information, also meta-information, to data. Thereby, documents can be enriched with information. Annotation/ encoding is not limited to digital media, but nowadays, when dealing with text, the annotation process is supported by computers. There, markup languages (see also Markup) are used to mark text sections or parts of the data.

**Artificial Intelligence**  Artificial intelligence (AI) is an interdisciplinary field, which subsumes a lot of research activities dealing with computers and intelligence. The most important idea is to model or simulate human intelligence in computer systems or to provide human activities. In the 1950s, methods, like expert systems or knowledge bases (see also Ontology), later robotics and learning systems were investigated (see also section 3.1).

**Information**  Information is an essential part of human activities like gaining knowledge or communication. The definition of information depends on what is stressed in these activities or processes. In computer science, it is often mentioned together with data whose both representation and further processing are tried to perform in computer systems (see also Information Representation). In other disciplines, information is mingled with semantics and meaning (see also section 3.2.1).

**Information Representation**  The term information representation mostly refers to a modelling of information in computer systems. There are several methods to represent information in computers.

**Knowledge Management**  In Knowledge Management, it is tried to represent, store and process semantically enriched information, which is treated as knowledge. Thereto, methods often derived from artificial intelligence are applied, which result for example in knowledge bases (see also Ontology or expert systems. These methods are used to enhance working processes in research and industrial companies.

**Markup (Language)**  By adding additional information, data/ documents in computers can be enriched. This kind of extra information can give hints about the structure or layout of documents as well as further information about the content. Thereby, markup languages are used. The most popular markup languages are HTML (HyperText Markup Language), which is often used for WWW pages, and XML (Extensible Markup Language) developed for electronic publishing (for further information see http://www.w3.org/MarkUp/ and http://www.w3.org/XML/).
**Ontology** The term ontology is used in different contexts so that also the meaning and definition differ. In philosophy, where it originates from, it refers to the study of being and existence (see also Philosophie-Lexikon 1991). The idea has been introduced in computer science, especially artificial intelligence (see also Artificial Intelligence). There, conceptualisations of things in the world are modelled in computer systems by using an ontology. An ontology normally contains classes (concepts), individuals (instances), properties, and relationships between these objects. Thereby, a topic (domain) can be structured. Often, the objects are ordered in a hierarchy like a taxonomy. But it depends on the definition of an ontology, if only a hierarchical system or systems which do not always have a hierarchy, but classes are defined as an ontology. There are a lot of formats for building an ontology. One of the newest languages is OWL (see also OWL). By using ontologies, often applications in logics like logic reasoning are performed to query information. Ontologies are often used in the context of knowledge management (see also Knowledge Management).

**OWL** OWL (Web Ontology Language) is a language for representing ontologies (see also Ontology), especially ontologies in the World Wide Web. It builds on other description languages, like RDF and RDF(S) (see also RDF(S)), but contains also of own vocabulary. OWL consists of three versions: OWL Full, OWL DL, and OWL Lite. (For further information: http://www.w3.org/2004/OWL/).

**RDF(S)** RDF (Resource Description Framework) released by W3C is a format to add further information to documents, especially in the Internet (see also http://www.w3.org/RDF/). It uses XML syntax (see XML) and expresses information in form of triples denoted as a subject, predicate, and object. Subject and object can be seen as resources, whereas the relationship between these two objects is expressed by using the predicate. Resources have to be identified by URIs (Uniform Resource Identifiers). Build on RDF, RDFS (RDF Schema) has been developed to structure RDF and the content of documents in a more elaborated way. Therefore, elements for classification and structuring are introduced. For further information see: http://www.w3.org/TR/rdf-schema/.

**Semantic Web** The idea of the Semantic Web is to enlarge the general World Wide Web by providing especially (semantic) meta-information. Thereby, information in the Web should be retrieved and shared in an easier and better way. The W3C founded an own group, which tries to support this idea (see http://www.w3.org/2001/sw/) and already released standards like RDF(S) and OWL (see also RDF(S), OWL).

**TEI** The Text Encoding Initiative is an organisation of researchers and institutions. Its main interests lie on the production of guidelines providing text encoding in linguistic and humanistic projects. Therefore, guidelines providing an encoding in SGML/ XML (see also XML) are developed (for further information see: http://www.tei-c.org/).

**XML** XML (Extensible Markup Language) is a markup language released in 1998 by the W3C Working Groups. It provides electronic publishing by adding extra information to (text) documents (see also http://www.w3.org/TR/2006/REC-xml-20060816/). It is a further development of a markup language called SGML (Standard Generalized Markup Language).
**XSL**  
XSL (Extensible Stylesheet Language) is a language family, which can handle transformation and presentation of XML documents. It contains three parts: XSL Transformations (XSLT), XSL Formatting Objects (XSL-FO), and XML Path Language (XPath). By using XSLT, it is possible to transform XML documents into new formats like HTML documents. XSL-FO supports the transformation and presentation into printable documents. XPath provides the access and referring to parts of XML documents (for further information see: [http://www.w3.org/Style/XSL/](http://www.w3.org/Style/XSL/), Kay 2001).
Literary Character  By this term any acting existence in literature is meant. It can consist of a more or less complex structure depending on its importance for the story and the specialities of the genre (for further information see Prince 1987).

Mental Representation  By reading literature, human beings extract information about characters from the text and structure it in a specific and individual way. Thereby, a mental representation of a literary character is produced (for further information see Jannidis 2004 and Schneider 2000).

Narrator  A narrator is an entity of the text, which does the telling of the story (see Telling). Different types of narrators can be stated: a narrator with external viewpoint (an entity - mostly not belonging to the characters - which guides the reader and takes a position with external viewpoint), a first-person narrator (the narrator might have also a distance to what is told, but (s)he is/was often involved in events in the story), a third-person narrator (an narrative entity which tells in third person). There might be also several mixtures of these narrator types (for further information see Prince 1987).

Plot  The narrative outline of situations and events in a story (see Prince 1987).

Showing  A special kind of giving information in literature, apart from telling (see Telling). Thereby, detailed descriptions of situations and events are given.

Telling  Telling is an activity mostly performed by a narrator (see Narrator). Thereby in contrast to showing (see Showing), a stronger narrative guidance can be detected.
The following list contains the current status of classes included in the ontology. Classes marked with * form general classes, mostly taken from theories about literary characters (Jannidis, Nieragden) or they are essential for a description of characters. Classes marked with + are example classes, which sub classify the description to describe special characters like the devil characters.

<table>
<thead>
<tr>
<th>formal description*</th>
</tr>
</thead>
<tbody>
<tr>
<td>character*</td>
</tr>
<tr>
<td>statement about the analysed character*</td>
</tr>
<tr>
<td>features*</td>
</tr>
<tr>
<td>inside*</td>
</tr>
<tr>
<td>character feature*</td>
</tr>
<tr>
<td>humor+</td>
</tr>
<tr>
<td>intelligence+</td>
</tr>
<tr>
<td>sagacious+</td>
</tr>
<tr>
<td>cunning and cleverness+</td>
</tr>
<tr>
<td>experience of life and human being+</td>
</tr>
<tr>
<td>irony+</td>
</tr>
<tr>
<td>omniscience+</td>
</tr>
<tr>
<td>violence+</td>
</tr>
<tr>
<td>bold and self confident+</td>
</tr>
<tr>
<td>generous+</td>
</tr>
<tr>
<td>maliciousness+</td>
</tr>
<tr>
<td>emotion*</td>
</tr>
<tr>
<td>outward*</td>
</tr>
<tr>
<td>body feature*</td>
</tr>
<tr>
<td>face+</td>
</tr>
<tr>
<td>eye+</td>
</tr>
<tr>
<td>total face+</td>
</tr>
<tr>
<td>only body+</td>
</tr>
<tr>
<td>total body+</td>
</tr>
<tr>
<td>clothes*</td>
</tr>
<tr>
<td>individual clothes*</td>
</tr>
<tr>
<td>typical or professional clothes*</td>
</tr>
</tbody>
</table>
Appendix C Classes of the Ontology

act*
  action and behaviour*
    act on object*
      play music+
      create object+
      delete object+
    act on subject*
      annoying sb+
      betraying+
      ban+
    act on oneself*
      disguise+
      change form+
    movement+
    gesture*
  speech and thought*
    statement commentary*
      about object*
      about oneself*
      about subject*
      about abstract thing*
        about nature+
        about philosophical thing+
        about religion+
        about science+
        about politics+
    explanation*
    threatening+
    report*
    betrayal+
    offering+
    distraction+
    calling up on sb+
      destroy sth or sb+
      urge to seduce+
      advice+
    admonition remind+
      about seducing+
    question+
    general notes about the analysed character*
      age*
      name or title*
      place of home*
Appendix D
Queries for Logic Reasoning

D.1 List of Queries in Racer/ nRQL

Here, some additional queries for the inference machine Racer are presented (cf. Fig. D.1-D.6). Most of them are tested on the ontology of literary characters (see also section 5.2.2).

Figure D.1: Here, the programme returns the name of the individual Lenau_Nikolaus. The queries can be single-digit or double-digit. The example above is single-digit.

(retrieve (?x ?y) (?x ?y |hasChild|))

Figure D.2: Here, a double-digit query that should return couples of individuals related to each other by hasChild is given.

(TBOX-RETRIEVE
 (?X) (NEG (?X |http://www.figurenontologie.de/unnamed.owl#on43_statement_about_the_analised_character|)))

Figure D.3: In an ABox or TBox, objects can be excluded by using NEG. Here, it is queried for classes that do not have the name on43_statement_about_the_analised_character.

(RETRIEVE
 (?X)
 (OR (?X |http://www.figurenontologie.de/unnamed.owl#on13_play_music|)
  (?X |http://www.figurenontologie.de/unnamed.owl#on35_about_seducing|)))

Figure D.4: Classes can be also related to each other in different ways by using the operators AND and OR. Here, the OR operator is used. In this query, individuals are searched that belong to one of these classes. But if the query is combined with the operator AND, it would return NIL, because the two classes do not share same individuals in the used ontology.
It can be also important to query for individuals that belong to a special class and that contain a special property. Object properties can be inferred easily, but the query for datatype properties are more complex. Therefore, so called *head projection operators* have to be used in the query.

```
(RETRIEVE
 (?X (TOLD-VALUE
 ((http://www.figurenontologie.de/unnamed.owl#storytitle)
 ?X)))
 (?X (http://www.figurenontologie.de/unnamed.owl
 #on43_statement_about_the_analised_character)))
```

Figure D.5: By declaring a variable for the query, told values are bound to the objects. In this query, the told value is the datatype property “storytitle”. Afterwards, the class is given which should contain individuals that have the datatype property.

```
(RETRIEVE((?X
  (http://www.figurenontologie.de/unnamed.owl#about_the_black_poodle))
 (:TOLD-VALUE
  (http://www.figurenontologie.de/unnamed.owl#storytitle) ?X))
 (“Faust Der Tragoedie Erster Teil”))
```

Figure D.6: Here, the result of the query above is given. The first part contains the name of an individual, the second one consists of the content of a datatype property.

### D.2 List of Queries in Prolog

In the following, a list of queries in Prolog, which are produced for the ontology of literary characters, is listed (cf. Fig. D.7 - D.11, see also section 5.2.4).

```
rdf_has(X,'http://www.figurenontologie.de/#ref_to_author',Z).
```

Figure D.7: Here, the query for instances is limited so that only instances with a special property are displayed.

```
rdf_has(X,Y,literal(type('http://www.w3.org/2001/XMLSchema#string',
 'Leviathan'))) .
```

Figure D.8: Here, instances with a given literal can be queried. By asking this in SWI-Prolog, only the instances, which have a property with the value “Leviathan”, are found.
D.2 List of Queries in Prolog

```prolog
rdf_has(X,Y,literal(type('http://www.w3.org/2001/XMLSchema#string',Leviathan'))),
rdf_has(Z,A,literal(type('http://www.w3.org/2001/XMLSchema#string', 'Mephistophiles'))).
```

Figure D.9: For comparison reasons, the usage of literals might be very useful. For example, all the instances of two literary characters can be retrieved with this query.

```prolog
rdf_has(Y,Z,X),rdf_has(A,B,Y).
```

Figure D.10: Query for top-down relation. Here, it is queried for the top-down relation of classes of the ontology. The variables represent the classes (Y, X, A) and their relations (Z, B).

```prolog
rdf_has(SUBCLASS1,'http://www.w3.org/2000/01/rdf-schema#subClassOf',SUPERCLASS),
rdf_has(SUBCLASS2,'http://www.w3.org/2000/01/rdf-schema#subClassOf',SUPERCLASS),SUBCLASS1\=SUBCLASS2.
```

Figure D.11: Query for sibling classes. Here, it is queried for sibling classes, which have the same super class.

To receive the triples of instances and their classes “rdfs_individual_of” can be used. It is even possible to search for subproperties (“rdfs_subproperty_of”).
Appendix E
Guidelines for Semi-Automatic Assignment for Instances of the Ontology

The manual editing of the ontology might be a precise option, but it is time-consuming and labour-intensive. The process from reading and understanding a character in a text to describing it by an ontology might take some time. Also, a user, who wants to include information of a character in the ontology, might search in the categories of the ontology to insert the information at the right place. By using the already mentioned algorithm (cf. 6.2.3), assignments of instances derived from the tags of an annotated literary text should support a user when inserting such instances. By generating automatically assignments, it is intended to support interested users who are not familiar with ontologies and its special technologies. Only the knowledge of describing and analysing literary characters and basic skills in text encoding are required. In the following, instructions how to encode texts properly for being processed by this approach, are given. Here, the used scheme for text encoding is the TEI (http://www.tei-c.org).

TEI DTD

The annotation scheme is taken from the Roma engine (http://tei.oucs.ox.ac.uk/Roma/). There, it is possible to assemble an individual TEI DTD. The idea is to include aspects of literary analysis in literary texts by encoding them. To encode literary texts as well as their analysis in one file, tags derived from the TEI part for prose, lyrics, drama and linguistic analysis are used. So, a user is able to encode paragraphs, titles, and speech parts in the text to include general information on the meta level. But it is also intended to encode descriptions of actions and features of a literary character. Therefore, the TEI tag “interp” is used in combination with tags for linguistic analysis. For all used elements derived from the TEI, only small changes of their usage are undertaken. But it is regarded not to misuse the tags. The TEI scheme was not developed regarding literary analysis so that only a few tags are available. So, the description for literary characters explained in the next section might not always be general, but it is the only way to support this kind of application. The code below presents the beginning of the body part of an XML document encoded by using the proposed scheme. The head, which has to be included, consists of a collection of interpretation categories for the analysis of literary characters.
The used categories are nested in the attribute xml:id. The linking between the IDs and the anchors occurs by encoding parts of texts, which hold information about actions or features of the characters. The four main categories to encode descriptions are given in the following sections.

**Categories: action, description, speech and thought, statement**

The category “action” should contain all non-verbal actions of characters, for example movements, interactions with other characters or objects in a story. The category “description” means information stated by a narrator or another character, e.g. description about the outward or characteristic features. All “speech and thought” actions should be included in the third category. The last category has been created for statements, which are not performed in a speech situation, e.g. statements about a character by a narrator. The difference between a description and a statement is that a description should be more objective and not assessed. In contrast to a description, a statement is defined as a rather subjective declaration.

**action**

If a user wants to encode an action of a character, you should use the tag s in combination with the attribute ana to annotate a sentence or a part of the sentence where the action appears. There, (s)he includes the value “#action”. To enlarge this information, (s)he should annotate the entity, which gives the information with the attribute “who”. The allowed values are “third-person narrator”, “first-person narrator”, “narrator with external view”, or “by character or type”. For example:

```
<s who="third-person narrator" ana="#action">Before he quitted it, he held up the dim light, and looked around him with a mixture of terror and curiosity.</s>
```

Afterwards, (s)he encodes the acting subject by using the tag “name” and include the two attributes “type” with the value “subject” and “key” with the real name of the character to specify the subject. Then the action itself should be annotated by using the tag “phr”. It is maybe similar to a verb phrase. In the next step, two options are possible.

```
<s who="third-person narrator" ana="#action">Before <name type="subject" key="John">he</name> quitted it, he 
<phr>held up <name type="thing">the dim light</name>, and looked around him with a mixture of terror and 
curiosity</phr>.</s>
```
If there is an object involved in the action process, then the tag “name” and the attributes “type” and “key” can be used again. For the attribute “type”, two values are allowed: “object” for human beings and “thing” for inanimate things. (Note: If the action is directed on the character itself the attributes should also be used.)

<s who="writer of manuscript" ana="#action">The writer, it appeared, was <name type="subject" key="Stanton">an Englishman of the name of Stanton, who <phr ana="move">had traveled abroad shortly after the Restoration</phr>.</s>

If no object is present then the action part should be specified with the attribute “ana”.

description

If a user wants to encode a description of a character, (s)he can also use the tag “s” in combination with the attribute “ana” to annotate a sentence or a part of the sentence, where the description is stated. There, (s)he adds the value “#description”. To enlarge this information, (s)he can also use the attribute “who” for the entity which gives the information. The allowed values are “third-person narrator”, “first-person narrator”, “narrator with external view”, or “by character or type”.

Furthermore, (s)he should annotate the described subject by using the tag “name” and attach the two attributes “type” with the value “object” and “key” with the real name of the character to specify the object. Then, the description itself should be annotated by using the tag “phr”. (S)he should use general topics, like “name”, “age”, or “character feature”, so that fitting classes can be suggested in an easy way. This can look like:

<s xml:id="ma22" who="third-person narrator" ana="#description"><phr ana="eye"><name type="object" key="Melmoth"></name>There was nothing remarkable in the costume, or in the countenance, but THE EYES</phr>, John felt, were such as one feels they wish they had never seen, and feels they can never forget.</s>

speech and thought

In the annotation scheme, speech is divided into two parts. The first part holds different parts of speech, e.g. questions, orders, etc. These speech parts should be nested again in the tag “s”. The “who” attribute should contain the speaker. An eventual addressee in the text should be included in the tag “name”. To retrieve this character later, the name of it should be added to the attribute “key”. Then, in the tag “phr”, the speech action itself should be nested in. This could look like:

<s xml:id="ma271" who="Melmoth" ana="#speech">"Have you anything to inquire of me"</s>

The second kind of speech is statements or commentaries that should be encoded by using the tag “u”. The speaking and addressed characters are marked in the same way as mentioned for the other speech actions. The actual statement should be encoded with “phr”. Then,
Appendix E Guidelines for Semi-Automatic Assignment for Instances of the Ontology

three categories of statements in reference to the object are available. If the object is another character, the encoding can look like:

```xml
<u xml:id="ma_10" ana="#speech" who="Uncle Melmoth"><name key="John">"At one time I said it was whisky, and then I fared worse than ever, for <phr><name type="object" key="the servants">they</name> drank twice as much of it</phr>."</u>
```

If the speaker reference to himself or herself, the encoding can look like:

```xml
<u xml:id="ma_283" who="Melmoth" ana="#speech">When they are plunged in the lowest abyss of human calamity, they are <phr>sure to be visited by <name type="object" key="Melmoth">me</name></phr>."</u>
```

If the object is inanimate thing, the keyword “thing” should be attached to the attribute “type”.

**statement**

All statements given by the narrator can be encoded by using the tag “s” and its attribute “ana”, which the value “statement” should be assigned. The name of the described character can be nested again in the tag “name” and the attribute “type” should be set on “object”. The attribute “key” consists of the name of the object. The actual statement should be encoded with “phr”. This can look like:

```xml
<s xml:id="ma_56a" who="third-person_narrator" ana="#statement">and died as <phr><name type="object" key="Uncle Melmoth">he</name> had lived, in a kind of avaricious delirium</phr>..</s>
```
List of Figures

1.1 Scheme of the approach and workflow. ........................................ 9
3.1 Scheme of (textual) data with XML mark-up. .............................. 30
3.2 Scheme of methods and formats. .............................................. 38
4.1 Scheme of the representation structure of a character in the ontology. 46
4.2 Main classes of the ontology. .................................................. 49
4.3 Sub classes of the class “features”. .......................................... 49
4.4 Sub classes of the class “action and behaviour”. ......................... 50
4.5 Sub classes of the class “speech_and_thought” ........................... 50
5.1 Extract of the Racer inference machine. ................................. 61
5.2 Example for the query of individuals of a specific class. .............. 61
5.3 Example of the query for instances that belong to a special class and contain a special property. ............................................. 62
5.4 Example of the query for a specific instance. ............................ 62
5.5 Example of a fact in Prolog. ................................................... 64
5.6 Query for instance-class relation. ............................................ 65
5.7 Query for instances that belong to one class. ............................. 65
5.8 Querying for super-sub class relations. .................................... 65
6.1 Scheme of interaction between the ontology, the client-sever system and the texts. .................................................... 70
6.2 The edit part of the client-server system. ................................. 71
6.3 Extract of the search area of the client-server system. .................. 72
6.4 Extract of the search result. .................................................... 73
6.5 Extract of the view of the complete ontology tree including all classes and instances. .................................................... 74
6.6 Extract of the information of the class “eye”. ............................. 75
6.7 Interpretative notes in the header of a XML document. ................. 77
6.8 Marking a sentence in a literary text. ....................................... 78
6.9 Marking speech in a literary text. ............................................ 78
6.10 Marking statements in a literary text. ...................................... 79
6.11 Page for uploading an encoded text. ....................................... 80
6.12 Extract of the result of the uploaded text Melmoth the Wanderer. .... 81
7.1 Diagram of the different genres and time line of the compared works. 87
<table>
<thead>
<tr>
<th>Figure</th>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>7.2</td>
<td>Diagram of instances of all devil characters of the example corpus.</td>
<td>88</td>
</tr>
<tr>
<td>7.3</td>
<td>Diagram of instances for the characters Mephistophiles of the Historia and Mephistopheles of Marlowe.</td>
<td>89</td>
</tr>
<tr>
<td>7.4</td>
<td>Diagram of feature instances for the characters Mephistophiles of the Historia and Mephistopheles of Marlowe.</td>
<td>91</td>
</tr>
<tr>
<td>7.5</td>
<td>Diagram of instances for actions of the characters Mephistophiles of the Historia and Mephistopheles of Marlowe.</td>
<td>94</td>
</tr>
<tr>
<td>7.6</td>
<td>Diagram of speech instances for the characters Mephistophiles of the Historia and Mephistopheles of Marlowe.</td>
<td>98</td>
</tr>
<tr>
<td>7.7</td>
<td>Diagram of instances of the characters Leviathan of Klinger and Mephistopheles of Goethe.</td>
<td>103</td>
</tr>
<tr>
<td>7.8</td>
<td>Diagram of feature instances of the characters Mephistopheles of Goethe and Leviathan of Klinger.</td>
<td>106</td>
</tr>
<tr>
<td>7.9</td>
<td>Diagram of instances of action categories for the characters Mephistopheles of Goethe and Leviathan of Klinger.</td>
<td>115</td>
</tr>
<tr>
<td>7.10</td>
<td>Diagram of instances of the characters Mephistophiles of Goethe and Leviathan of Klinger in the classes for speech.</td>
<td>117</td>
</tr>
<tr>
<td>7.11</td>
<td>Diagram of instances of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau.</td>
<td>135</td>
</tr>
<tr>
<td>7.12</td>
<td>Diagram of instances for features of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau.</td>
<td>137</td>
</tr>
<tr>
<td>7.13</td>
<td>Diagram of action instances for the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau.</td>
<td>144</td>
</tr>
<tr>
<td>7.14</td>
<td>(a) Diagram of instances for speech of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau.</td>
<td>147</td>
</tr>
<tr>
<td>7.15</td>
<td>(b) Diagram of instances for speech of the characters Leviathan of Klinger and Mephistopheles of Goethe and Lenau.</td>
<td>148</td>
</tr>
<tr>
<td>7.16</td>
<td>Diagram of instances for the characters Mephistopheles of Marlowe and Goethe.</td>
<td>162</td>
</tr>
<tr>
<td>7.17</td>
<td>Diagram of instances for features of the characters Mephistopheles of Marlowe and Goethe.</td>
<td>163</td>
</tr>
<tr>
<td>7.18</td>
<td>Diagram of instances for actions of the characters Mephistopheles of Marlowe and Goethe.</td>
<td>166</td>
</tr>
<tr>
<td>7.19</td>
<td>Diagram of instances for speech of the characters Mephistopheles of Marlowe and Goethe.</td>
<td>167</td>
</tr>
<tr>
<td>7.20</td>
<td>Diagram of instances for the characters Mephistophiles of the Historia and Leviathan of Klinger.</td>
<td>169</td>
</tr>
<tr>
<td>7.21</td>
<td>Diagram of instances representing features of the characters Mephistophiles of the Historia and Leviathan of Klinger.</td>
<td>170</td>
</tr>
<tr>
<td>7.22</td>
<td>Diagram of instances representing actions of the characters Mephistophiles of Historia and Leviathan of Klinger.</td>
<td>172</td>
</tr>
<tr>
<td>7.23</td>
<td>Diagram of instances representing speech of the characters Mephistophiles of the Historia and Leviathan of Klinger.</td>
<td>173</td>
</tr>
<tr>
<td>7.24</td>
<td>Diagram of the compared characters and transported motifs.</td>
<td>174</td>
</tr>
<tr>
<td>8.1</td>
<td>Diagram of instances for two mental representations of the usurer of Gogol.</td>
<td>178</td>
</tr>
</tbody>
</table>
D.1 Here, the programme returns the name of the individual *Lenau_Nikolaus*. The queries can be single-digit or double-digit. The example above is single-digit. 205
D.2 Example of the query for individuals. 205
D.3 Example of the exclusion of objects in a query. 205
D.4 Example of relating classes in a query. 205
D.5 Example of a query with told values. 206
D.6 Example of a result for a result of a query. 206
D.7 Example of a query for instances with a special property. 206
D.8 Example of a query for instances with a literal. 206
D.9 Example of a query for instances of two literary characters. 207
D.10 Query for top-down relation. 207
D.11 Query for sibling classes. 207