A CORPUS-BASED STUDY OF DEONTIC MODALITY IN LEGAL DISCOURSE

This article contributes to the study of English deontic modal means as a key linguistic phenomenon. It responds to the need of a systematic analysis of English deontic modal auxiliaries used in international legal documents of various genres. Deontic modality is studied as a conceptual category from the semantic perspective. Deontic modals that express permission, obligation and prohibition are treated with special attention to the applicability to Legal English. The corpus includes UN documents of five legal genres: the United Nations Charter, the Universal Declaration of Human Rights, the Statute of the International Court of Justice, the Treaty on the Prohibition of Nuclear Weapons, and the International Convention for the Suppression of the Financing of Terrorism. These texts were selected to identify frequency, distribution and semantic content of modal auxiliaries which express permission, obligation and prohibition in legal discourse. The aim to reveal similarities and differences in the use of deontic modal auxiliaries in General English and Legal English has been also set.

1. Introduction

The study of language use in professional discourses is considered as the study of lexical, semantic, grammatical, and pragmatic features of language employed in various institutional settings. Language as a means of communication is central to the law (Martin and Romero 2019) as the latter cannot exist without language. Legal language as one of the specialized languages is full of complex gram-
mational structures, specialized vocabulary and archaic expressions, which make it different from other varieties of language. The frequent use of modal verbs is the feature that distinguishes legal discourse from other types of specialized discursive practices. Modality as a linguistic feature of legal texts has long been discussed by scholars (Tiersma 1999; Bhatia and Bhatia 2011; Foley 2001; Garner 1998; Mellinkoff 1963; Mattila 2013). However, due to the heterogeneity of the legal area the language serves, legal discourse is characterized by a remarkable genre variety. This paper will focus on how deontic modality is expressed in UN documents of five legal genres: the United Nations Charter, the Universal Declaration of Human Rights, the Statute of the International Court of Justice, the Treaty on the Prohibition of Nuclear Weapons and the International Convention for the Suppression of the Financing of Terrorism. The usage of modal forms that express permission, deontic obligation and deontic prohibition will be studied. By identifying the modal verbs, it will be possible to identify similarities and differences between their semantic functions in General English and in Legal English used in international documents.

The ambiguity of shall in contrast to may and must and its excessive use in legal texts have attracted the attention of a large number of linguists and lawyers. The current study expands the discussion on shall and its possible replacement with may and must to a new context – the international legal documents. I assumed the English modal shall will show the highest frequency of occurrence in the international legal texts as it does in the US and British legal discourse.

The main objective of the study is to carry out an analysis of modal auxiliaries shall, should, must and may as key means of deontic modality in international legal documents. To achieve this objective, the research seeks answers to the following questions:

1) What are similarities and differences between General English and Legal English with regard to the category of deontic modality?

2) What is the semantic content of central deontic modal auxiliaries in the UN documents?

3) What is the problem of the use of shall in legal texts and what is a solution to this problem?
4) Are there any differences between the legal genres under examination with regard to the category of deontic modality?

5) What are the contexts of usage of shall, should, must and may in the corpus?

The results of the study on the frequency and semantic content of deontic modals in international legal documents are consistent with the results obtained by other researchers who deal with other legal genres (Tiersma 1999; Foley 2001; Garner 1998; Krapivkina 2017b; Mattila 2013). It has been found that the international legal texts have much in common with the legal genres in US and British jurisdictions.

The next two parts set the theoretical framework for the study. Part 4 is devoted to the methods and the data used in the analysis. Key findings are presented and discussed in Part 5. The final part provides a brief overview of the conclusions of the study.

2. Deontic modality

Most authors (see e.g. Bybee et al. 1994; Halliday 1978; Lyons 1977; Matthiessen 2008; Palmer 2001; Quirk et al. 1989) agree that modality belongs to the main categories of natural language; it expresses different types of relations between the utterance and reality, as well as different types of subjective qualifications of what is communicated. Modality expresses the attitude of the utterance to reality established by the speaker. Quirk et al. (1989: 219) define it “as the manner in which the meaning of a clause is qualified so as to reflect the speaker’s judgment of the likelihood of the proposition it expresses being true”. This category does not have a clear structure and unites diverse linguistic phenomena.

The conceptual nature of the linguistic category of modality can be described as reflection and expression of the relationship of objects, phenomena and events of reality and perception of these relationships by individuals. The relation of modality as a linguistic phenomenon with the logical structure of thinking explains the need to address to logical-linguistic parallels in the study of linguistic means of modality.
In the linguistics literature (see e.g. Bybee et al. 1994; Halliday 1978; Lyons 1977), researchers use different terminology for the types of modality which is a heterogeneous linguistic category. According to Lyons (1977), modality can be divided into epistemic (modes of knowing), deontic (modes of obligation), and alethic\(^1\) (modes of truth) types. Alethic modality expresses the necessary truth of a proposition (Lyons 1977); epistemic modality expresses the speaker’s opinion or attitude towards the proposition that the sentence expresses or the situation that the proposition describes, while deontic modality is concerned with the necessity or possibility of acts performed by morally responsible agents (Lyons 1977). Palmer’s (2013) typology of modality suggests that there are epistemic, deontic and dynamic types. The latter can be either neutral or subject oriented. Palmer (2001) argues that deontic modality and dynamic modality are difficult to divide: deontic modality may be performative, directive, or commissive, while dynamic modality expresses ability and willingness. The key difference between deontic modality and epistemic modality is that the former means that the speaker “intervene[s] in the speech event by laying obligations or giving permission” (Downing and Locke 1992: 382), while the latter implies that the speaker assesses “the probability that the proposition is true in terms of the modal certainty, probability or possibility” (Downing and Locke 1992: 382). In all the typologies, deontic modality encodes the speaker’s commitment to the necessity/perm issibility of an action, having the following inherent features: *is mandatory that* (obligation); *is allowed that* (permission) and *is prohibited that* (prohibition) (Kryzia 2005). Lyons (1977: 823) claims that when we impose upon someone the obligation to perform or to refrain from performing a particular act, we are clearly not describing either his present or future performance of that act. There is a sense in which the sentence we utter can be said to express a proposition; but it is not a proposition which describes the act itself. What it describes is the state-of-affairs that will obtain if the act in question is performed.

According to the researcher, “if X recognizes that he is obliged to perform some act, then there is usually someone or something that he will acknowledge as

\(^1\) Alethic modality is a debatable concept since there is no language discovered so far where alethic and epistemic modalities would be distinguished through formal means.
responsible for his being under the obligation to act is this way” (Lyons 1977: 824).

The key exponents of deontic modality, like of any other type of modality, are a set of modal forms that create a modal system (Palmer 2003: 2). The principal members of this system are modal auxiliary verbs that are used with other main verbs to make an assessment, judgment, or interpretation of what we are speaking or writing about, or express our attitudes (Parrot 2000). In the English language, deontic modal auxiliaries include nine central verbs (can/could, will/would, shall/should, may/might, must). Alongside the central modals are other English verbs and periphrastic expressions capable of conveying modal meanings. According to Quirk, these are marginal modals, modal idioms, semi-auxiliaries, catenatives and main verbs with a non-finite clause (Quirk et al. 1989: 137). As far as the latter do not fall within the scope of the present analysis, the focus will be on the central deontic modal verbs that are multifunctional and have more than one meaning which is determined by the context (Parrot 2000). In Legal English, these verbs are key linguistic means that convey deontic meanings, i.e. impose obligations and prohibitions and endow rights. Their rich semantic content is a highly characteristic property, i.e. “each modal is considered to convey at least two independent meanings which are sufficiently distinct and disambiguated by the context” (Radovanović 2020: 280). Moreover, this category of deontic modality means is clearly delineated in English on the basis of three morphosyntactic parameters: they do not require do-support in interrogative and negative contexts; they do not have an -s form for the third person singular; they do not have any non-finite forms (Verstraete 2001: 1507).

3. Legal discourse and deontic modal auxiliaries

Tiersma (1999) emphasizes that legal English is diverse in response to different cultural contexts and that it diverges from General English. The studies showed that besides commonly recognized features of legal texts, such as legal terminology, Latinisms (Res judicata, Actus reus) and archaic words, there are other lexical and syntactic features that are characteristic of Legal English: complex prepositions (hereinafter, hereof), deontic modal verbs (e.g. shall, must, may),
proper nouns, denoting names for institutions, state bodies, titles, nominalizations, doublets (null and void, will and testament, any and all), passive structures, etc. Lawyers use language to demarcate their membership in the legal community, to create an aura of mystery, and to require a degree of education to easy entry by outsiders. “The law is a profession of words” (Mellinkoff 1963: 6). Legal texts are a vehicle carrying the legal concepts, and they are difficult to be understood by laypersons or outsiders in the legal community (Orts 2015).

Many researchers have studied the relationship between language and law (see e.g. Gibbons et al. 2004; Melinkoff 1963; Shuy 2000; Tiersma 1999; Trosborg 1997) but only few have tackled this issue of deontic modality in legal discourse (Cooper 2011; Bázlik and Ambrus 2009; Krapivkina 2017). However, imperativeness is a crucial style feature inherent in all legal documents. Law deals with permission and obligation, and the frequency of deontic modality in legal genres is higher compared to genres in other professional contexts. The legal discourse provides readers with useful information about their rights and obligations and orders or prohibits certain acts. This authoritative and permissive aspect is conveyed by deontic modal verbs. The use of deontic modal verbs in legal discourse is of paramount importance as they reflect nuances of meanings related to a specific intention of the legislator. Prescriptive legal texts “are regulatory instruments containing rules of conduct or norms. Accordingly, they prescribe a specific course of action that an individual ought to conform to” (Šarčević 1997: 11). The prescription is a variant of instruction, when any authority, social institution or legislative body becomes a source of motivation (Krapivkina 2017a). Such prescriptions are aimed at regulating the norms of behavior of individuals belonging to any social area. Thus, prescriptive legal texts and deontic modality are closely connected (Williams 2007: 83). The former fall within the realm of deontic modality which is bound up with imposing obligations, regulating and prescribing the recipient’s behavior (Gibova 2011: 7).
4. Data and methodology

4.1. Corpus design

A linguistic corpus was designed for the purpose of the study following the principles of Corpus Linguistics. To meet the aforementioned objectives, legal documents belonging to five legal genres were derived from the website of the United Nations un.org. All the documents selected were adopted by the United Nations. Although the volume of the corpus is not very large, it is represented by various genres of international legal texts (a treaty, a declaration, a charter, a convention, and a statute). This compilation of international legal documents, which contains 50259 words, can be called a small-scale corpus. According to Flowerdew (2004), the small-sized corpora provide relevant contextual information, which makes them useful for a context-based analysis. Table 1 gives a breakdown of the current composition of the corpus.

Table 1: Corpus composition

<table>
<thead>
<tr>
<th>No</th>
<th>Text name</th>
<th>Word count</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>UN Charter (1945)</td>
<td>8 907</td>
</tr>
<tr>
<td>2</td>
<td>Universal Declaration of Human Rights (1948)</td>
<td>1 773</td>
</tr>
<tr>
<td>3</td>
<td>Statute of the International Court of Justice (1945)</td>
<td>5 073</td>
</tr>
<tr>
<td>4</td>
<td>Treaty on the Prohibition of Nuclear Weapons (2017)</td>
<td>29 098</td>
</tr>
<tr>
<td>5</td>
<td>International convention for the suppression of the financing of terrorism (1999)</td>
<td>5 408</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>50 259</td>
</tr>
</tbody>
</table>

To compile the corpus for this study, the documents were selected based on the following criteria:

1) Presence of central modal verbs: the texts were required to contain deontic modals.

2) Genre: in order for conclusions to be more reliable and to identify similarities and contrast between different legal genres, the texts belonging to different text types were selected to build the corpus. The binding character of texts presupposes the frequent use of markers of obligation, permission and prohibition.
3) Origin: the texts in the corpus are international legal documents adopted by the UN. The documents that met these criteria were shortlisted and selected to build the corpus.

The text types chosen represent different legal genres, whereby they should adequately represent the linguistic distribution of deontic modal verbs. The texts in the corpus do not represent any particular field, since an analysis of the semantics and frequency of deontic modals along field parameters is beyond the scope of the present research. The main focus is on the central deontic modal auxiliaries used in the corpus, their frequency and semantic functions. The corpus built may be used to confirm the frequency, distribution and semantic content of deontic modals used in the UN documents. It also provides authentic examples to explore how modals may be used to express deontic meanings in legal settings.

4.2. Research methodology

To comply with the set aims, the study employed both quantitative and qualitative analyses. In order to go beyond a mere list of deontic modals typically employed in legal texts, the present study applied the qualitative method. According to Creswell (2012), the qualitative research is a good way to address a research problem in which you do not know the variables and need to explore. It does not use statistical data concerning the quality of the data. In the present study, the qualitative research is used to analyze and describe the types of deontic modality and the semantic functions of deontic modal verbs.

A quantitative analysis identified the frequency of deontic modal verbs used in the corpus. The first step in the quantitative analysis was to identify verbs employed to express the deontic modality. This means that the average frequency of occurrences of deontic modal verbs (in this paper, an ‘average frequency’ is defined as the total number of times a verb occurs in the texts included into the corpus) was identified. The verbs and the frequency of their occurrences were summarized in a table format. To analyse the use of shall in the corpus, the Advego software was used to build a semantic core of two texts. As a text example

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2 Advego software (https://advego.com/text/seo/) is a professional tool for assessing the quality of texts, searching for keywords and building a semantic core (a list of keywords of the text).
the UN Charter and the Treaty on the Prohibition of Nuclear Weapons were used. The next step in the quantitative analysis was to identify the frequency of positive and negative forms of deontic modals in the corpus. The two forms of the verbs and the frequency of their occurrences were summarized in a diagram format as illustrated in Figure 1. The voice and agent criteria were also used in the present study to compare the contexts of usage of the deontic modals in the corpus.

5. Results and discussion

An examination of the frequency of deontic modal auxiliaries in the corpus is depicted in Table 2.

Table 2: Frequency and distribution of deontic modal auxiliaries in the corpus

<table>
<thead>
<tr>
<th>Text name</th>
<th>Frequency of shall</th>
<th>Frequency of may</th>
<th>Frequency of should</th>
<th>Frequency of must</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Number</td>
<td>Percent</td>
<td>Number</td>
<td>Percent</td>
</tr>
<tr>
<td>UN Charter</td>
<td>184</td>
<td>67</td>
<td>84</td>
<td>30</td>
</tr>
<tr>
<td>Universal Declaration of Human Rights</td>
<td>29</td>
<td>83.2</td>
<td>4</td>
<td>11.1</td>
</tr>
<tr>
<td>Statute of the International Court of Justice</td>
<td>151</td>
<td>71.9</td>
<td>48</td>
<td>22.8</td>
</tr>
<tr>
<td>Treaty on the Prohibition of Nuclear Weapons</td>
<td>74</td>
<td>85</td>
<td>11</td>
<td>12.6</td>
</tr>
<tr>
<td>International Convention for the suppression of the financing of terrorism</td>
<td>70</td>
<td>68</td>
<td>28</td>
<td>27.2</td>
</tr>
<tr>
<td>Total</td>
<td>508</td>
<td>91</td>
<td>21</td>
<td>6</td>
</tr>
</tbody>
</table>
As Table 2 shows, there is no marked variation in the distribution of deontic modals across the legal genres under examination. An exception is the Universal Declaration of Human Rights, where the deontic modal *must* is not used, which indicates the least prescriptive nature of this document. The table shows that the documents converge in the predominance of *shall*. It occurred 508 times out of 625 modal verbs in total which accounts for 81.1% of all occurrences. The observed greater frequency of *shall* in comparison to other modals is consistent with the previous results (Bázlik and Ambrus 2009; Cooper 2011; Krapivkina 2017b; Tiersma 1999). Even when taking into account a small size of the corpus, it seems possible to say that the modal verb *shall* is the most commonly used deontic modal in Legal English. The second ranks *may* accounting for almost 14.6% of all occurrences (91 out of 625). The third verb – *should* – accounts for 3%. The non-frequent occurrence of *should* in the corpus is quite understandable, because it is associated with moral rather than legal obligation. It may come as a surprise that *must* is almost non-represented in the corpus. It numbers five occurrences out of 625 ones (0.8%). This might be due to the increased use of *shall* to express strong obligation. Thus, the table shows that *shall* and *may* predominate within the corpus together reaching 95.7% of all occurrences. To reveal the frequency of *shall* in legal discourse, the Advego software was used to build a semantic core of the text. As a text example the UN Charter and the Treaty on the Prohibition of the Nuclear Weapons were used. The Advego-based analysis revealed that *shall* is the most frequent word in the UN Charter. It occurred 184 times which is 2.14% of all words in the text. *May* ranks 11th in the text. It occurred 84 times which is 0.98% of all the words in the text. An examination of the more recent UN document – the Treaty on the Prohibition of Nuclear Weapons (2017) – showed similar results for *shall*. This modal occurred 75 times which is 1.98% of all words in the text. Thus, the results of the semantic software analysis have proved the assumption about the frequency of *shall* in the corpus. The documents were adopted by the UN within 60 years of each other.

An examination of the frequency of positive and negative forms of the central deontic modals in the corpus is presented in Figure 1.
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Figure 1: The distribution of positive and negative forms of the central deontic modals in the corpus

Figure 1 shows the prevalence of positive forms of the deontic modals over the negative ones which indicates the imperative and permissive rather than prohibitive nature of these legal genres as well as the use of other forms of negation in the texts (no one + modal + verb; modal + verb + no + noun, etc.).

The semantic analysis presented below helps to identify meanings of the central deontic modal auxiliaries as well as similarities and contrast between General English and Legal English and between different genres of international legal documents with regard to the category of deontic modality.

5.1. Shall

This evidence suggests that the occurrences of shall in the corpus merit a closer analysis. It is interesting that in modern General English shall is becoming more infrequent, and, as such, has become an archaism, while in Legal English it is considered to be the most misused word and the most frequent means of deontic modality (Bázlik and Ambrus 2009; Cooper 2011; Krapivkina 2017b).

In Legal English, shall is used to express obligatory and mandatory actions, requirements, prohibitions, permissions, future actions, etc. violating the principles of good drafting, since it has diverse meanings which can shift even within a single sentence (Garner 1995: 939). According to Wydick (1998), the verb can be described as “the biggest troublemaker” for legal experts due to the lack of precision in using it in legal texts.
Moreover, *shall* performs a stylistic function in legal texts expressing a “legalistic flavor” (Williams 2011). Bhatia (1993: 101–102) writes that “adherence to tokens of legalese such as *shall* not only sustains the myth of precision in legal language but also perpetuates a style and language that differentiates the genre from that of other professions”. “Few other words have the potential to evoke such strong feelings among writers on legal drafting. *Shall* is the hallmark of traditional legal writing. Whenever lawyers want to express themselves in formal style, *shall* intrudes” (UK Drafting Techniques Group 2008: 1). However, stylistic uses of *shall* pose a risk to transparency in that the reader may construe them as imposing obligation where none is intended” (Foley 2002: 366).

In General English, *shall* shares a role with *can, could, should, may, might, will, would,* and *must.* In General English, deontic *shall* conveys two meanings: compulsion (but this use of *shall* is impolite) and obligation (to express obligation, *shall* can go with the second or third person pronouns/nouns), while in Legal English, the scope of *shall*-functions is more extended. Below is a list of semantic functions of *shall* found in the corpus.

1. *Shall* is used to impose a duty or obligation:

   *The Secretary-General shall submit this list to the General Assembly and to the Security Council* (3).

   It is evident from the example above that the use of *shall* here imposes a duty on the Secretary-General, implying that s/he is obliged to or have a duty to submit this list to the General Assembly and to the Security Council.

   This use of *shall* can be found both in General and Legal English. In the observed instance, the use of *shall* unambiguously indicates an obligation imposed on the Secretary-General. It is used with a human subject which could be given orders or assigned obligations. The criterion of human subject has been suggested by Trosborg (1997), who believes that in contrast to *must, shall* is always used with a human subject. The corpus-based analysis revealed instances of *shall* preceded by a non-human subject.

2. *Shall* + *not* is used to impose a prohibition:
In the performance of their duties the Secretary-General and the staff **shall not** seek or receive instructions from any government or from any other authority external to the Organization (1).

**Shall** is regularly used to express prohibition in the negative form and have a meaning expressed by *must not* (Bázlik and Ambrus 2009: 65). This use of *shall* is an inherent feature of Legal English.

3. **Shall** is used to give permissions:

*The General Assembly shall initiate studies and make recommendations for the purpose of ...* (1).

In this statement, the meaning of *shall* is closely aligned to *may* (Aitken and Butt 2004). In contrast to Legal English, in General English, *shall* never conveys the meaning of permission. This use of *shall* is a feature of Legal English only.

4. **Shall** is used to deny permission:

*The trusteeship system **shall not** apply to territories which have become Members of the United Nations, relationship among which **shall be based on respect for the principle of sovereign equality.*** (4).

**Shall** conveys the meaning similar to that of *may* in General English. In the observed instance, *shall* is used with a non-human subject which does not meet the human subject criterion.

5. **Shall** is used to express a mandatory precondition:

*This Act **shall** come into operation on a day to be fixed by Proclamation* (5).

This meaning of *shall* is characteristic of Legal English. It was found in all the genres under examination.

Along with these deontic functions of *shall*, the instances of *shall* as a stylistic sign of Legal English were found:

*The Arabic, Chinese, English, French, Russian and Spanish texts of this Treaty **shall** be equally authentic.* (4)

The utterance is not deontically modified. **Shall** is used to express a “legalistic flavor”.
The corpus-based analysis revealed that *shall* can be used both with human and non-human subjects, in active or passive sentences. To investigate the contexts of usage of *shall* in the corpus, the texts were analyzed for the occurrence of a human/non-human subject and a type of voice. The results are presented in Table 3.

Table 3: The contexts of usage of *shall* in the corpus (% of the total)

<table>
<thead>
<tr>
<th>Subject</th>
<th>Sentence type</th>
<th>Active</th>
<th>Passive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Human</td>
<td>Active</td>
<td>46</td>
<td>18</td>
</tr>
<tr>
<td></td>
<td>Passive</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Non-human</td>
<td>Active</td>
<td>21</td>
<td>15</td>
</tr>
<tr>
<td></td>
<td>Passive</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

As is seen from the table, the logical and grammatical subjects coincide in 46% of all the utterances containing *shall*. Most utterances with *shall* (64%) meet the human agent criterion suggested by Trosborg.

The analysis to follow addresses the third question to be answered in this paper. *Shall* is a highly polysemous modal that performs a number of functions in the corpus, which contradicts one of the main principles of legal drafting – clarity and unambiguity. Due to its trouble-making nature (Wu and Li 2019), researchers and law drafters suggest avoiding this verb in legal discourse or restricting its meaning to one sense – ‘has a duty to’, while *must* should be used to express obligation (Garner 1995). According to the Guidelines of the International Labor Office, *shall* should be used for obligations, *should* – for recommendations, and *may* – to allow discretion (Manual for drafting ILO instruments 2007). The Drafting Style Manual (1990) suggest using *shall* to express obligation or requirement, while *may* – to confer a power, privilege, or right. Dickerson (1990) suggests using the modal verb *shall* to express a duty or prohibition, while *must* should be used to create a requirement.

A literature review revealed four possible solutions to the issue of *shall* in legal texts:

1) *shall* should be substituted by a more appropriate modal verb in all legal statements. The verb *shall* is too unreliable and should be substituted with *may* and *must* (Triebel 2006). Lawyers are incapable of using *shall* correctly, so it is necessary to banish it entirely (Asprey 1992).
2) to keep on using shall. According to Foley (2001: 194), replacing shall with must would be a problematic enterprise semantically since “the frequency of familiar must would rise to the point where the word would differ distinctively from that in General English and, in this respect, risk becoming a new shall. Other researchers believe that shall is applied for expressing stronger obligation than must which is used for requirements attached to optional activities (see e.g. Trosborg 1997). Krapivkina (2017b) argues that must has an underlying impertinence, while shall records what a person is required to do.

3) to delete shall from legal documents and not to replace it with other modal verbs, since there is no deontic meaning to replace and the authority designated by shall can be inferred from the context; shall is used as an explicit marker of the authority vested in the author (Berezowski 2011).

4) the most appropriate solution to avoid the ambiguity of shall and overlapping of the meanings of the deontic modals is to restrict shall to only one sense – “has a duty to”. It should be used to impose a duty. May should confer a discretionary power (shall is mandatory while may is discretionary), to grant a permission, must not to prohibit conduct, and should not to indicate soft obligation. This distinction between these deontic modals seems to help eliminate the ambiguity of modal legal statements.

5.2. Should

In General English, the modal verb should can express a moral duty or convey criticism; it is also used to make complaints or express regrets. Its key deontic use is to express obligation which means that the speaker expresses his/her attitude towards a certain statement. In comparison with the obligation expressed by must, the obligation expressed by should is politer: You should do as I said. The difference is in the severity of consequences if the obligation is not fulfilled (Smith 2003: 242).

In legal texts, should is rarely employed in its deontic sense, since it is associated with moral rather than legal obligation. Should expresses appropriateness or suitability, which is not typical of prescriptive legal texts. Unlike the markers of strong necessity (e.g. must, have to), should expresses weak obligation.
Šarčević (1997) points out, the verb *should* lacks a clear prescriptive meaning of shall and is hence never used in legal discourse to express commands. The corpus-based analysis showed that in its positive form *should* is mainly used in introductory parts of the documents meaning *it is recommended*.

Five instances of *should* as a synonym to *shall* bearing the meaning of weak obligation, recommendation or even suggestion were found in the corpus:

*They are endowed with reason and conscience and should act towards one another in a spirit of brotherhood* (2).

In this example, *should* conveys a meaning of recommendation or advice to act in a certain way.

Only two instances of no-obligation denoted by the negative form of *should* were found in the corpus.

*If, for some special reason, a member of the Court considers that he should not take part in the decision of a particular case, he shall so inform the President* (3).

*Should not* indicates that a member of the Court is not required to take part in the decision making if there are special reasons for it. The obligation expressed with *shall* denotes what members of the Court are required to do by law if they have grounds not to take part in the decision making process.

Several uses of *should* with inversion were also found in the corpus. An analysis of the corpus identified that out of 21 occurrences of *should* six occurrences were associated with the conditional meaning. In this case it replaces *if* making the sentence conditional:

*Should a State Party consider that it has an interest of a legal nature which may be affected by the decision in any dispute, it may submit a request to the Tribunal to be permitted to intervene* (5).

The conditional sentence with *should* suffers inversion to show more formality of the utterance. It is semantically equivalent to *in the event a State Party consider that it has an interest of a legal nature*, but sounds more formal.

The results of the analysis of the uses of *should* in conditional sentences are presented in Table 4. Among the functions of *should* in the corpus, its use in
the conditional sentences accounts for 14% which indicates the relatively low frequency of conditional uses of *should* in the corpus.

Table 4: Frequency and distribution of the occurrences of *should* in the corpus

<table>
<thead>
<tr>
<th>Text name</th>
<th>Frequency of <em>should</em></th>
<th>Occurrences of <em>should</em> in conditional sentences</th>
</tr>
</thead>
<tbody>
<tr>
<td>UN Charter</td>
<td>5</td>
<td>2</td>
</tr>
<tr>
<td>Universal Declaration of Human Rights</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>Statute of the International Court of Justice</td>
<td>9</td>
<td>3</td>
</tr>
<tr>
<td>Treaty on the Prohibition of Nuclear Weapons</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td>International convention for the suppression of the financing of terrorism</td>
<td>4</td>
<td>1</td>
</tr>
<tr>
<td>Total</td>
<td>21</td>
<td>6</td>
</tr>
</tbody>
</table>

To investigate the contexts of usage of *should* in the corpus, the UN documents were analyzed for the occurrence of a human/non-human subject and a type of voice. The results are presented in Table 5.

Table 5: The contexts of usage of *should* in the corpus (% of the total)

<table>
<thead>
<tr>
<th>Subject</th>
<th>Sentence type</th>
<th>Active</th>
<th>Passive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Human</td>
<td></td>
<td>78</td>
<td>8</td>
</tr>
<tr>
<td>Non-human</td>
<td></td>
<td>6</td>
<td>8</td>
</tr>
</tbody>
</table>

As is seen from Table 5, the logical and grammatical subjects coincide in 78% of all utterances containing *should*. *Should* is mostly used in active sentences with a human subject which means that recommendations are mostly given to human agents or their associations.

5.3. Must

Similar to *should* and *may*, in General English, *must* is used to express both logical necessity and deontic obligation. The meaning of logical or epistemic necessity can be found in statements with a speaker convinced that the statement is true. When using *must* to express deontic obligation, “the speaker expresses
his/her authority to advocate certain behavior of someone else or his/her own.” (Quirk et al. 1989: 224–225). It should be noted that in General English, there are many instances of ambiguous interpretations where must is either interpreted deontically or epistemically (e.g. They must be out of country). In legal discourse, must is always used as a deontic modal which does not create ambiguity of its meaning.

An analysis has revealed that must is the least frequently used deontic modal in the corpus. It conveys strong obligation, requirement and prohibition (must + not). Strong obligation is manifested when “the consequences are more severe if the obligation is not fulfilled” (Smith 2003: 242). It is used in rules which refers to compelling situations resulting from strongly binding forces such as laws (Radovanović 2020: 282). Categorical imperatives are characterized by the lack of alternative behavior: Any action which may be taken on the basis of the report must be in conformity with the provisions of the Convention concerning the powers and functions entrusted to the respective organs of the Authority. (5).

In addition, must is used when the legislator wishes to express requirements, i.e. what individuals or things must be rather than what they must do: Such measures must be compatible with this Treaty. They shall be notified to the Commission (4).

Prohibitions can be formulated as a legal duty not to perform certain actions. The statement is built by the formula: Subject S in situation A is prohibited from performing action P. Only one overt prohibition expressed with must not was found in the corpus. I might assume that this small number of prohibitions expressed with must + not is due to the use of other constructions with the no-determiner: no one may/shall ..., no one shall/may …, no + noun ... shall/may ….; may in no case ... In addition, most of the international documents under consideration are of entitling rather than prohibitive nature.

An analysis showed that obligations and prohibitions expressed with must are equally imposed on human and non-human subjects (three instances of must with a human subject and three instances of the verb with a non-human subject). What is more, the analysis revealed the predominant use of must in active sentences (67%) (see Table 6).

---

3 This utterance can either mean that the agent is obliged to be there (deontic) or that the speaker is certain he is there (epistemic), depending on the context.
Table 6: The context of usage of *must* in the corpus (% of the total)

<table>
<thead>
<tr>
<th>Subject</th>
<th>Sentence type</th>
<th>Active</th>
<th>Passive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Human</td>
<td>50</td>
<td>0</td>
<td></td>
</tr>
<tr>
<td>Non-human</td>
<td>17</td>
<td>33</td>
<td></td>
</tr>
</tbody>
</table>

5.4. **May**

In General English, the deontic modal verb *may* is used 1) to ask for permission: *May I take your pen?* 2) to give permission: *You may do it now;* and 3) to impose prohibition: *You may not borrow this car.* In comparison to General English, in Legal English, *may* conveys two out of three deontic meanings mentioned above: it confers a power (permission) (1) and it imposes a legal ban on some actions) (prohibition) (*may + not*) (2).

In the corpus, *may* ranks second in the list of deontic modal verbs. It occurred 91 times out of 625 deontic modal verbs in total. Both *shall* and *may* are used to authorize the recipient to do something. The difference lies in the fact that positive *may* implies discretion, while *shall* (or *must*) – obligation. The modal *shall* is used for the imperative, while *may* is a permissive verb.

(1) *Any State Party may denounce this Convention by written notification to the Secretary General of the United Nations.* (5).

In this example, the deontically modified active utterance is a carrier of “permission, which is related to possibility” (Lyons 1977: 832). May expresses entitlement, i.e. it indicates the State Party’s right to denounce the Convention.

(2) *The rights to bring actions provided for in Articles 169 and 170 may not be exercised within the framework of paragraphs 1 to 9 of this Article.* (3).

In this example, the deontically modified passive utterance is a carrier of “prohibition” imposed on a human subject, as only a person can exercise rights.

The corpus-based analysis showed that permissions and prohibitions expressed with *may* are almost equally imposed on human and non-human subjects (54% of all permissions and prohibitions are imposed on a human subject, while 45%
- on a non-human one). What is more, the analysis revealed the predominant use of *may* in active sentences (see Table 7).

Table 7: The contexts of usage of *may* in the corpus (% of the total)

<table>
<thead>
<tr>
<th>Subject</th>
<th>Sentence type</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Active</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Human</td>
<td>45</td>
<td>9</td>
<td></td>
</tr>
<tr>
<td>Non-human</td>
<td>27</td>
<td>18</td>
<td></td>
</tr>
</tbody>
</table>

### 6. Discussion and conclusion

This study put forward a corpus-based analysis of English deontic modals as a key linguistic phenomenon that needs to be thoroughly explored.

The analysis of deontic modal auxiliaries in Legal English has been conducted on the UN legal documents of different genres. The central modal verbs *shall, should, must* and *may* that convey various nuances of deontic modality in legal texts have been studied. Alongside the central modals are other English verbs and periphrastic expressions capable of conveying modal meanings. However, they have not fallen within the scope of the present analysis, and can be an avenue for further research.

The analysis revealed that there is no marked variation in the distribution of deontic modals across the legal genres under examination. An exception is the Universal Declaration of Human Rights, where the deontic modal *must* is not used, which indicates the least prescriptive nature of this document. It is therefore possible to argue that different legal genres do not favor the different use of deontic modals. Table 8 presents the deontic modals identified in the corpus with the corresponding meanings they convey.

Table 8: Semantic distributions of deontic modals in the corpus (% of the total)

<table>
<thead>
<tr>
<th>Deontic modals</th>
<th>Deontic meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Obligation</td>
</tr>
<tr>
<td></td>
<td>strong weak</td>
</tr>
<tr>
<td>shall</td>
<td>46.2</td>
</tr>
<tr>
<td>may</td>
<td>0</td>
</tr>
<tr>
<td>should</td>
<td>0</td>
</tr>
<tr>
<td>must</td>
<td>1</td>
</tr>
</tbody>
</table>
The frequency distribution of the deontic modals based on the meanings they convey in the corpus revealed the dominance of both meanings of permission (29.4%) and obligation (47.2%). This would mean that there are more statements that refer to the situations or activities allowed for the subjects, and that along with these permissions are obligations or responsibilities asked from the subjects. Apparently, both meanings are essentially contributed by the most prevalent deontic modal *shall*. The results of the analysis therefore supported the initial presumption that *shall* will stand out as the most frequent of all deontic modal. In the international legal texts under examination *shall* imposes obligations, creates preconditions, requirements and prohibitions. The semantic diversity of *shall* causes ambiguity and fuzziness of legal texts. However, adherence to the use of *shall* perpetuates a style that differentiates the legal genre from that of other professions. The most appropriate solution to the problem of ambiguity of *shall* in Legal English is the restriction of *shall* to only one sense – “has a duty to”. Other meanings (prohibition and permission) should be conveyed by *must* and *may*. It was found that a significant rise in the use of *may* and *must* instead of *shall* which is a current trend in the legislation of English-speaking countries was not observed in the corpus. Even in the Treaty on the Prohibition of Nuclear Weapons which was adopted in 2017, *shall* predominates over other deontic modals.

A rather large percentage is contributed by *may* for the deontic meanings of permissions and prohibitions. It ranks second in the list of deontic modal verbs used in the corpus.

*Should* and *must* are the least common modal verbs in Legal English that occur in limited incidences in the corpus. *Should* expresses weak obligation (recommendation) and no-obligation (if followed by *not*), while *must* conveys strong obligation and prohibition (if followed by *not*). A small number of occurrences of these verbs might be due to the nature of legal discourse. Appropriateness or suitability expressed by *should* is not typical of prescriptive legal texts. The use of other constructions with the *no*-determiner to express prohibition as well as the frequent use of *shall* to express obligation make *must* the least frequently used deontic modal.

The analysis showed that obligations, permissions and prohibitions expressed with the deontic modals are imposed both on human and non-human subjects to
a different extent. The analysis of the frequency of modals in different contexts established that the logical and grammatical subjects coincide in 46% and 78% of all utterances containing shall and should, respectively. Most utterances with shall (64%) and should (86%) meet the human agent criterion. Obligations and prohibitions expressed with the deontic modal must are equally imposed on human and non-human subjects, and this modal is predominantly used in active sentences. Permission and prohibitions expressed with may are almost equally imposed on human and non-human subjects. The analysis also revealed the predominant use of may in active sentences.

In the corpus, the semantic content of the central deontic modals differs from that in General English. In legal texts, shall conveys more meanings than in General English, while the semantic content of should, must and may is poorer in legal texts.

Complementarily it may also be relevant to extend this study to account for the use of deontic modals in oral legal genres, including courtroom discourse. Modality in courtroom discourse remains as an open area of research that demands linguistic inquiry. This study may be enriched by including other written genres, including civil contracts and agreements. This is to further investigate on the usage of marginal modals that represent deontic meanings in legal language.

References

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Olga Boginskaya: A Corpus-Based Study of Deontic Modality in Legal Discourse


Korpusno istraživanje deontičkog modaliteta u pravnojezičnom diskursu

Sažetak

Rad je prilog istraživanju deontičkih modalnih sredstava u engleskom kao jednom od ključnih lingvističkih fenomena. Odgovor je to na potrebe sustavne analize engleskih deontičkih modalnih pomoćnih glagola koji se koriste u međunarodnim pravnim dokumentima različitih žanrova. Deontička modalnost istražuje se kao pojmovna kategorija iz semantičke perspektive. Deontički modali kojima se izražava dopuštenje, obveza i zabranu obrađuju se s osobitim obzirom na primjenjivost na pravni engleski. Korpusom su zahvaćeni dokumenti Ujedinjenih nacija iz pet pravnih žanrova: Povelja Ujedinjenih naroda, Opća deklaracija o pravima čovjeka, Statut Međunarodnoga suda pravde, Sporazum o zabrani nuklearnoga oružja i Međunarodna konvencija o suzbijanju financiranja terorizma. Ti tekstovi izabrani su za određivanje čestote, distribucije i semantičkoga
sadržaja modalnih glagola kojima se izražava dopuštenje, obveza i zabrana. Također je postavljen cilj otkrivanja sličnosti i različitosti u služenju deontičkim modalnim glagolimima u općem engleskom jeziku i u pravnom engleskom jeziku.

**Keywords:** deontic modality, legal text, legalese, permission, obligation, prohibition

**Ključne riječi:** deontički modalitet, pravni tekst, legalizacija, dopuštenje, obveza, zabrana