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# On Presenting Word Class Information in Japanese Learners' Bilingual Dictionaries

## 二言語辞典における品詞表示の問題点 －品詞表示の現状とその必要性について－

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### Abstract

The present paper focuses on the section in dictionary entries that gives the word class or part of speech of the headword. It first reviews the previous studies done in the field of lexicography on presenting the word class in dictionaries, then focuses on word class in Japanese, and introduces its major issues. This paper also reports a survey done by the authors to investigate the approach taken by existing bilingual dictionaries to deal with the problems of presenting the word class in Japanese dictionaries. This study analyzes the solutions provided by these dictionaries based on the needs of Japanese language learners. Finally, based on the survey, this paper makes concrete suggestions on how a Japanese learners' bilingual dictionary should present information on the word class of its headwords.

Keywords: word class, part of speech, lexicography, dictionary, Japanese

## 1. Introduction

### 1.1 Word class or part of speech?

The concept of “word class” or “part of speech” can be considered as the foundation of traditional grammar. Ancient Greeks were the first to develop a system of eight classes for words, namely, noun, verb, participle, article, pronoun, preposition, adverb and conjunction. Similar systems thereafter have been widely used in the grammar of world languages. Word classes play an indispensable role in studying languages, teaching languages, and also in lexicography.

Although both terms “word class” and “part of speech” are used in literature, in recent years the former has been preferred over the latter in linguistic studies. Some linguists actually make a slight distinction between the two terms. For instance, Yamada<sup>1)</sup> (1996) holds that “part of speech” is connected with syntagmatic relations and “word class” with paradigmatic relations. In the field of lexicography, however, many researchers still prefer the term “part of speech” (POS). In the present paper, we shall use the term “word class” due to its semantic transparency and established usage in

linguistic studies.

## 1.2 Word classes in lexicography

In lexicography, word class is the syntactic classification or grammatical role of a sense or entry, for example, noun, verb, prefix, etc. (Jackson 2013: 401). As asserted in Yong and Ping (2007: 102), in most dictionaries, what follows the pronunciation transcription is the indication of the word class of the headword. In English bilingual dictionaries, nine major word classes are often distinguished. Word class is usually indicated by conventional abbreviations, 'n' for noun, 'a' or 'adj' for adjective, etc. Information concerning the word class is the central and, in many cases, the only grammatical information provided in dictionaries. In the history of lexicography, we even encounter dictionaries in which headwords are sorted by their word class (Kibbee 1986: 141-142).

The question that immediately arises is how necessary is presenting the information on word class in a dictionary. Grammatical information such as word class can undoubtedly serve the needs of language learners who constantly deal with grammatical issues. These learners constitute a great number of dictionary users. As Yong and Ping (2007: 147) state, labels of word classes in word entries convey not only grammatical information, but also semantic information. Thus, this information can also help all users distinguish between homographs, divide polysemous words into different sense units and discriminate between meanings in bilingual dictionaries.

Some surveys have also been conducted to examine if dictionary users actually refer to word class information provided in dictionary entries. For example, Yong and Ping (2007: 31), in a part of their survey on dictionary users, asked 195 informants who were Chinese students if they ever refer to an English dictionary to check the word class of a specific word. Around 33% of subjects answered yes, 42% sometimes, 21% very rarely and 4% no. This study shows that about 75% of dictionary users refer at least sometimes to dictionaries to find out the word class of a lexical item.

In another study, Boonmoh and Nesi (2008) conducted a questionnaire survey of attitudes to pocket electronic dictionaries at a university in Thailand and found that students tend to select the wrong word because of their lack of knowledge in word class. This study too indicates the important role of presenting word class information in dictionaries.

Providing word class information in a dictionary depends highly on the type of dictionary and its target users. For example, Yong and Ping (2007: 45) explain that bilingual dictionaries for children are not usually based on grammatical classifications, and word entries are not usually marked by word class. Neither is sense division of each entry. In small bilingual pocket dictionaries which have very restricted space, no grammatical information other than labels of word class can be found at each entry.

In modern lexicography, which is largely dependent on corpora, the headwords are determined based on their frequencies in the corpora and their word classes are tagged automatically using computer software called POS-tagger, which assigns every word in the corpus to a word class (Atkins and Rundell 2008: 90).

The amount of grammatical information presented in the word class section of each entry is another important issue to discuss. Is providing the label of a word class enough, or do we need subclasses that are more detailed? Kiefer and van Sterkenburg (2003: 354-355) maintain that the information on word class has turned out to be insufficient for various reasons, the most important of which is that it fails to do justice to the syntactic behavior of a lexical item. For example, in the English language we have to know whether a noun is a count or an uncount noun. Thus, as Yong and Ping (2007: 147) argue, the dictionary user's desire for knowledge of word classes will never stop at the basic classification of words into nine major classes, which still hide a great deal of information of practical value about words.

The expectations of language users urge lexicographers to probe deeper into word classes and divide them into subclasses. For instance, in the case of verbs, transitivity -information about argument structure, which specifies the number of arguments required by the verb-, is a very significant issue for language learners. In English, a verb can be either intransitive (one-place predicate) e.g. *walk*, *run* etc.; transitive (two-place predicate) e.g. *know*, *remember* etc.; or ditransitive (three-place predicates) e.g. *give*, *pass* etc. Some transitive verbs may also have intransitive uses, which means that their object argument is optional. These differences between verbs can be very complicated and can confuse language learners.

## 2. Problems concerning classifying words into word classes

Assigning word class labels to word entries in a dictionary may seem like a simple task, however in practice, determining the class(es) a word belongs to can be a very difficult and complicated issue. Classifying words into eight or nine specific classes, which is based on the tradition of studying certain familiar European languages, seems to be misleading. In fact, word class can be considered as a language-specific issue rather than a universal one. Many researchers, especially functionalist linguists, tend to regard conventional word classes such as verbs and nouns as language-specific categories (Croft 2001, Haspelmath 2007, Cristofaro 2009, Croft and van Lier 2012). There are even languages that lack distinct classes of verbs, nouns, or adjectives.

In some languages, it seems hard to draw a solid line between two certain classes of words. For example, most *na*-adjectives in Japanese can also be used as nouns. This has motivated many researchers like Tokieda<sup>2)</sup> (1950) and Jorden (1987) to classify *na*-adjectives as nouns. Similarly, in

Persian, most adjectives can also appear as a noun in subject or object position of a sentence. In almost all languages, one can find large number of words that have more than one type of syntactic behavior, which makes them difficult to fit into one of the conventional categories. They are rightful to belong to more than one word class, because of their multifunctional behavior.

These issues have led researchers to reconsider the concept of word class in recent years. For example, as Van Lier and Rijkhoff (2013: 3) review and summarize the previous work, word classes can be thought of as prototypes rather than logical or classical categories. In prototype theory, it is not assumed that all members of a category have exactly the same set of properties allowing for more and less typical class members. Thus, in this approach, for instance, we can have a more typical or a less typical verb.

Van Lier and Rijkhoff (2013: 9) also support the idea of flexible languages and argue that flexible languages have a major group of words that cannot be classified in terms of one of the major lexical categories, because these words can fulfill the functions that are typically served by members of two or more traditional word classes in other languages. They raise the Turkish word *güzel* ‘beautiful’ as an example, which can be used as a noun, an adjective or an adverb.

Taking the above issues into consideration, the crucial question that arises is how word classes should be treated and presented in dictionaries. In order to provide an answer to this question, the next section will first focus on the unique problems in classifying Japanese words into word classes. Then, we will concentrate on Japanese-foreign language bilingual dictionaries and will analyze the method of presenting word classes in 10 existing Japanese bilingual dictionaries from the viewpoint of language learners. The aim of this survey is to compare different approaches taken in dictionaries toward the word class to find the most appropriate and the most efficient approach.

## 2.1 The problem of word class in Japanese dictionaries

Classifying Japanese words into conventional categories has unique difficulties, most of which have been discussed in previous research. For instance, Yamahashi<sup>3)</sup> (2013: 8-11) points out three problems in classifying Japanese words. The first problem, as mentioned in the previous section, concerns the two adjective groups, namely *i*-adjectives and *na*-adjectives. The two categories, although being adjectives, have different grammatical characteristics and behaviors. Consequently, Matsushita<sup>4)</sup> (1977) classifies *i*-adjectives as verbs due to some grammatical similarities between these categories and Tokieda (1950) and Jorden (1987) classify *na*-adjectives as nouns. Jorden (1987) even adopts the term “*na*-nominals” instead of “*na*-adjectives”.

The second problem Yamahashi (2013) points to is the difficulty of classifying Japanese adverbs. The first question Yamahashi raises regarding adverbs is whether Japanese adverbs form an

independent category or not. The second question concerns adverbs such as *haruka* 'distantly' or *wazuka* 'slightly' that can also function as *na*-adjectives.

The third problem indicated in Yamahashi (2013) is the transformation derivations in which the class of a word changes without any morphological change in the word. The main examples are deadjectival nouns (nouns derived from adjectives) and deverbal nouns (nouns derived from verbs). Hosseini and Jahedzadeh (2018) dealt with deverbal nouns in Japanese and the issues concerning these nouns in bilingual dictionaries. Yamahashi (2013: 11) considers transformation derivations to be serious problems in both linguistic research and Japanese education.

Based on the previous research and observations by the authors of the present paper, this study proposes four major problems as the most serious issues in presenting word-class information in Japanese bilingual dictionaries. It is worth mentioning that these four problems have been chosen based on the needs of the learners of the Japanese language. In other words, in selecting the most serious problems of presenting the word class information in bilingual dictionaries, learners of the Japanese language have been regarded as the main users of the dictionaries. The four main problems are as follows:

#### A) Problems concerning *na*-adjectives

As mentioned in previous sections, the class of words known as *na*-adjectives or as Jorden (1987) calls them *na*-nominals or *keiyōdōshi* in Japanese, can be very challenging when it comes to dividing Japanese words into conventional categories or word classes. The problems of *na*-adjectives are addressed in almost any study that deals with the problem of word classes in Japanese.

Firstly, although *na*-adjectives have grammatical similarities with true adjectives or *i*-adjectives in some aspects, they behave syntactically and morphologically differently from them in other aspects. For example, *kyodai* 'huge' and *erai* 'great' both are adjectives and both end in *-i*, however, the former is a *na*-adjective (*kyodai-na hito* 'huge person') and the latter is an *i*-adjective (*erai hito* 'great person'). The learner, when encountering new lexical items, has to know if a new adjective is a *na*-adjective or an *i*-adjective to be able to use it correctly. Therefore, it is important for a learners' bilingual dictionary to draw a distinction between the two types of adjectives in Japanese.

Secondly, a group of *na*-adjectives can also serve as nouns. For example, while *kenkō* 'health' and *heiwa* 'peace' can both be used as adjectives in phrases such as *kenkō-na hito* 'a healthy person' or *heiwa-na kuni* 'a peaceful country', they can also both appear as nouns in sentences like *kenkō-ga ichiban da* 'health comes first' or *heiwa-wo mamorō* 'let's protect the peace'. Therefore, a learner of Japanese has to know about the dual nature of these words to become able to use and perceive them correctly.

### B) Problems concerning adverbs

Some studies suppose that there are only three major word classes in Japanese, namely, verbs, nouns and adjectives (Yamashita 2013:10). This approach does not categorize adverbs as a major word class. This issue was pointed out in section 2.1 of this paper. Dictionaries adopting this approach will lack any word class information for adverbs. However, a learner who consults a dictionary needs to know the word class of every headword she/he looks up to predict the grammatical behavior of the word. Thus, a dictionary lacking word class information for adverbs is not suitable for learners.

On the other hand, a great number of Japanese adverbs can be a member of other word classes such as *na*-adjectives or nouns. For instance, *taihen* ‘very’ when used in phrases like *taihen omoshiroi* ‘very interesting’ is an adverb, while it can be used as a *na*-adjective in a phrase like *taihen-na shigoto* ‘hard work’. The word *ippai*, as another example, can either be an adverb as in *ippai neta* ‘I slept a lot’ or a *na*-adjective as in *hito-de ippai-na basho* ‘a place full of people’. Therefore, a learners’ bilingual dictionary has to make a distinction in some way between these different senses, each of which belongs to a different word class.

### C) Problems concerning verbs

The number of syntactic arguments a verb can take is a very crucial piece of information for a language learner when acquiring new verbs of a language. In many languages, using transitive verbs instead of intransitive ones and vice versa is a common error in language learning. In learning Japanese as a second or foreign language, this error is very outstanding, because Japanese has a significant number of phonetically resembling transitive/intransitive pairs of verbs, which are very confusing for learners, especially in the elementary and intermediate stages of learning.

For example, in the pairs *hajimeru/hajimaru* ‘to start’ or *atsumeru/atsumaru* ‘to gather’, the first verb in the pair is transitive and the second one is intransitive. Some learners may try to make use of the vowels in the verb as a clue to discriminate transitive and intransitive verbs. Unfortunately, this pattern does not always work correctly for learners. For instance, in the above-mentioned pairs, the verb containing the vowel /e/ is the transitive one. However, in a pair like *niru/nieru* ‘to boil’, the one with the vowel /e/ is the intransitive verb of the pair. Thus, learners have to be provided with clear information about the transitivity of every new verb they learn.

Furthermore, Japanese has a group of verbs, which can be used both as transitive and intransitive verbs. These verbs, known as *ji-ta-ryōyō dōshi*<sup>5)</sup> in Japanese, can be very confusing for learners. For example, the verb *sosogu* ‘to pour’ is used as a transitive verb in the sentence *kappu-ni kōhī-wo sosogu* ‘I pour coffee into the cup’, but is used as an intransitive verb in the sentence *kawa-ga umi-ni sosogu* ‘the river flows into the sea’. Therefore, the dual nature of these verbs has to be indicated in

dictionaries compiled for learners.

Another issue with respect to classifying Japanese verbs is grouping them based on inflectional conjugations. Japanese verbs have inflections and are classified into three main groupings according to the way they are conjugated. Verbs in the same group follow the same rules when making various verb forms. The inflectional grouping is predictable for some Japanese verbs based on their phonological structure. Essentially, consonant-ending verbs belong to the group known as group 1 in Japanese language education, and vowel-ending verbs belong to group 2. However, this rule has a large number of exceptions that make the learners dependent on grammatical information in textbooks and dictionaries.

#### *D) Problems concerning Sino-Japanese verbs*

Sino-Japanese words are words made by combining morphemes originally borrowed from Chinese. They are mostly bimorphemic and are written in Kanji characters. A large number of Sino-Japanese nouns can be used as verbs if followed by the light verb *-suru*. Since not all Sino-Japanese nouns can be followed by *-suru*, it is important for a learner of the Japanese language to know which Sino-Japanese nouns are potential verbs. For instance, *shukkin* 'withdrawal' can be used as a *-suru* verb *shukkin-suru* 'to pay', but *zeikin* 'tax' is never used as a verb. While these issues are clear for native speakers of the language, learners need them to be explained in language teaching material and dictionaries.

Another issue with Sino-Japanese *-suru* verbs is the transitivity of these verbs. Some of the *-suru* verbs such as *hassei-suru* 'to occur' are intransitive, some such as *satsugai-suru* 'to kill' are transitive, and others such as *kakudai-suru* 'to expand' can be used both as transitive and intransitive verbs. An ideal learners' dictionary, in addition to determining which Sino-Japanese nouns can be used as *-suru* verbs, will also provide the users with information about the transitivity of these verbs.

### **3. Survey**

A survey was conducted on 10 existing Japanese bilingual dictionaries to examine how these dictionaries deal with the above-mentioned four problems of presenting word classes. It should be noted that many existing Japanese bilingual dictionaries do not present word class information at all. For example, Kodansha's Furigana Japanese Dictionary has two parts: English-Japanese and Japanese-English. While all of the headwords in the English-Japanese part have word class labels, there is no indication of word class in the Japanese-English part. This is also true about Kuroyanagi's contemporary Persian dictionary in which only the Persian-Japanese part has word class information. There are also many other dictionaries that lack word class labels including Sanseido's Daily



Japanese-Spanish-English Dictionary.

In other groups of dictionaries, there are indications of word class only for some of the headwords. Kenkyusha's Lighthouse Japanese-English dictionary belongs to this group in which most headwords including controversial ones like *ippai* lack indication of word class information, while in the definitions of headwords, the word class of many English words presented as equivalents to headwords has been given.

The approaches adopted in the above-mentioned dictionaries may be due to the fact that they assume their main users to be native speakers of Japanese, for whom in a Japanese-foreign language dictionary the information on the word class of the foreign language words is much more important than the information on the word class of the Japanese words. In the survey done for this study, only the Japanese-foreign language bilingual dictionaries that had word class labels for most of their Japanese headwords have been investigated. The investigated dictionaries include four Japanese-English dictionaries, a Japanese-French, a Japanese-Spanish, a Japanese-Portuguese, a Japanese-Italian, a Japanese-Hungarian and a Japanese-Chinese dictionary. One of the dictionaries was an online dictionary (on a website) and the others were paper dictionaries. A list of the dictionaries is as follows:

1. Jisho, Online Japanese-English Dictionary, hereafter: Jisho.org
2. Oxford Japanese Mini Dictionary, hereafter: Oxford-mini
3. Kenkyusha's New Japanese-English Dictionary, hereafter: Kenkyusha
4. Bonjinsha-Oxford's Basic Japanese-English Dictionary, hereafter: Bonjinsha-Oxford
5. Concise Japonais Francais Dictionary, hereafter: French
6. Diccionario Moderno Japones-Espanol, hereafter: Spanish
7. Dicionario Pratico Japones-Portugues, hereafter: Portuguese
8. Dizionario Giapponese-Italiano, hereafter: Italian
9. Japan-Magyar Nagyszotar, hereafter: Hungarian
10. Shinjidai Japanese-Chinese Dictionary, hereafter: Chinese

The four problems mentioned in the previous section were investigated in these 10 dictionaries to examine how these dictionaries deal with those problems. Among these 10 dictionaries, the online dictionary Jisho.org is the only one that uses full labels for word classes, like “*na*-adjective”, “noun” or “adverb”. Oxford-mini, Kenkyusha and Bonjinsha-Oxford use English abbreviations, although the abbreviations they use differ for most word classes, e.g., Oxford-mini and Bonjinsha-Oxford use “adj” for adjective while Kenkyusha uses “a” to show adjectives. Three dictionaries namely, Portuguese, Hungarian and Chinese use Portuguese, Hungarian and Chinese abbreviations respectively. The remaining three dictionaries, French, Spanish and Italian use Japanese abbreviations (Kanji and kana) as word class labels. The next sections report the results of the survey for each

problem separately. A detailed summary of the survey is given in table 1, and the list of investigated words is provided in appendix 1.

#### *A) Problems concerning na-adjectives*

The first question concerning *na*-adjectives was if the dictionaries use different word class labels for *na*-adjectives and *i*-adjectives. In order to answer this question, 10 *na*-adjectives and 10 *i*-adjectives were selected randomly, and looked up in the dictionaries. Among the 10 investigated dictionaries, three made a clear distinction between the two types of adjectives (marked by a circle in table 1); three dictionaries made no distinction between the two types at all and labeled both of them as adjectives (marked by x-marks in table 1). The four remaining dictionaries had inconsistent approaches toward the adjectives, meaning that they all marked *i*-adjectives in one way or another, but failed to label all *na*-adjectives correctly. In other words, they discriminated some of the examined *na*-adjectives from *i*-adjectives, but used the same label as *i*-adjectives for some other *na*-adjectives (these dictionaries are marked by a triangle in table 1).

The second question about *na*-adjectives was if the dictionaries use both word class labels “*na*-adjective” and “noun” for words like *kenkō* or *heiwa* that belong to both groups. To answer this question, 10 such words were selected and looked up in the dictionaries. To see the list of words, refer to appendix 1. The results showed that five dictionaries use both labels for these words, two use only one label, ignoring the other, and three dictionaries use both labels for some words and one label for others.

#### *B) Problems concerning adverbs*

In all the 10 investigated dictionaries, the word class label was assigned for adverbs in one way or another. Regarding the adverbs that can be a member of other categories, 10 adverbs that can also be used as *na*-adjectives were selected to see if the dictionaries label them as a member of a single category, or indicate their dual membership. Two dictionaries assigned two labels for all of these words, five assigned two labels to some, and three dictionaries assigned only one word class label to these words.

#### *C) Problems concerning verbs*

One question about the verbs was whether dictionaries make any distinction between transitive verbs and intransitive verbs by assigning different labels or not. To answer this question, 10 transitive and 10 intransitive verbs were randomly chosen and checked in the dictionaries. The survey results showed that five dictionaries discriminate transitive and intransitive verbs and five dictionaries do

not.

As for the verbs with both transitive and intransitive usages, 10 such verbs were investigated in the dictionaries. Among the 10 dictionaries, two marked the verbs that have both transitive and intransitive usages for all investigated verbs, two dictionaries marked these verbs only in some of the examined verbs and six other dictionaries did not mark the dual nature of these verbs at all.

As for grouping verbs based on their inflections, 30 verbs used in the above-mentioned observations were also investigated to see if the dictionaries mark the verb group in the word class section of an entry or not. Again similar to transitivity, five dictionaries marked inflectional groups and five did not. Table 1 shows that the dictionaries that mark transitivity do not necessarily mark inflectional groups.

#### D) Problems concerning Sino-Japanese verbs

The first question with respect to Sino-Japanese nouns that can be used as verbs by adding *-suru* verb was whether the dictionaries assign the label ‘verb’ to these words or not. The result of the investigation showed that all 10 dictionaries, except for Bonjinsha-Oxford, assign this label. In fact, none of the investigated Sino-Japanese words existed in Bonjinsha-Oxford due to its small number of entries. Another dictionary, namely, Japanese-Portuguese dictionary, had the label ‘verb’ only for some potential Sino-Japanese verbs.

The second question regarding Sino-Japanese verbs was if the dictionaries indicate their transitivity or not. Surprisingly, only two of the dictionaries had the transitivity labels for Sino-

**Table 1: summary of the survey done on 10 bilingual Japanese dictionaries.**

	Jisho.org	Oxford-Mini	Kenkyusha	Bonjinsha-Ox	French	Spanish	Portuguese	Italian	Hungarian	Chinese
Discriminates na-adj and i-adj	○	×	×	○	△	△	×	△	○	△
Two labels for words that are noun and na-adj	○	△	○	○	×	△	×	△	○	○
Discriminates transitive and intransitive verbs	○	○	×	×	×	○	×	○	×	○
Marks verbs that are both trans. and intrans.	○	△	×	×	×	△	×	×	×	○
Marks verb groups based on their inflection	○	○	×	○	×	×	×	×	○	○
Two labels for words that are adv. and na-adj	○	△	△	△	×	△	×	×	○	△
Marks Sino-Japanese nouns that can be verbs	○	○	○	×	○	○	△	○	○	○
Marks the transitivity of Sino-Japanese verbs	×	○	×	×	×	△	×	×	×	○

Japanese verbs, and one dictionary, (Japanese-Portuguese dictionary), had the transitivity labels for only some of the Sino-Japanese verbs. Finally, the two dictionaries that mark the transitivity of Sino-Japanese verbs also indicate the dual behavior of the Sino-Japanese verbs that can be used both as transitive and intransitive verbs.

#### 4. Discussions and suggestions

The survey on 10 existing bilingual Japanese dictionaries and their approach to presenting word classes revealed two serious problems. The first problem is the lack of word class labels or insufficient information on word class in the existing dictionaries. As noted in section 3, many dictionaries do not have word class labels for any or some of their entries. Obviously, word class labels are not the only mechanisms that provide grammatical information in dictionaries. Dictionaries can present grammatical information in other parts of an entry such as examples, though word class tags are the fastest and the most convenient way for a user to obtain grammatical information from an entry. Some other dictionaries provide word class tags only for some of the headwords, which can confuse language learners, especially those at elementary and intermediate levels.

Furthermore, in most of the dictionaries that use word class labels, the information presented in the labels tends to be insufficient in many aspects. For example, with respect to Japanese verbs, the ending of most verbs can indicate its word class. A word beginning with kanji and ending in hiragana *-ru* is very likely to be a verb. Thus, the label 'verb' might seem obvious or even redundant for most learners. Instead, what a language learner actually wants to know about a Japanese verb is its transitivity and inflectional group. Notwithstanding, only half of the consulted dictionaries mark the transitivity of verbs and only half of them indicate their grammatical groups.

One may argue that providing additional grammatical information in the word class section of dictionaries, particularly in paper dictionaries, may consume a large amount of space. However, the problem of space can be solved by adopting appropriate conventional abbreviations. For instance, instead of assigning the labels 'verb', or 'vb' or 'v' for a verb like *nom-u* 'to drink', a dictionary can use the label 'vt1' which stands for 'verb, transitive, 1<sup>st</sup> group'.

In fact, this study showed that the richness of grammatical information presented in the word class section of entries does not depend on the size of a dictionary. For instance, being a small pocket dictionary with only 7,500 Japanese headwords, Oxford-mini provides much more detailed grammatical information in its word class section than Kenkyusha which has long been the largest Japanese-English dictionary with more than 130,000 Japanese headwords. As a simple example, Oxford-mini uses the label 'vb1ga' for the verb *hatarak-u* 'work', which stands for 'group 1 intransitive verb' (the subject marker *-ga* in this dictionary indicates intransitivity). The same verb is

labeled ‘v’ in Kenkyusha, which merely indicates ‘verb’.

Another major problem with the dictionaries studied in this survey is their inconsistent approach to presenting word classes. This is most prominent in cases of dual membership of particular words in word classes. As can be seen in table 1, for the words that can be classified in more than one word class, many dictionaries use more than one word class label for some of the words, but fail to do so for others. For example, Oxford-mini dictionary assigns both labels ‘adverb’ and ‘adjective’ for the words *ippai*, *jūbun* and *wazuka*, but assigns only one label, namely, ‘adverb’ for other words of the similar group such as *pittari*, *zuibun* and *haruka*. All the six mentioned words have both ‘adverb’ and ‘*na*-adjective’ labels in Jisho.org.

One final remark regarding the survey done in this study concerns the way of presenting word class labels. The grammatical terminology adopted in teaching Japanese as a foreign language differs significantly from that adopted in traditional Japanese linguistics. As an example, traditional Japanese grammar divides verbs based on their grammatical behavior into two major groups, namely, *godan* verbs and *ichidan* verbs. Learners of Japanese language as a foreign language however, are more familiar with the terms “group 1 verbs” and “group 2 verbs” for these categories respectively.

In the same way, while the adjectives that end in *-na* when modifying a noun are called *keiyōdoushi* in traditional grammar, textbooks used for language learners mostly adopt the term *na-keiyōshi* ‘*na*-adjective’ for these words. This survey revealed that, for instance, Jisho.org uses the label ‘*godan*-verb’ for group 1 verbs, or Bonjinsha-Oxford uses the label “adj-v” for *na*-adjectives, which is obviously taken from the traditional term *keiyōdoushi*. Choosing appropriate labels for word classes largely depends on the target users of the dictionary, but adopting terms that are common in Japanese language education is a more ‘learners-friendly’ approach.

## 5. Conclusions

This study proposed four problems to be the major issues in presenting word class information in Japanese bilingual dictionaries and tried to analyze the approaches that existing bilingual dictionaries take to deal with these problem from the view-point of language learners. The main finding of this study was that most existing dictionaries do not provide sufficient information about the word class of words and that many of them do not have coherent and consistent approaches in presenting word class information.

The main suggestion of this study is that, bilingual dictionaries that target language learners should provide detailed grammatical information necessary for learners such as transitivity and inflectional group for verbs. They should take dual membership of words in grammatical categories into consideration and reflect this dual nature in word class section systematically and consistently.

Finally, bilingual dictionaries compiled for language learners should adopt grammatical terms and abbreviations that are common in the field of Japanese language education rather than the terms used in traditional studies of the Japanese language.

## 注

- 1) 山田小枝
- 2) 時枝誠記
- 3) 山橋幸子
- 4) 松下大三郎
- 5) 自他両用動詞

## References:

Atkins, Sue and Michael Rundell

2008 *The Oxford Guide to Practical Lexicography*, New York: Oxford University Press.

Boonmoh, Atipat and Hilary Nesi

2008 "A Survey of Dictionary Use by Thai University Staff and Students, with Special Reference to Pocket Electronic Dictionaries", *Horizontes de Lingüística Aplicada* 6(2): 79-90.

Bunt, Jonathan

2012 *Oxford Japanese Mini Dictionary 2nd Edition*, Oxford: Oxford University Press.

Cristofaro, Sonia

2009 "Grammatical Categories and Relations: Universality Vs. Language-Specificity and Construction-Specificity", *Language*.

Croft, William and Eva van Lier

2012 "Language Universals without Universal Categories", *Theoretical Linguistics*, 38(1/2), 57-72.

Croft, William

2001 *Radical Construction Grammar: Syntactic Theory in Typological Perspective*, Oxford: Oxford University Press.

Haspelmath, Martin

2007 "Pre-established Categories Don't Exist: Consequences for Language Description and Typology", *Linguistic Typology*, 11(1), 119-32.

Hosseini, Ayat and Behnam Jahedzadeh

2018 "The Status of Deverbal Nouns in Japanese Bilingual Dictionaries", *Frontier of Foreign Language Education*, 1, 83-96.

Jackson, Howard

2013 *Lexicography: an Introduction*, London: Taylor & Francis Routledge.

Jisho

2018 *Jisho (Online Japanese-English Dictionary)*, Retrieved from: <https://jisho.org/>.

Jorden, Eleanor

1987 *Japanese: the Spoken Language*, New Heaven: Yale University Press.

Kibbee, Douglas

- 1986 “The Humanist period in Renaissance Bilingual Lexicography”, In Reinhard Hartmann (ed.) *The History of Lexicography (Vol. 40)*, Amsterdam: John Benjamins Publishing, 137-146.

Kiefer, Ferenc and Piet Van Sterkenburg

- 2003 “Design and Production of Monolingual Dictionaries”, In Piet van Sterkenburg (ed.) *A Practical Guide to Lexicography*, Amsterdam: John Benjamins Publishing, 354-355.

Masuda, Koh (ed.)

- 2003 *Kenkyusha's New Japanese-English Dictionary (4th Edition)*, Tokyo: Kenkyusha.

The Japan Foundation

- 1993 *Basic Japanese-English Dictionary*, Tokyo: Bonjinsha-Oxford.

Van Lier, Eva and Jan Rijkhoff

- 2013 “Flexible Word Classes in Linguistic Typology and Grammatical Theory”, In Jan Rijkhoff and Eva Van Lier (eds.) *Flexible Word Classes: a Typological Study of Underspecified Parts-of-Speech*, Oxford: Oxford University Press, 1-30.

Varrók, Ilona

- 2015 *Japán-Magyar Nagyszótár [Japanese Hungarian Dictionary]*, Budapest: Japán Stúdiumok Alapítvány.

Wakisaka, Katsunori

- 2003 *Michaelis: Dicionário Prático Japonês-Português [Michaelis: Japanese-Portuguese Practical Dictionary]*, São Paulo: Aliança Cultural Brasil-Japão.

Yong, Heming and Jing Peng

- 2007 *Bilingual Lexicography from a Communicative Perspective, Vol. 9*, Amsterdam: John Benjamins Publishing.

瓜谷 良平 (監) ・宮本 博司 (編)

- 1979 『現代和西辞典』 大学書林、東京。

下位 英一 (編)

- 1996 『和伊辞典』 大学書林、東京。

重信 常喜ほか (編)

- 1995 『コンサイス和仏辞典』 三省堂、東京。

下大 三郎

- 1977 『増補校訂 標準日本口語法』 勉誠社、東京。

陳 伯陶 (編)

- 2005 『新時代日漢辞典 (修正新版)』 大新書局、香港。

時枝 誠記

- 1950 『日本文法 口語篇』 岩波書店、東京。

山田 小枝

- 1996 「品詞の普遍性と特殊性 ヨーロッパ言語の研究から一」 『国文学解釈と鑑賞 776 特集：品詞とは何か』 主文堂、東京、6-13。

山橋 幸子

- 2013 『品詞論再考-名詞と動詞の区別への疑問』 ひつじ書房、東京。

**Appendix 1: list of the words used in the survey.**

<b>na-adj</b>	<b>i-adj</b>	<b>na-adj+noun</b>	<b>adv+na-adj</b>
<i>akutibu-na</i> 'active' <i>chiisa-na</i> 'small' <i>hansamu-na</i> 'handsome' <i>iya-na</i> 'disagreeable' <i>kirei-na</i> 'clean' <i>komaka-na</i> 'fine' <i>okashi-na</i> 'strange' <i>omo-na</i> 'main' <i>ooki-na</i> 'big' <i>suki-na</i> 'favorite'	<i>chiisai</i> 'small' <i>hazukashī</i> 'ashamed' <i>hoshii</i> 'wanted' <i>ii</i> 'good' <i>kawai</i> 'cute' <i>komakai</i> 'fine' <i>nai</i> 'nonexistent' <i>okashī</i> 'strange' <i>ookī</i> 'big' <i>tsumaranai</i> 'boring'	<i>daiji</i> 'important' <i>genki</i> 'lively' <i>heiwa</i> 'peace' <i>jiyū</i> 'free' <i>kechi</i> 'stingy' <i>kenkō</i> 'healthy' <i>kiken</i> 'dangerous' <i>raku</i> 'comfortable' <i>shiawase</i> 'happy' <i>shinsetsu</i> 'kind',	<i>haruka</i> 'far off' <i>ippai</i> 'a lot' <i>jūbun</i> 'enough' <i>kanari</i> 'fairly' <i>kekkō</i> 'quite' <i>pittari</i> 'tightly' <i>taihen</i> 'very' <i>tashika</i> 'definitely' <i>wazuka</i> 'merely' <i>zuibun</i> 'very'
<b>Sino-Japanese</b>	<b>intrans</b>	<b>trans</b>	<b>trans+intrans</b>
<i>genryō</i> 'weight loss' <i>kaihō</i> 'opening' <i>kaitō</i> 'completing' <i>kakudai</i> 'expansion' <i>kanbi</i> 'equipped' <i>keizoku</i> 'continuation' <i>shukushō</i> 'shrinking' <i>shōshitsu</i> 'loss' <i>tenkai</i> 'development' <i>tenkai</i> 'rotation'	<i>ak-u</i> 'open' <i>ar-u</i> 'exist' <i>hajima-ru</i> 'start' <i>hatarak-u</i> 'work' <i>kie-ru</i> 'vanish' <i>moe-ru</i> 'burn' <i>nao-ru</i> 'cure' <i>nie-ru</i> 'boil' <i>suwar-u</i> 'sit' <i>tsuzuk-u</i> 'continue'	<i>age-ru</i> 'give' <i>ake-ru</i> 'open' <i>hajime-ru</i> 'start' <i>ka-u</i> 'buy' <i>kes-u</i> 'erase' <i>moyas-u</i> 'burn' <i>naos-u</i> 'cure' <i>ni-ru</i> 'boil' <i>tsukur-u</i> 'make' <i>tsuzuke-ru</i> 'continue'	<i>ayamar-u</i> 'mistake' <i>fure-ru</i> 'touch' <i>har-u</i> 'stretch' <i>hirak-u</i> 'open' <i>machiga-u</i> 'mistake' <i>owar-u</i> 'finish' <i>shikujir-u</i> 'fail' <i>sosog-u</i> 'pour' <i>tojir-u</i> 'close' <i>tomona-u</i> 'go with'