A Research of Grammaticality Judgment of Dative Shift by Japanese Learners of English Based on Optimality Theory

Masanori OYA, Norifumi UEDA, and Eiichiro TSUTSUI
(Waseda University)

This study examines the grammaticality judgment of dative shift by Japanese learners of English based on Optimality theory, in order to ascertain what kind of constraints of the learners' Interlanguage take effect in their grammaticality judgment, and how it changes along with the development of Interlanguage.

Nakano (1999) has examined that Korean and Japanese learners of English show similarity in terms of grammaticality judgment of dative shift in the framework of Lexical-Functional Grammar, and argued that the similarity reflects the similarity of the linguistic knowledge of both of them. Based on her analysis, this study examines the hypothesis that Japanese learners of English would judge dative-shift sentences as grammatical that are optimal in terms of the order of constraints in Japanese. As for the constraints, we apply the constraints advocated by Bresnan and Nikitina (2003), which state in principle that several properties of nouns (animate>inanimate, definite>indefinite, pronoun>noun, etc.) determine the order of nouns in double-object constructions. Moreover, we examine which constraints will take effect in the Interlanguage of Japanese learners of English and how the interaction of constraints changes along with the development of Interlanguage.

Since the study of Gropen, Pinker et al. (1989), dative shift alternation has attracted many researchers. This study tries to approach this issue from a different perspective, namely, Optimality theory (OT). Recently, OT has been applied to the field of syntax; OT posits that there are a number of violable constraints, and the order of these constraints differs from language to language. Language acquisition, from the viewpoint of OT, is to learn the order of constraints which is particular to the specific language. In this sense, Interlanguage can be interpreted as the result of the order of syntactic constraints which is different from that of native speakers'. The issue to be addressed here is what kind of constraints serves as part of the linguistic knowledge whose order yields the variation of specific languages.

As for dative shift alternations, there seems to be a number of constraints which are relevant to the validity of dative shift. For example, the indirect object of the double-dative construction in English must be an animate entity (John sent the message to New York / * John sent New York the message). However, Japanese does not have

such constraints, since the animacy of the indirect object does not affect the grammaticality of the sentence.   Rather, it can be argued that the constraint "the indirect object must be animate" does exist in the grammar of Japanese, but it is ranked lower than some other constraints.   In terms of OT, the ranking of constraints in English is different from that of Japanese, and Japanese learners of English must acquire the order of the constraints.

This study hypothesizes that there are the following constraints in the Interlanguage of Japanese learners of English based on Nakano (1999):

(1) Argument structure
(2) Constructions (to-dative constructions / double-object constructions)
(2) Subjecthood hierarchy (animate subjects are preferred to inanimate subjects)
(4) Influence from their native language
(5) Iconicity.

In the experiment, we had the subject of different levels of proficiency (college students, high school students, and junior high school students) judge the grammaticality of the sentences which have eight verbs (send, offer, report, explain, buy, reserve, open, design: these are used in (Nakano 1999)). The sentences are grouped into the following categories:

(1) Double-object construction: The subject is human.
(2) Double-object construction: The subject is institution.
(3) To-dative construction: The subject is human.
(4) To-dative construction: The subject is institution.
(5) Passive of (1)-(4).

It is expected that if the constraint "construction" has preference over the other constraints, i.e. the learners properly knows which verb allows which construction, then the learners judge the grammaticality of the sentences in the same way as native speakers do.   If the constraint "Subjecthood hierarchy" has preference over the other constraints in the Interlanguage of the learners, then the sentences in group (2) and (4) would not be preferred by the learners, regardless of the fact that these sentences are grammatical.   If the constraint "Influence from native language" has preference over the other constraints, then they would not prefer the double-object sentences whose verb has no Japanese counterpart in double-object construction.   If the constraint "Iconicity"

has preference over other constraints, then they would judge to-dative construction positively, since this construction is more iconic to the event the construction denotes.

The result shows that the order, or the strength, of the constraints differs from verb to verb. As for the verbs *buy, send* and *offer*, the constraint of construction is weak, and the order of constraints is 'Iconicity > Subjecthood'. As for the verbs *explain* and *report*, the result shows that the order of constraints is 'Construction > Subjecthood hierarchy'. As for *design* and *reserve*, the order is 'influence from their native language > subjecthood hierarchy'. Lastly, the verb *open* shows no order of constraints, suggesting that some other factors take effect in the grammaticality judgment of dative shift of this verb.

The result of this preliminary study opens the possibility to shed a new light on the field of second language acquisition based on the framework of OT syntax, and more researches in the same spirit are required to establish its claims.

References

Bresnan, J. and Nikitina, T.(2003). On the Gradience of the Dative Alternation. http://www-lfg.stanford.edu/bresnan/download.html

Collins, Peter. 1995. The indirect object construction in Englihs: an informational approach. Linguistics 33: 35-49.

Hye-Won Choi. 1999. Optimizing Structure in Context: Scrambling and Information Structure. CSLI Publications.

Nakano, M (1999). An Experimental Study of a Relationship between Lexical Functional Grammar and Learner-language Data. Selected Papers From AILA '99 Tokyo. Waseda University Press.