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YUSUKE MINAMI

THE SEMANTIC FLUCTUATION OF *PRETTY* ADJECTIVES*

1 INTRODUCTION

The purpose of this paper is to analyze the predicate adjectives in so-called *Pretty* Construction (= PC) from a cognitive perspective. To do this adequately, it is necessary to take *Tough* Construction (= TC) into consideration. In fact, PC has always been discussed in combination with TC because they share the structure (3a), as in (1a) and (2b). On the other hand, they have been distinguished since TC can be paraphrased into the structure (3b) while PC cannot, as (1b) and (2b) show:

(1) a. Mary is pretty to look at. (*Pretty* Construction)
b. *It is pretty to look at Mary.
(2) a. John is easy to please. (*Tough* Construction)
b. It is easy to please John.
(3) a. [NP be ADJ *to* inf. ϕ]
b. [*It* be ADJ *to* inf.]

In this connection, it has commonly been assumed that it is the predicate adjective (= ADJ) in the structure (3a) that decides whether or not the sentence is to be paraphrased into the structure (3b). Therefore, most linguists who examine PC and TC have divided the adjectives appearing in (3a) into PC type and TC type (henceforth, *Pretty* adjectives and *Tough* adjectives, respectively). The following is a sample of this type of classification (adapted from Yasui et al. 1974, Araki and Yasui 1992):

(4) a. *Pretty* adjectives: beautiful, delicious, fragrant, heavy, melodious, pretty, soft, tasty, etc.
b. *Tough* adjectives: comfortable, difficult, dangerous, easy, fascinating,

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hard, illegal, impossible, pleasant, simple, terrible, wonderful, etc.

The two classifications given above have caused a dilemma in the literature. The first one assumes that PC and TC are subsumed into a single category and fails to explain the difference indicated by the paraphrasing test given above (=**paraphrase problem**). The second one, in contrast, presupposes that PC and TC should be in totally different categories and leaves unclear where the boundary is (=**demarcation problem**). These two problems will be called "PC-TC problems" henceforth. The whole picture is summarized as follows:

(5) a. The analyses emphasizing identity faces the paraphrase problem.
b. The analyses emphasizing difference faces the demarcation problem.

Previous studies have taken either of the two positions and have always left some insufficiency. This point will be examined in the next section, where it will also be shown that previous studies have overlooked too many anomalous (yet actual) instances which explain the overall picture of PC and its adjectives. In fact, *Pretty* adjectives have a quite strange status; they are flexible and productive as well as unstable and non-standard. As will be discussed later, such a characteristic is due to a conceptual fluctuation that emerges in the intermediate region of the two conceptually contrastive prototypes.

In addition to considering predicate adjectives, it is essential for a satisfactory analysis to examine the **constructions** in which these adjectives occur. Besides (3a) and (3b), we deal with the construction of [NP be ADJ]. Henceforth, the three constructions will be abbreviated as in (6) for spatial economy:

(6) a. [NP be ADJ *to* Inf. φ] Construction = **NAIC**
b. [*It* be ADJ *to* Inf.] Construction = **IAIC**
c. [NP be ADJ] Construction = **NAC**

In section 3, after introducing my basic view on linguistic meaning and reconsidering the notion of **subjectification**, we will discuss adjectival meanings and present the notion of "distance" and propose a cognitive model to capture our property cognition and the way it is expressed linguistically. Section 4 goes ahead with the concepts introduced in section 3 and moves on to the full-dress analysis. Going over the meanings of NAC, NAIC, and IAIC, it will be demonstrated that NAC and IAIC correspond to the two opposing conceptual prototypes and NAIC has an intermediate and conceptually less prototypical status between them. Lastly, I claim that some anomalous instances of NAIC (i.e. some of the *Pretty* adjectives) are captured by subjectification process and its constraint. Section 5 will present concluding remarks.

2 PREVIOUS ANALYSES ON PC-TC PROBLEMS

This section reviews several preceding studies with regard to PC-TC problems and points out their inadequacies. In general, there are two opposing trends and I tentatively name them the "splitting" and the "continuum" approaches, respectively. The "splitting" approach focuses on the difference of PC and TC, and avoids the paraphrase problem at the expense of solving the demarcation problem. On the other hand, the "continuum" approach concentrates on the identity of PC and TC, and avoids the demarcation problem leaving aside the paraphrase problem. After going over these and their defects, I will claim that these seemingly mutually-contradictory positions share the same misconception: they both incorrectly assume that PC and TC are fixed and stable entities and treat only a limited set of examples. That is, neither of them accounts for the creative and fluid aspect of the phenomena in question.

2.1 The "Splitting" Approach

Solan (1979) conducted an experiment about the child acquisition of PC and TC with the result that TC tends to be acquired earlier than PC. From this result, he concluded that PC and TC are recognized in different ways and that these two constructions are entirely distinct. Based on Solan's findings, Kono (1984) and Asakawa and Miyakoshi (1996) explore the process of grammar acquisition from TC to PC. As far as the purpose of this paper is concerned, the details of their analyses need not be discussed. What is relevant here is that their argument presupposes that PC and TC are distinct. In this connection, Asakawa and Miyakoshi (1996) make a strong claim:

> ...the *Pretty* adjectives, unlike the easy-type adjectives, take as the external argument Theme designating an entity rather than an action.
>
> (Asakawa and Miyakoshi 1996: 137)

This assumption (AM assumption, henceforth) attributes to the predicate adjectives themselves the fact that PC cannot be paraphrased into IAIC while TC can. Thus AM assumption avoids the paraphrase problem. However, the boundary between these two constructions is not as clear as this assumption says. Take *delicious* for example (Solan 1979: 93). Although this word is usually regarded as a typical *Pretty* adjective (e.g. *The food is delicious to eat.*), it appears in IAIC once in a while, especially in literary texts. According to Solan's judgment, (7a) is much better than (7b), though it is somewhat marginal:

(7) a. It is delicious to eat ice cream in the summer.
b. *It is pretty to look at Mary in the afternoon. (Solan 1979: 93)

Solan comments on this that children might classify *delicious* as an *easy*-type predicate (= *Tough* adjectives, in our term). However, considering the fact that other

researchers have classified this adjective into the *Pretty*-type, such a conclusion is not realistic. Concerning this point, I suggest that contrary to AM assumption's expectation, there exist several adjectives that cannot be categorized in a dichotomous fashion into *Pretty* or *Tough* adjectives. They sometimes can appear in IAIC and sometimes cannot. In fact, *delicious* is one such adjective, and we can find other examples as below. In particular, it is noteworthy that even *pretty*, the representative of *Pretty* adjectives, belongs to this group (See 10):

(8) It was delicious to be close to Alain, to belong to him, to know that all the time she had been alone he had been thinking about her. (BNC)
(9) It is beautiful to go out in the morning and see the world waking up. (BNC)
(10) It was very pretty to see how he baffled himself, for in truth my body was full only of chills... (HTI)

From what has been discussed so far, we can conclude that the paraphrase problem cannot be attributed to what the predicate adjective is. AM assumption overlooks the fact that the meaning of a *Pretty* adjective may shift its distribution.[1] However, if they dispense with this assumption, a fatal problem remains: how on earth can we draw the line between PC and TC? Now that we have some adjectives which are both *Pretty* adjectives-like and *Tough* adjectives-like, we can no longer rely on the predicate adjectives themselves as a decisive criterion for the PC-TC classification. Then, the only way to make a PC-TC distinction might be to see whether or not each instance can be paraphrased into IAIC. But this does not make any prediction nor discuss any tendency or generalization, let alone capture subtle semantic nuance.

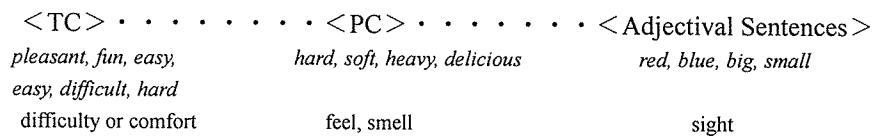
2.2 The "Continuum" Approach

Several cognitive linguistic studies such as Sakamoto (2001, 2002a, 2002b) and Shinohara (2002) argue that PC and TC are semantically (i.e. conceptually) connected. This idea is based on the working hypothesis that if the two sentences share the same structure, they are conceptually related in some respects no matter how different their meanings seem to be. For example, Sakamoto (2002a) gathers various instances shown below (= 11-16) and offers a gradient scale by positing typical TC and NAC at the opposing extremes, as in Figure 1:

(11) a. Mary is hard *(to please).
b. It is hard to please Mary.
(12) a. This cake is easy *(to cut).

[1] It may be possible to avoid this problem by setting two distinct meanings for one adjective. However, that will results in an extreme opportunism. In the similar spirit, Goldberg (1995) argues against such a lexicon-by-lexicon analysis and claims the necessity to analyze on the level of construction.

b. It is easy to cut this cake.
(13) a. This book is easy (to read).
b. It is easy to read this book.
(14) a. This suitcase is heavy (to lift).
b. *It is heavy to lift this suitcase.
(15) a. The baby's skin is soft (to touch).
b. *It is soft to touch the baby's skin.
(16) a. This flower is red (*to look at).
b. *It is red to look at this flower.



(adapted from Sakamoto 2002a:189)

<Figure 1>

Sakamoto also makes a brief yet interesting comment that in contrast to TC, the *to* infinitival verb of PC is easily predictable from the predicate adjective and omissible since the described action is conventionalized enough to be associated with the property designated by that adjective. Besides, Figure 1 implies that the meanings of *Pretty* adjectives generally correspond to physical or perceptual properties, though she does not directly mention that. In fact, this is a decisive lead for a further elucidation of our problems. I will return to this point in §4.3.2.

In line with Sakamoto's analysis, it will be demonstrated through the rest of this paper that the "continuum" view is more realistic than the "splitting" one. However, there are some defects in Sakamoto's analysis given above. First, she defines the behavior of *to* infinitival verbs in PC too narrowly. The following examples present her explanation with a considerable challenge (italics are mine):

(17) The skin was so *beautiful to touch* and the girl had such a beautiful face. (BNC)
(18) He does not have any scope for passion, it seems, and yet you are sweetly *soft to hold*, wonderfully submissive to kiss. (BNC)

As far as these instances are concerned, it is unlikely that *to* infinitival verbs can be omitted in the same way as those in (14) and (15). Furthermore, how can one decide whether the action of *touch* and *hold* are associated conventionally enough with *beautiful* and *soft*, respectively? Such a criterion must be arbitrary. In fact, as I discuss later, at least a few *Pretty* adjectives are more flexible than usually assumed and their selection of *to* infinitival verbs is nearly as flexible as that of TC, though the behavior of such adjectives is rather restricted depending on the environment in which they occur.

The second defect is that Sakamoto presents the examples which evoke the paraphrase problem, but says nothing about how that is relevant to her explanation. Or else, any IAIC counterpart of PC or TC might not make any difference to her analysis.

However, the latter is unrealistic, for Sakamoto presents such counterparts as in (11-16) as indicators of each adjective's positions on the scale in Figure 1.

As we have seen, the "continuum" approach avoids the demarcation problem by connecting PC and TC but leaves the question open why some *Pretty* adjectives are not possible in IAIC while *Tough* adjectives are (i.e. the paraphrase problem). Moreover, although it claims "continuum," it even does not give any answer to the question how or to what extent PC and TC are linked (or distinct).

2.3 Summary

This section has overviewed previous analyses and confirmed that they cannot solve *Tough-Pretty* problems at the same time. They focus on just one problem and miss the other (or even both). To overcome such a tough situation, we must make a radical conversion. For one thing, we should take into account actual instances that previous studies have not treated. By doing so, the actual behavior of *Pretty* instances proves to be occasionally much more flexible than has been usually assumed. Next, we should dig deeper into our conceptualization of the semantics of the adjectives in question and give more attention to the creative and fluid aspect of the linguistic phenomena. We will attempt to solve the PC-TC problems from such a standpoint.

3 BASIC CONCEPTS

3.1 On Linguistic Meaning and Prototypes

3.1.1 Linguistic Meaning and Conceptualization To start with, I would like to make a brief comment on linguistic meaning. For many functional linguists, especially for cognitive linguists, the most crucial tenet is that it is not any objective entity but conceptualization (or construal) that decides and completes the meaning of a linguistic expression. This idea is usually called conceptualism. Lakoff and Johnson (1980) make a straightforward statement in this respect:

> ...meaning depends on understanding. A sentence can't mean anything to you unless you understand it. Moreover, meaning is always meaning to someone. There is no such thing as a meaning of a sentence itself, independent of any people.
> (Lakoff and Johnson 1980/2003: 184)

In fact, linguistic meaning is **subjective** in nature. Still, one may argue against this idea by pointing out that certain kinds of meanings might be somewhat subjective, but that there certainly exists the absolute and objective true meanings that are equally

shared by everybody. However, in the spirit of conceptualism, even such "absolutely true" meanings are motivated by conceptualization. To be more precise, we conceptualize this type of meaning in the way that makes the meaning independent of any personal or subjective judgment. In this connection, Langacker (1990a, 1990b: Ch. 10, etc.) emphasizes that subjectivity (or objectivity) of linguistic meaning is often variable and *a matter of degree* (for example, Langacker (1999: Ch. 10) presents a fine-grained semantic analysis by applying the notion of **subjectification**. §3.2 will take up this notion in more detail). Therefore, as for the sentences saying God's truth or scientific truth and the like, their meanings are conceptualized most objectively (or least subjectively).

In connection with subjectivity of linguistic meaning, we should at this juncture focus on **construal**, which motivates various linguistic expressions in describing **single conceptual content** (Langacker 1990b: Ch.3). We have the ability to construe single conceptual content in various ways, and such different ways of construal directly correspond to different linguistic expressions. The following is one example of this:

> ... a speaker who accurately observes the spatial distribution of certain stars can describe them in many distinct fashions: as *a constellation*, as *a cluster of stars*, as *specks of light in the sky*, etc. Such expressions are semantically distinct; they reflect the speaker's alternate construals of the scene, each compatible with its objectively given properties. (Langacker 1990b: 61)

In this spirit, I adopt the idea that any linguistic **construction** has a schematic meaning, so to say, a "template," which corresponds to a specific construal of an event (cf. Goldberg 1995) and tentatively call this function **construal specification**.[2] Note that above all it is fairly likely that two alternative constructions correspond to single conceptual content. This situation is called the "alternations" of constructions (e.g. locative alternation, causative alternation, etc.). Concerning the phenomena in question, as many other studies, I argue that NAIC and IAIC are on such alternation terms. This will be examined further in §4.1.

Lastly, we would like to make a terminological clarification. From now, after the fashion of Langacker, in order to refer to speaker or language user, I use the term of "conceptualizer" (abbreviated to C henceforward).

3.1.2 Prototype-Based View of Linguistic Categories In common with many cognitive linguists (cf. Lakoff 1987 and *passim*), I adopt the **prototype view of categories**, whose essential argument is that the internal structure of a category is neither uniform nor simple, but rather complex, in that **the degree of attribution** to that category is different from member to member. That is, there exist relatively "good" members as well as "bad" members in a gradient fashion within a single category, and good members are regarded as the "prototypical members" in that category.

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[2] The term "construction" in this paper is intended to refer to be totally schematic: no slot is specified, though I do not deny the role of partially schematic constructions like [NP *be easy* to inf. ϕ].

Note that "prototypical members" are not the same as "prototypes." Regarding the definition of "prototype," I take the position that *no "prototype" manifests itself as an actual instance.*[3] In point of fact, one particular instance of a category might be "prototypical," but it is not the prototype itself. The "prototype" is, so to say, just a *schematic referential entity* in our categorizing process. A category's "prototype" is inevitably schematic in any actual instance that is to be categorized. For example, just try to imagine the "prototype" of the category "professor." You might immediately imagine a real person whom you have identified as a professor before. But is she/he the prototype? Of course, not. She/he is just a real instance of the category and just "prototypical." Still, every time you come across a new instance of "professor," you can easily judge to what extent the instance is "professor-like" and categorize it accordingly. Thus, "prototype" is the abstract yet focal point of knowledge that makes such judgments possible.

Last but not least, we should not mix up the category levels when identifying prototypes. It is often the case that the prototype in one category is not the prototype in another. Take English Middle Voice as an example. In analyzing the instances of Middle Voice, you may be able to identify the prototype of Middle Voice. However, if we think on the level of the concept "Voice" itself, Middle Voice is obviously less prototypical than Active Voice or Passive Voice. Along this line, §4.2 will propose that we should focus on not only the prototypes of each construction but also the prototypes on a conceptual level.

3.2 Subjectification and its Constraint

This section considers "subjectification," a controversial subject treated by researchers into semantic change, polysemy, and the like. Many linguists have been seeking the precise definition of this phenomenon and have presented many kinds (See Stein and Wright 1995). This paper, however, concentrates on Langacker's (1999) definition because it is the most compatible with the observation in section 4.[4]

Langacker (1999: Ch.10) defines subjectification in terms of **attenuation**. Simply put, his idea is that subjectification is the process in which C's subjective component is left behind when more objective or physical information gradually fades away. Note that the process is *gradual*, not *dichotomous*. For an illustration of this, considers the example of the preposition *across*. Going from (19a) to (19e), we can observe that objective movement is gradually attenuated and the subjective component (i.e. C's mental path) emerges accordingly:

(19) a. The child hurried across the busy street.
b. The child is safely across the street.

[3] Taylor (2003: 64) calls this view "the prototype-as-abstraction approach."

[4] Traugott (1989, 1995) explores subjectification in relation to grammaticalization. Although Langacker and Traugott seem to share the basic principle that C's subjective component increases, I favorably adopts Langacker's because his own concept "attenuation" is suggestive of the restrictive aspect of subjectification, to which I will refer below.

c. You need to mail a letter? There's a mailbox across the street.
d. A number of shops are conveniently located across the street.
e. Last night there was a fire across the street.

(Langacker 1999: 301)

Admittedly, Langacker's concept is on the right track, nonetheless I suggest that at this juncture we should ask why sentences like (19a) is not interpreted in a subjectified meaning while the others are. In fact, this might be too ubiquitous for us to notice, but we conceptualize things according to the principle of (20):

(20) When there is some entity which is objectively perceivable, the subjective component (= C's involvement) is constrained by that perceptual content.

Many cognitive linguists have paid considerable attention to how meanings are extended, and subjectification is one notion stemmed from such an activity. However, they did not consider in any detail the restriction of semantic extension. From this viewpoint, Langacker's definition of subjectification should be reinterpreted as follows:

(21) The more salient the objective component is, the more constrained the subjective component is.

In 4.3.2, I will demonstrate that the restrictive aspect of subjectification is essential to explain certain linguistic phenomena. It will be illustrated how the restriction of subjectification brings about the phenomena introduced in the previous section.

3.3 From "Distance" to a Gradience Model

This section briefly introduces the notion of "distance," which helps us understand the variety of the properties designated by predicate adjectives. Some adjectives describe the target object in a quite autonomous fashion (i.e. without any salient relation to other entities) while others do so only with reference to such relations (e.g. involving some specified action). In point of fact, some adjectives can take as their Subjects[5] not an entity but a relation. At the opposite extreme, there are some that can never take any relation as their Subjects. Interestingly, some adjectives have an intermediate status in this respect. Therefore, I will propose a cognitive model that captures such a situation in a *gradient* fashion.

3.3.1 What Is "Distance"? First, let us think about the "distance" of property. Actually, this notion is a kind of metaphor, inspired by Vendler's (1967) insightful

[5] Henceforth, I use "Subject" to mean the sentential subject.

observation on the adjective' non-uniformity. Through his intuitive comparison between *good* and *yellow* he concludes that *good* is more "remote" from the described objects than *yellow*:

> ...the adjective *good* is more remote from the grammatical subject than adjectives like yellow or round. As we realize that ascribing the predicate *good* to a subject is more complex and less immediate move than, ascribing the predicate *yellow*,...
> (Vendler 1967: 173; underline is mine)

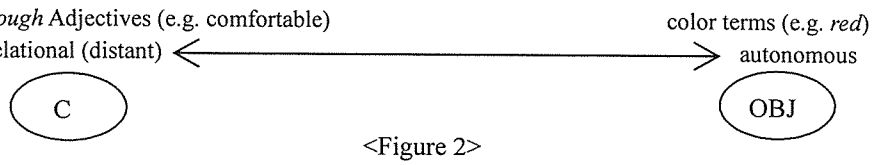
Vendler was probably aware that how directly a property is attributed to the target object differs according to the nature of that property and he described that with the word "remote." Moreover, he says that some adjectives are conceptually connected with some action through which the designated properties can be properly recognized. This point is made clear by comparing *red* and *comfortable*:

> ...What emerges here is that while redness is attributed to a thing directly, being comfortable is attributed to it only with respect to an appropriate action involving that thing. (Vendler 1967: 175; underline is mine)

Langacker (1995, 1999: Ch. 11) makes a more advanced remark on this issue. Accepting that prototypical meaning of adjectives is an intrinsic physical property (cf. Croft 1991), he also considers less prototypical adjectives which saliently involve some other entities other than the target object or some interactive process in relation to the target object. In his view, *Tough* adjectives belong to the latter, less prototypical pattern.

> Adjectival properties occupy the full spectrum of possibilities in regard to how saliently they invoke the conception of other entities. Reference to other entities is relatively non-salient with adjectives (...) that designate inherent physical properties such as size, shape, and color. Toward the opposite extreme, however, adjectives like *cooperative*, *shy*, *visible*, and *user-friendly* describe properties that focus precisely on interactions with other entities. (...)
>
> Ultimately, I believe that most if not all adjectival properties are best characterized with respect to some activity or process involving the entity ascribed the property — what varies is how specific and how salient that process is.
> (Langacker 1999: 353; underlines are mine)

Since Langacker's explanation above evokes a scalar image, I also use this image for expository purpose. Let us suppose a "spectrum" in his sense with physical property adjectives like *red* placed one end and *Tough* adjectives at the opposite end. This scale, in combination with Vendler's observation, is roughly sketched in Figure 2 and the notion of distance is defined in (22).



<Figure 2>

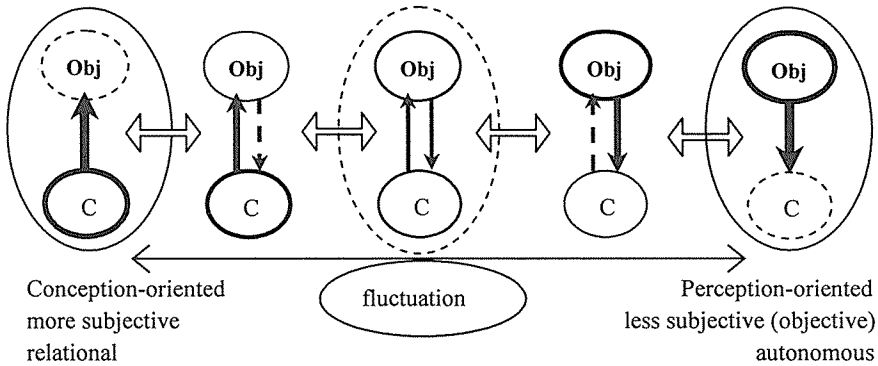
(22) The more conceptually "distant" from the target object the property is, the more readily it is related to some relevant action or entities other than the target object.

In this Figure, C is placed at the opposite end of OBJ. This is because the low autonomy (= high relationality) of a property means that that property is more C-based. In brief, in terms of cognitive salience, these two aspects are found in inverse proportion to each other.

3.3.2 The Gradience Model of Property Cognition In this section, I propose a cognitive model that underlies adjectival meanings in relation to the target object. On the basis of the argument that adjectival meanings and the notion of "distance" in 3.3.1, I argue that human cognition of an entity's property consists of a two-way process: perception process plus projection process. Through the perception process, as it were, C "receives" the property information from the entity as the object. Through projection process, on the other hand, C "gives" his/her evaluations to the target object, with the result that the object comes to "possess" them as its property. Note that although the two processes both motivate property cognition, the balance of their cognitive salience varies, depending upon what sort the property is.

The model of these two processes is schematically sketched in Figure 3. This shows the variation of relationship between C and the object described. The arrows connecting these two participants represent the two processes given above. The thickness of the circles labeled C and Obj and that of the arrows between them stand for the degree of cognitive salience. The eclipses indicate the idealized prototype status of perception and projection processes, respectively.[6] I attached "idealized" to emphasize that these are in a way quite unrealistic situations because no cognition is possible without either of these two processes, to be exact. Even so, it is also true that we are able to conceptualize *as if* only one of the two were realized independently of the other, and I hold that as mentioned in § 3.1., it is such a *conceptualization*, not a scientific "precise" reality, which actually motivates linguistic expressions.

[6] Note that the "prototype" I mean here is *conceptually* defined one. This type of prototypes should be differentiated from prototypes based on linguistic constructions. This issue will be revisited in §4.3.



<Figure 3>

Now, recall the notion of "distance." Within the present model, an adjective's conceptual distance from the object entity is represented iconically: the more leftward a concept is, the more "distant" it is from the target object. Take again the example of *red* and *comfortable* (§3.3.1). In this model, again the conception of *red* is placed more rightward than *comfortable*. This is because being comfortable is C's feeling in a strict sense while being red is usually looked upon as inherent in the target entity (i.e. it is regarded as practically independent of any conceptualization).

Lastly, the important point to note is that even one single concept designated by one word sometimes *fluctuates* in its position on this scale, depending on the context where it appears. I claim that such a fluctuation tends to be stronger in the intermediate region than around endpoints. In fact, some of the adjectives that appear in NAIC, especially *Pretty* adjectives, correspond to such an intermediate position and fluctuate considerably on this scale. This "fluctuation" will be explicated more in the next section from the perspective of **subjectification** and its restraint.

4 THE ANALYSES FROM A COGNITIVE PERSPECTIVE

This section is devoted to solving the PC-TC problems. §4.1 overviews the meanings of the three relevant constructions in terms of construal specification. In §4.2, I will claim to distinguish between **construction-specific prototypes** and **conceptual prototypes**, and describe the correlation between the conceptual and constructional categories. Finally, in §4.3, I will solve the *Tough-Pretty* problems mentioned in section 2 by investigating in finer detail the role of **subjectification** as well as the factor that constrains it.

4.1 Constructions as Construal Specification

In the beginning, let us examine the meanings of the constructions of our concern. As

I mentioned in §3.1.2, I adopt the idea that a construction is, so to speak, a mold which schematically specifies a certain construal of C. We have already mentioned three types of constructions in §3.3.2: NAC, IAIC, and NAIC. In what follows, we overview these one by one and consider their meanings in terms of construal specification.

First, let us look at NAC. This is a kind of typical and basic construction whose function is to describe some property of the Subject entity in the simplest way. Such simplicity of the structure represents "capturing a thing as it is" in an iconic fashion. Therefore, regarding predicate adjectives, this construction is especially tailored to adjectives whose concepts are relatively "less relational" or "autonomous," as in (23). This is why "relational" adjectives that evoke some interactive action in relation to other entities (e.g., *necessary*, *easy*, etc.) often are possible in NAC only conditionally; there must be some contextual support (Compare (24) and (25). Thus, it can be concluded that NAC is most "self-fulfilled" in its informativity when a prototypical entity (i.e. physical entity) is designated by the Subject and prototypical property by predicate adjective, respectively. In short, since the construal specified by NAC is to see things "just as they are" with the least conceptual manipulation by C, semantically relational expressions are not as compatible with this construction as the ones which designate color, shape, etc.

(23) a. Her hair is blue.
b. This stone is round.
(24) a. ?The book is necessary.
b. ?Volkswagens are easy.
(25) When it comes to fixing them, Volkswagens are really easy.
(adapted from Langacker 1999: 325)

Next, let us consider IAIC. First of all, there is no doubt that this construction differs from NAC in that the Subject's designatum is NOT a simple thing but a more abstract thing, i.e. an action-involved *relation* conceptualized as an entity. Therefore, the ascribed property can never be inherent in the entity that the Subject designates. Compare the sentences in (26):

(26) a. The book was wonderful. (NAC)
b. It was wonderful to meet her. (IAIC)

In (26a), the Subject designates an entity, "the book," which can be identified as it is. However, the same does not hold for the entity designated by Subject in (26b), "to meet her." The action of meeting someone is identified only through C's conceptual operation: conceptualize an action event as if it were a reified entity. Thus, the picture is reversed in comparison to NAC. Relatively less relational adjectives do not fit here while relational ones are favorably accepted. Compare (27) and (28) (See also 23 and 24):

(27) a. *It is red to look at the car.
b. *It is round to see this window.

(28) a. It is easy to please John.
b. It is necessary to read the book.

Let us move on to NAIC. Interestingly, the construal motivating this construction has a sort of *intermediate status* between IAIC and NAC. It maintains the independence of the entity designated by the Subject while making the predicate relational by *to* infinitive accompanying the predicate adjective. First, let us consider the relationship with IAIC. Some linguists argue that this construction is motivated by, so to say, the "re-construal" of the construal motivating IAIC (Shinohara 1993, Langacker 1995/1999, Nishimura 2002). Broadly, the Subject of this construction is picked out from the whole action-involved event a participant as an entity that makes a crucial contribution to the cognition of property designated by the predicate. For example, take the following pair:

(29) a. It is difficult to read the book. (IAIC)
b. The book is difficult to read. (NAIC)

In (29a), the property "difficulty" is ascribed to the whole event. (29b) might share conceptual content with (29a), but unlike (29a), a single entity "the book" is picked out and "difficulty" is ascribed to it. According to Nishimura (2002) and some others, sentences like (29b) are created with a kind of metonymic inference like, "if reading a book is difficult, it is probably because the book's content is difficult." Thus, it is concluded that these two constructions are, to a certain degree, connected conceptually (metonymically, maybe) as well as structurally.

Next, let us turn our attention to the relationship between NAC and NAIC. As mentioned above, sometimes *to* infinitives in NAIC is omitted with the result that apparently the adjectives which usually appear in NAIC become the instances of NAC as in (30) (See Langacker 1995, 1999 Ch. 10 for further details). Added to this, it is often argued that since *Pretty* adjectives are originally used in NAC, *to* infinitival verbs in PC can be omitted frequently, as in (31).

(30) a. Portraits are tough (to paint). (Langacker 1999: 325)
b. This puzzle is difficult (to solve).
(31) a. Its fur is soft (to touch).
b. Mary is pretty (to look at). (Sakamoto 2001: 77)

Thus, the form and meaning of NAIC is, as it were, vacillating between the two extremes of IAIC and NAC. The discussion above is summarized in Table 1:

	IAIC	NAIC	NAC
Subj	complex (relational)	simple (non-relational)	simple (non-relational)
Pred	simple (relational)	complex (relational)	simple (non-relational)

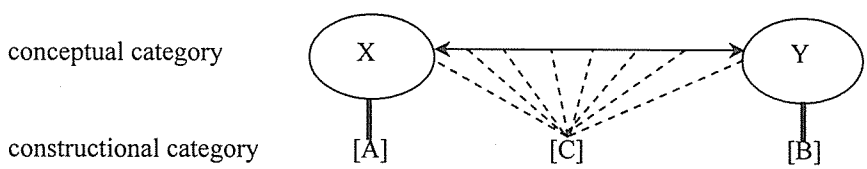
<Table 1>

4.2 The Conceptual Categories of IAIC, NAC, and NAIC

4.2.1 The Issue of Prototypes Cognitive linguistic studies have explained various linguistic phenomena based on the prototype view of categories. To account for the PC-TC problems, several cognitive linguists (Shinohara 2002, Sakamoto 2001, 2002a, Yonekura 2004, etc.) have unanimously jumped at a conclusion that *Tough* instances are basic or prototypical ones from which *Pretty* instances are extended. This might not be incorrect. Indeed, it is fairly easy for us to recognize a structure and assume that it has its own prototype category structure. As is mentioned in §4.1, each linguistic construction specifically corresponds to a certain concept.

However, it still remains unclear how NAIC is connected with other constructions. As already indicated in §4.1, it is well known that many *Tough* adjectives appear in both IAIC and NAIC, (and even in NAC with some appropriate contextual support). This is why the alternation relationship between IAIC and NAIC has been made much of in the literature. Cognitive linguists do not have any positive reason to discard such an intuition, even though they reject the idea that expressions with different structures can share exactly the same meaning. How can we capture this phenomenon properly?

To break this deadlock, I propose that we should distinguish **construction-specific prototypes** from **conceptual prototypes** in applying prototype-category analysis to linguistic phenomena. Construction-specific prototype is, as it literally says, recognized on a constructional basis. If there are three constructions A, B, and C, each of these has its own prototypical instance P_A, P_B, and P_C. It is this type of prototype that previous cognitive researchers have considered. However, by taking conceptual prototypes into consideration, it follows that a construction-specific prototype is not always a prototype on the conceptual level. For instance, in addition to the constructions A, B, and C, let us take the conceptual opposing prototypes X and Y. Then suppose that A designates X and B designates Y, but C designates both of them, but less directly than A or B. The situation is roughly sketched below.



<Figure 4>

Now let us consider our data in Figure 4. First, [A] and [B] correspond to IAIC and NAC, respectively. These constructions correspond to the opposite extremes of the gradience model in §3.3.2. NAIC, in contrast, corresponds to [C]. In fact, NAIC is *not conceptually prototypical* even though it has its own constructional prototype. As suggested in §4.1, NAIC is conceptually "straddling" between NAC and IAIC; its instances are likely to be diverse and context-sensitive in comparison with the others.'[7]

[7] Interestingly, as is mentioned in §3.1.2, NAIC's position between NAC and IAIC is somewhat parallel

4.2.2 Conceptual Prototypes of the Phenomena Involving Tough and Pretty Adjectives
In this section, I attempt to place various adjectives on the scale of the model introduced in §3.3.2. To begin with, let us look at the conceptually prototypical instances. At the left end, there are instances such as (32). The predicate adjectives of these sentences designate inherent physical properties like shape or color, which are the "nearest" to the target object and are hardly affected by C's subjective construal. In fact, they are compatible only with NAC and cannot be accompanied by *to* infinitives, let alone they do not appear in IAIC (for similar discussions, see Lasnik and Fiengo 1974, Sakamoto 2002a, 2002b and Shinohara 1993).

(32) a. This window is {square/round/rectangular} (*to look at).
b. This flower is {red/blue/purple} (*to look at).

At the opposite extreme are placed adjectives like *necessary*, *significant*, *normal*, etc. In contrast to the case above, the property-concepts that these adjectives designate are not at all inherent in any entity, but rather they are *purely conceptual* ones (i.e. totally dependent on C's subjective judgment, or the most "distant"). Thus they are compatible only with IAIC as (33-35) show.[8]

(33) a. *John is necessary to convince.
b. It is necessary to convince John. (Yasui et al. 1974: 239)
(34) a. *This paper is significant to finish.
b. It is significant to finish this paper. (ibid.)
(35) a. *This dress is normal to wear in such a case like this.
b. It is normal to wear this dress in such a case like this. (ibid.)

Lastly, we must consider the tough case: *Tough* and *Pretty* adjectives. Although it is clear that these adjectives are placed on intermediate region between the two extremes identified above, their distribution is more complex than the prototypical ones (See Figure 4). As discussed earlier, these two types are not discrete but are distributed continuously whereas there exists a remarkable discrepancy between them. The next section explores this point, taking into account subjectification and its restraint which were briefed in §3.2.

4.3 The Semantic Fluctuation of Pretty *Adjectives*

This section explores the problematic instances presented in section 2. Based on the

to the Middle Voice between the Active Voice and the Passive Voice. As Yoshimura (2001) points out, the instances of Middle Voice are frequently regarded as sloppy or not normal, yet quite productive and highly context-sensitive.

[8] One may doubt this argument because these adjectives can appear in NAC. But recall the discussion of NAC in §4.1, where it is argued that without proper contextual modulation, relational adjectives are not likely to appear in NAC.

working hypothesis in §3.1.1 that linguistic meaning consists in conceptualization (or construal), I argue again that there exists no "objective" meaning in the strictest sense, and that some expressions are more subjective and others are less subjective in a relative fashion. From the most general perspective, the former are content words and the latter are function words. My concern is, however, in a much more subtle dimension: e.g. even among content words of the same class, semantic subjectivity is different from one word to another. Concerning the phenomena in question, *Tough* adjectives are more subjective and *Pretty* are less subjective, even though they are both categorized into the "adjective" class and occur in NAIC.

The present approach is a continuum-based one, but the conventional "continuum" method has yielded little because scant attention has been paid to the restrictive aspects of the phenomena in question. In fact, while it has always been emphasized that the schematic connections between the instances of *Pretty* construction and those of *Tough* construction, what hinders a *Pretty* adjective from becoming an authentic *Tough* adjective has been seldom examined.[9] In what follows, we go over not only the driving force that allows some original *Pretty* instances to behave as if *Tough* instances, but also the "restrictive" aspect that keeps such usage somewhat peripheral, and finally resolve both the demarcation and the paraphrase problems.

4.3.1 Driving Force toward Tough *Adjectives: Subjectification* I propose that subjectification, in the previously defined sense, gives rise to the seemingly peculiar instances for conventional analyses. Such instances can be largely divided into two types: (A) IAIC within which a *Pretty* adjective appears, and (B) [NP be *Pretty* Adjective to inf.] construction, whose *to* infinitival verb is less predictable than is usually assumed. I will investigate these one by one.

First, let us consider the (A) type. I assume this phenomenon involves "subjectification" in Langacker's (1999) sense. That is, the physical information disappears and only emotional evaluation of C is left behind. Consequently, a *Pretty* adjective originally designating a concrete entity's physical property comes to be used to predicate something more abstract (i.e. action-involved relation). To put it more precisely, C repeatedly perceives the physical property of something frequently with some feeling or emotional evaluation and tends to establish a strong link between a physical property and some specific feelings. It is this mental linkage that enables one to evoke a specific property analogically when having the feeling similar to the one related to that property, even if the property itself is not actually and physically perceived. Thus, we can conclude as follows:

(36) The trigger of subjectification which enables *Pretty* adjectives to appear in IAIC is some psychological (= emotional) reaction that C experiences in perceiving some physical property.

To confirm the validity of this analysis, look at the case of *delicious*. In (51a), there is obviously an actual sensory information of good taste which co-occurs with (or causes) some positive feeling of C. Meanwhile, in (51b), such a "real" physical

[9] Shinohara (1993) touches on this point briefly, though no practical analysis is presented.

perception being lost, only some positive feeling of C is left behind and given cognitive salience.

(37) **sensory information (= taste)** + C's positive emotion
(*The food is delicious to eat.*)
↓
~~sensory information (= taste)~~ + **C's positive emotion**
(*It was delicious to be close to Alain, to belong to him, ...* (= 8))

Next, let us move on to (B) type. Although subjectification again causes this phenomenon, it does so in a more subtle way than in the first. Since things are happening apparently in the same construction, it is very difficult to draw a fine line between the original usage and the extended one. Therefore, this type requires more careful observation than the first one. Take (38) and (39), for example (boldface is mine):

(38) a. The food is **delicious to eat**.
b. The food was beautifully presented and **delicious to enjoy**.
(WC: http://www.danieletdaniel.ca/danieletdaniel/o/Testimon1.html)
c. They are safe to store on ice in a cooler, and are **easy and delicious to prepare**. ("They" designates food.)
(WC: http://www.norbest.com/d_selecting_a_turkey.cfm)

(39) a. Mary is **pretty to look at**.
b. These flowers are **pretty to make leis with**. (Schachter 1981: 447)
c. ...this system can be fairly **pleasant and pretty to work with**.
(WC: http://experienceart.org/cleath/docs/oldhome01/eaaboutold)

The instances in (38) and (39) are ordered along the subjectification process of *delicious* and *pretty*, respectively. In (38a) and (39a), the meanings of the predicates are the most original, that is to say, the least subjectified. At the next stage, as shown in (38b) and (39b), the predicates are a little subjectified: *to* infinitival verbs are more dependent on C's selection than before.[10] Yet those selected verbs certainly designate the actions that are relevant to the physical properties of predicated entities; we can access the property "delicious" by enjoying the food, and we can access the property "pretty" by making leis with these flowers, though these actions are not connected with the properties as directly as those of (38a) and (39a) (*enjoy* is vague compared with *eat*, and *make lies with* is roundabout as against *look at*).[11] At the final stage,

[10] I assume that *to* infinitives overtly represent C's involvement in identifying the property designated by the predicate adjectives. Look at the following example. Accompanied by *to look at*, the property *pretty* is more C-based than it is in sentences like *Mary is pretty to look at*, producing a concessive nuance.

(i) And though the cottage was pretty to look at, it was rather poky inside... (BNC)

[11] One may doubt this explanation by pointing out that the meaning of *pretty* in (39b) undoubtedly involves some sight information and we cannot reach this property only by "making lies." My argument is, however, that since *pretty*, in an original sense, conceptually presupposes some visual action like seeing, looking at, watching etc., such an action frequently remains covert linguistically. In other words, some

however, even such accessibility itself becomes attenuated. Consider (38c) and (39c). Is it possible for us to access the property "delicious" of some food by preparing it, or to access the property "pretty" of some system by working with it? Both are not, at least in the same manner as those instances above. It is also noteworthy here that the predicate adjectives of (38c) and (39c) are coordinated with typical *Tough* adjectives like *easy* or *pleasant*. I hold that this is not a mere coincidence but rather suggestive in two respects. First, it is not impossible that through subjectification, *Pretty* adjectives can semantically come very close to *Tough* adjectives. Second, the semantics of *Tough* adjectives are basically more "subjective" and "distant" than *Pretty* adjectives.

All the observations above tell us that it does not make much sense to seek a rigid demarcation between *Tough* and *Pretty* adjectives. What actually counts is that these adjectives become sometimes far more similar than the "splitting" approach has assumed, and that typical *Tough* adjectives are relatively subjective and "distant" in nature as compared to *Pretty* adjectives. Thus, the demarcation problem is dissolved by taking subjectification into account.

However, we must admit that the analysis above does not give a solution to the paraphrase problem. For example, it is left open why (40a) is impossible while (40b) is possible. What stops subjectification from making (40a) possible?

(40) a. *It is pretty to look at Mary.
b. It was very pretty to see how he baffled himself, for in truth my body was full only of chills... (= 10)

On top of that, such peculiar usage of *Pretty* adjectives as in (40b) remains highly context-sensitive. But why? The only clue available for now is that *Pretty* adjectives can be radically subjectified while *Tough* adjectives are originally more "distant" and placed more leftward on the scale in §3.3.2 than *Pretty* adjectives. The following section tackles this challenge by reconsidering the "constraint" on the subjectification process (§3.2).

4.3.2 Constraint on Subjectification: Physical-Domain Priority Now that we have seen how *Pretty* adjectives are subjectified and have dissolved the demarcation problem, let us shift the emphasis to the paraphrase problem. Recall the essence of the problem by the following pair. An instance of TC can be paraphrased into IAIC while that of PC cannot:

(41) a. John is easy to please.
b. It is easy to please John.
(42) a. Mary is pretty to look at.
b. *It is pretty to look at Mary.

---

action involving vision is conventionalized enough to make instances like (39b) possible. Of course, I am aware that this discussion might be inconsistent (39a). If my argument is valid, (39a) must be excluded due to its redundancy. In fact, some native speakers hesitate to accept this kind of sentences for that reason. However, sentences like (39a) are found in actual text, discourse, etc. At present, I claim that this situation be attributed to the fact that sentences of this kind are highly context-dependent (see also footnote 10). For the reason of space this issue is not taken up here but will be examined elsewhere.

As pointed out in section 2, however, this cannot simply be attributed to the lexical information of the predicate adjective *pretty* since this word is not always incompatible with IAIC. Now the question is why (42b) is impossible while instances like (43) are possible.

(43) It was very pretty to see how he baffled himself, for in truth my body was full only of chills... (= 10)

As a start toward the trick behind this phenomenon, let us compare *Tough* adjectives and *Pretty* adjectives more closely. As Sakamoto (2002a) also indicates (See Ch.2, Figure 1), it is easy to notice that the meaning of each *Pretty* adjective clusters around the concept of "physical perception" (e.g. *pretty* for sight, *delicious* for taste, *soft* for feeling, etc.) This is a remarkable divergence from *Tough* adjectives. In point of fact, a simple test presents us with a stronger conviction of this point. Compare:

(44) a. Mary looks pretty.
b. Mary is pretty to look at.
(45) a. This book looks easy.
b. This book is easy to look at.

Let us begin with (44). These two sentences mean almost the same thing, or at least they go more or less in the same direction: Mary's prettiness manifests itself through her appearance. However, the picture dramatically differs in (45): *easy* in (45a) means "easy to read or understand" whereas that of (45b) means "comfortable to the eyes." This leads us to conclude that at least in this environment *pretty* specifies the action related to visual perception as the means toward the property it designates, while *easy* specifies some action only schematically (= not specifically) (Langacker 1995, 1999). This discrepancy is generally true of other instances of PC and TC, though they will not be examined here for the reason of space.

Thus, I argue that *Pretty* adjectives are domain-specific as compared with *Tough* adjectives: they specify the domain of "physical perception" fairly rigidly. At this juncture, recall the argument on subjectification in §3.2, where the constraint on the subjectification process was emphasized. The main point was that the subjectification process is constrained when **perceptible physical component** exists (§3.2; (20)). Then it could be easily inferred that typical instances of PC cannot be paraphrased into IAIC because many of them specify some physical-perception domain (vision, taste, etc.) and subjectification is restricted.

Now we can reason that *Pretty* adjectives like *beautiful* are possible in IAIC *only if subjectification is not constrained by specific physical domain.* To see how such a situation is possible, look closely again at the instances in this regard (boldface is mine):

(46) It's beautiful to see something coming alive gradually... (BNC)
(47) It is beautiful to go out in the morning and see the world waking up.

(= 9)

(48) It was very pretty to see how he baffled himself, for in truth my body was full only of chills... (= 43)

(49) It was delicious to be close to Alain, to belong to him... (= 8)

Note that as for all these instances the conceptualized event is so long and complex that it is hardly possible to pick out a particular entity and attribute the physical property to it. Actually, none of these sentences can be paraphrased into NAIC. Take (47) for example. The two distinct events are designated by the *to* infinitival clause. For the reason given above, the domain of physical property is tenuously activated. Accordingly, as for the meaning of *beautiful*, the aspect of visually perceived quality is attenuated and then the C's comfortable feeling is left behind. Consequently, concerning the phenomena in question, the restraint of the *Pretty* adjectives' subjectification is summarized in (50). And note also that (51) is logically reasoned from (50).

(50) If a specific entity can be identified and picked out, within the whole conceptual content, as the source of the physical property originally designated by the predicate *Pretty* adjective, the subjectification is constrained and that adjective is compatible with NAIC, not with IAIC.

(51) If the condition of (50) is not the case, subjectification is promoted and the *Pretty* adjective creatively becomes compatible with IAIC, not with NAIC.

In this connection, it is also worth noting that even as for *Tough* adjectives, it sometimes happens that only IAIC is possible and NAIC is excluded. Consider (52):

(52) a. It is easy to see why Elizabeth feels this way, and needs a lot of tact and patience to cope with what she perceives as her husband's unreasonable childishness. (BNC)

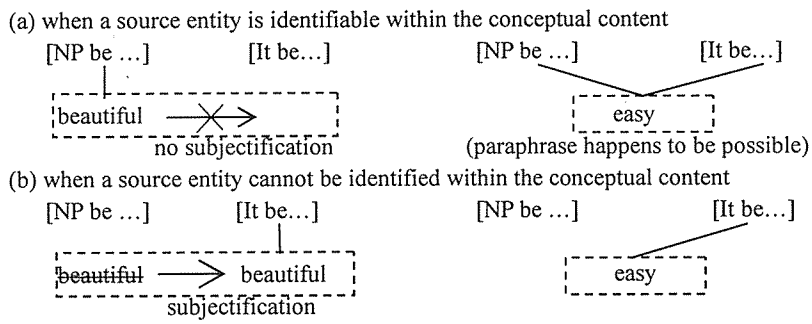
b. It is not always easy to avoid writing a shade smugly about the arrangements Mozart made of choral works by Handel. (BNC)

It is obvious that these sentences can never be paraphrased into NAIC. For each instance, the conceptual content described in *to* infinitival clause is too complex for C to ascribe "easiness" to a single thing within it. The only difference from the case of *Pretty* adjectives is that subjectification does not need to function so much here because *Tough* adjectives are relatively domain-schematic in nature compared to *Pretty* adjectives.[12] Therefore, it is concluded that the paraphrasing relation between NAIC and IAIC is not perfectly operative even when *Tough* adjectives fill in their ADJ slots.

The essence of the discussion above is sketched below, taking *easy* and *beautiful*

[12] Langacker (1995, 1999: Ch. 10) indicates the schematic nature of *Tough* adjectives, though he does not say anything about less schematic cases like *Pretty* adjectives or other types of adjectives that occur in NAIC, except for a quite general comment on adjectives as a whole, which was cited in §3.3.1.

for the respective examples of *Tough* and *Pretty* adjectives. The crucial point is that the meaning of *beautiful*, unlike that of *easy*, fluctuates from a domain-specific meaning to "subjectified" domain-schematic meaning, which eventually caused the problem for previous studies:

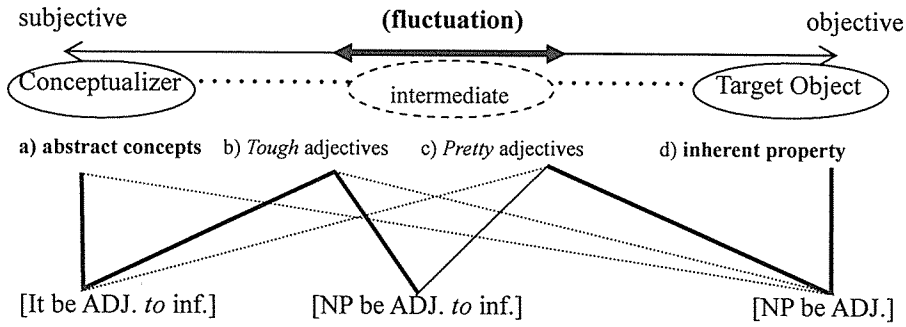


<Figure 5>

In fact, both of these two instances dealt with here are quite typical kinds in relation to the phenomena relevant to the present study. In reality, far more various patterns are observed: some *Pretty* adjectives like *heavy*, *soft*, etc. specify the physical domain much more rigidly (i.e. free of subjectification) and seldom appear in IAIC. Some of the adjectives like *expensive* that are usually categorized as a *Tough* adjective seem to be so biased to NAIC that the paraphrase is not as successful as *easy*. To provide a fuller description of the phenomena, more details must be discussed. At any rate, we have revealed what motivates the anomalous behavior of *Pretty* adjectives in relation to NAIC and IAIC and dissolved the PC-TC problems.

4.4 Summary

This section reviews the main arguments of this section with some illustrations. First, to capture the continuous relationship between the three constructions, I proposed to take into consideration not only prototypes of each construction, but also prototypes across constructions (i.e. conceptual prototypes). Figure 6 is the overall sketch of this analysis. On the upper line, conceptual categories are described, based on the model in §3.3. On the lower, linguistic constructions are placed. These two levels are connected by lines, which represent the correspondences between them. Thickness of each line reflects the closeness of connection (i.e. compatibility) between a concept and a construction.



<Figure 6>

(53) some examples of the categories (a-d) (the boundary between (b) and (c) is not clear)
(a) imperative, important, necessary, normal, etc.
(b) difficult, hard, easy, tough, simple, straightforward, dangerous, safe, expensive, cheap, comfortable, pleasant, interesting, etc.
(c) pretty, tasty, sweet, beautiful, soft, heavy, fragrant, etc.
(d) blue, red, round, square, rectangular, etc.

Second, I demonstrated how PC-TC problems are solved at one by considering the process of subjectification and its restraint. In sum, subjectification process makes the instances of PC and TC continuous while its constraint keeps them distinct. The whole process is summarized as follows:

(54) The Subjectification Process of *Pretty* Adjectives

Perceptual Information (= pure perception process) (possible in NAC)

↓

i) Some specific (default) action connected with certain perceptual property is expressed. (appear in NAIC) (= 38a, 39a)

↓

ii) The actions toward the perceptual property become less specific and more up to C's subjective selection. (appear in NAIC and the selection of *to* infinitival verbs becomes more flexible) (= 38 b-c, 39 b-c)

← [constraint] source entity of perceptual information is unidentifiable or impossible to pick out

↓

iii) The perceptual property is almost purely created by C. (appear in IAIC) (=46-49)

5 CONCLUDING REMARKS

In this paper, I have looked into *Pretty* adjectives' somewhat strange behavior and

attempted to capture the problems regarding PC and TC. First, I have gathered broader examples which call into question the analysis that clearly splits TC and PC on a word-by-word basis. Second, I have claimed that the three constructions of NAC, NAIC, and IAIC are conceptually related and pointed out the relationship between IAIC and NAIC which conventional continuum-based approach has overlooked.

In the actual analysis, I have focused especially on the conceptualization that underlies the meanings of predicate adjectives in these constructions. To capture the meanings of predicate adjectives, I presented a gradience model that explains how we conceptually organize various kinds of properties. In brief, the less directly the property designated is connected with the target object ascribed, the more C-based that property is. The main point is that the three constructions and the property conceptualization represented by the model given above are in close correlation. NAC is most compatible with the adjectives designating the property that is completely domain-specific and inherent to the object without C's involvement in it. IAIC favorably accepts the adjectives designating the property that is completely abstract created by C's conceptual manipulation. These constructions roughly correspond to the two opposing prototypes of the gradience model. NAIC, in contrast, corresponds to the intermediate region between those prototypes. Therefore, it is quite imaginable that some adjectives acceptable in NAIC "fluctuate" on the scale between the two focal natures of, so to say, "totally object-based" and "totally C-based." In this connection, I have argued that some *Pretty* adjectives are placed on such an interface-like region and subjectification functions therein conditionally.

This paper has stuck to the following three basic conceptions, to which others sometimes do not pay enough attention. The first is that it is important to allow for the conceptual dimension in linguistic phenomena. It is often the case that by considering our underlying conceptualization, seemingly separate facts turn out to be connected. Such connected facts form "conceptual categories," each of which has its own prototype that functions as focal points for linguistic coding (Croft 2001: Ch. 3). My ultimate goal is to reveal the structure of such categories concerning property cognition, not only in English but also in other languages.

The second is the need to think beyond a single construction and explore the relationship across the constructions. Goldberg (1995) proposed such a view by examining so-called argument structure constructions, in which verbs play a significant role. My hypothesis is that exactly the same thing is also true of certain kind of adjectival constructions that have been dealt with throughout this paper.

The third is that though language is flexible and fluid in nature, the change is not random but properly restricted. To be sure, the correspondences of conceptual categories and linguistic constructions are not fixed but changed and extended, not only diachronically but also synchronically, at C's disposal. This especially holds for expressions regarding C's sense, feelings, emotional evaluation, etc. However, such a move is not limitless but somewhat restricted. §4.3.2 is a rudimentary step to elucidate such a restrictive aspect of semantic extension.

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