Complex Image Schemas

Aleksander Szwedek
Adam Mickiewicz University, Poznań, Poland
szwedek@wa.amu.edu.pl

Abstract

In my earlier papers (Szwedek 2018 and 2019), I refuted the almost universal view (e.g. Clausner, Croft 1999), that the image schema cannot be defined. I first proposed to follow Grady's (2005) general recommendation that the image schemas which would be "too general to be associated with any particular type of perceptual experience, or too rich to count as fundamental dimensions of perceptual representation" (2005: 35) should be ruled out. I argued (Szwedek 2018) that the fundamental perception is that of density experienced only by touch and the only entities whose density is experienced by touch are physical objects. Following Johnson 1987 and Langacker 1987, I proposed that the only independent entities in this world are physical objects with innumerable relations among them. I argued that if there are conceptually dependent relations, they must be relations between or among independent entities. I then concluded that the only conceptually independent object schemas constitute the basis of the formulation of a definition of the image schema and against all the pessimistic views he proposed the following definition: "The IMAGE SCHEMA is a mental structure with at least one OBJECT image schema, which is a conceptually independent entity representing a physical object whose fundamental property is density experienceable by touch, with ensuing boundedness, shape, size, etc." (Szwedek, 2019: 20). While my 2018 paper discusses simple image schemas, the present paper shows, on the example of ENABLEMENT, that they can also form complexes expressed by one word.

Keywords: OBJECT image schema; image schema; density; subordinate relation; ENABLEMENT.

Streszczenie

Złożone schematy wyobrażeniowe

W swoich artykułach (Szwedek 2018, 2019), odrzuciłem powszechny pogląd (np. Clausner i Croft 1999), że schematy wyobrażeniowe nie mogą być zdefiniowane. Po pierwsze zaproponowałem przyjąć ogólną rekomendację Grady'ego (2005: 35), żeby wykluczyć schematy wyobrażeniowe, które byłyby zbyt ogólne aby mogły być kojarzone z jakimkolwiek doświadczeniem percepcyjnym, albo zbyt szczegółowe, aby można je było zaliczyć do fundamentalnych wymiarów reprezentacji percepcyjnej. Dalej stwierdziłem, że podstawową właściwością przedmiotów jest gęstość doświadczana jedynie przez zmysł dotyku, a jedynymi bytami, których gęstość można doświadczyć są przedmioty fizyczne. Za Johnsonem (1987) i

Langackerem (1987) zaproponowałem, że jedynymi pojęciowo niezależnymi bytami w naszym świecie są przedmioty fizyczne z niezliczonymi relacjami między nimi. Stwierdziłem także, że jeżeli istnieją pojęciowo zależne relacje, muszą być one relacjami między niezależnymi pojęciowo bytami. Następnie wyciągnąłem wniosek, że jedynymi pojęciowo niezależnymi schematami wyobrażeniowymi, które stanowią podstawę do sformułowania definicji schematu wyobrażeniowego, i wbrew powszechnej, pesymistycznej opinii, że takiej definicji nie da się sformułować, zaproponowałem następującą definicję: „Schemat wyobrażeniowy to struktura mentalna z przynajmniej jednym schematem wyobrażeniowym PRZEDMIOTU, który jest pojęciowo niezależnym bytem reprezentującym przedmiot fizyczny, którego fundamentalną właściwością jest gęstość doświadczalna przez dotyk, z wynikającymi z tego faktu takimi właściwościami jak granice, kształt, wielkość, itd.” (Szwedek 2019:20). Podczas gdy w artykułach z 2018 i 2019 r. omawiałem proste schematy wyobrażeniowe, niniejszy artykuł, na podstawie przykładu ENABLEMENT – ('umożliwienie') opisuje złożony schemat wyobrażeniowy wyrażony w języku pojedynczym leksemem.

Słowa kluczowe: Schemat wyobrażeniowy OBIEKTU; schemat wyobrażeniowy, gęstość, relacja podrzędności, UMOŻLIWIENIE.

1. Introduction

In my earlier papers (Szwedek 2018 and 2019), I refuted the common pessimistic opinion that the image schema cannot be defined. I quoted Clausner and Croft (1999) as holding that "[o]ne can define image schematic domains only by enumeration" (1999: 21), and Grady (2005) who left the identification of what an image schema is to an individual "scholar's understanding" (Grady 2005: 37). However, at the same time, Grady constructively proposed general guidelines as to what the image schema should be like, ruling out "certain schemas that are too general to be associated with any particular type of perceptual experience, or too rich to count as fundamental dimensions of perceptual representation" (Grady 2005: 35). As I pointed out "[w]heras the first criterion eliminates what Clausner and Croft (1999: 14) call nonimagistic domains, such as THOUGHT, DEATH and TIME etc. which lack images (cf. Lakoff and Turner (1989: 94ff)), the borderline at the other end remains vague" (Szwedek 2018: 58).

Building on Grady's proposal of delimitations, I (Szwedek 2018, 2019) proposed to found the description and the definition of the image schema on the OBJECT image schema, the only independent mental structure, based on the fundamental, primeval experience of touch of density of its physical referents, with ensuing boundedness and other properties.

Following Langacker's (1987) division into 'things' and 'relations', and partly Johnson's (1987)[1] "parts and relations", I divided all image schemas into those referring to objects and those referring to relations. Langacker (1987) argued that 'things' are conceptually independent

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[1] Similar in their general conception, though different in some respects.

while 'relations' (temporal and atemporal) are conceptually dependent. Though my use of the term 'object' differs from Langacker's 'thing'[2] in that the category OBJECT includes only physical objects (if Grady's condition of 'perceptuality' is to be met), I concluded that objects are the only conceptually independent entities, while relations are conceptually dependent on the objects. For example, conceptualization of any relation, temporal or atemporal, necessarily involves objects. Thus, MOTION necessarily involves a MOVING OBJECT, that is, in other words, there is no motion without a moving object. Likewise, the atemporal relation OVER necessarily involves two objects.

With these distinctions in mind, following Grady's delimitations, I (Szwedek 2019) suggested that the only entity, which meets Grady's criterion of a minimal perceptual experience is the OBJECT in the most general sense with only one universal perceptual feature – density, the fundamental and indispensible property of all objects. This property, I claimed, is experienced by touch only, the most elemental and primeval of all senses (for details, see Szwedek 2000 and my later works, including 2018 and 2019). If objects are the only independent entities in the world, necessary components of all relations, then it is appropriate to base the definition of the image schema on those independent elements. As has been observed by many linguists (e.g., Langacker 1987), objects can be organized in a hierarchy, part of which Langacker illustrated with the following chain: TOOL – HAMMER – CLAW HAMMER with the subsequent comment: "[CLAW HAMMER] has a fairly precise shape specification, and [HAMMER] quite unspecific in regard to shape", and [TOOL] "is quite nonspecific in regard to shape." (Langacker 1987: 135).

The top part of the hierarchy of objects[3] could look as shown in Fig 1. (after Szwedek 2019: 21):

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[2] "The definition of a thing is abstract. It makes reference not to physical objects but rather to cognitive events" (Langacker 1987: 183).

[3] 'THING' in the diagram stands for "INORGANIC THING" in parallel with the standard interpretation of 'reification' in the basic model of the Great Chain of Being. Again, Langacker uses 'reification' in a different sense (though note that all linguists use the formula 'X IS AN OBJECT', not 'X IS A THING' (e.g. 'THOUGHT IS AN OBJECT', not 'THOUGHT IS A THING').
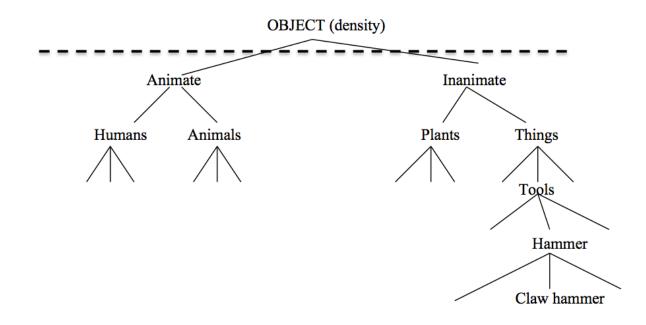
Fig. 1. The top part of the hierarchy of objects

The broken line cuts off, in concord with Grady's (2005) postulate, the schemas that are "too rich to count as fundamental dimensions of perceptual representation" (Grady 2005: 35). Entities that are not objects (nonimagistic in Clausner and Croft's terms (1999: 14) are absent from the hierarchy[4], and objects below that line are too concrete in the sense that their properties are not universal, for example 'walking, running, crawling', etc. require animacy, so inanimate objects would be excluded.

On this basis, I formulated (Szwedek 2019: 20) a definition of the image schema repeated here for the reader's convenience:

The IMAGE SCHEMA is a mental structure with at least one OBJECT image schema, which is a conceptually independent entity representing a physical object whose fundamental property is density experienceable by touch, with ensuing boundedness, shape, size, etc.

Such a definition could be objectively used to limit the number of image schemas without leaving the decisions to individual "scholar's understanding" (Grady 2005: 37).

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[4] They are, then, subject to what I (Szwedek 2000 and later works) called OBJECTIFICATION (different from Langacker's interpretation of the term; see Langacker 1990), that is, conceptualization in terms of physical objects, for example, scattered, fleeting, racing thoughts, to collect thoughts, etc.

2. Some examples[5]

Some of the most frequently mentioned image schemas in the literature (cf., for example, Hampe 2005: 2-3) are those of LINK/CONTACT, PART OF, SURFACE OF, MOTION, FORCE and BLOCKAGE and DIVERSION (Szwedek 2018). One of the differences among those schemas is the distinction into static and dynamic relations (Szwedek 2018: 63). Thus LINK/CONTACT, PART OF, SURFACE OF have no motion element in them while the others imply motion. Though less frequently mentioned and only in passing, but fundamental and the simplest of all the image schemas is the OBJECT schema, represented by a simple circle.[6]

Fig. 2. The OBJECT image schema

Of the static relations some of the more frequently mentioned schemas are PART OF and SURFACE OF and CONTACT and LINK (the latter of which I consider a more complex subtype of the former), to give just a few examples.

Fig. 3 The PART schema

Fig. 4. The SURFACE schema

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[5] The section is based on the discussion presented in Szwedek 2018.
[6] As Langacker remarks, diagrams "are not to be identified per se as image schemas […], but are merely intended to evoke them and suggest their nature." (2008: 32, fn. 6). He adds that "[a]n imagistic approach is no less capable than a propositional one […]. It is arguably advantageous because […] the nature of a mental experience is reflected more directly in a complex image than in a complex formula." (2008: 32–33).

Fig. 5. (left) The CONTACT and (right) LINK schemas

Among the dynamic image schemas, some of the most often listed are MOTION, FORCE, BLOCKAGE and DIVERSION, again just to mention a few for illustration.
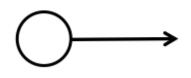

Fig. 6. The MOTION schema (the white circle is neutral as to the source of energy)

Fig. 7. The FORCE schema (the black circle is the energy source)

Fig. 8. The BLOCKAGE and DIVERSION schemas

It is worth mentioning that the nominal forms of dynamic image schemas require the preposition 'OF' (MOTION OF, FORCE OF, BLOCKAGE OF, DIVERSION OF, etc.) entailing the

accompanying OBJECT. These can be expended propositionally into *object X moved, object Y* [7] *exerted force on object X, object X blocked object Y,* or *object Y diverted object X.*

3.   The structure of image schemas

The examples above show that those schemas are relatively simple, with one OBJECT image schema like the OBJECT schema itself, or, either "intransitive" like MOTION, or "transitive" like BLOCKAGE or DIVERSION. They can be treated as 'simple image schemas'.

However, the image schematic status of some domains like ENABLEMENT, listed among other image schemas (for example, Johnson 1987; Hampe 2005), has been questioned by Peña (1999) and Oakley (2007).

Peña observed that "ENABLEMENT is but a logical entailment of it [REMOVAL OF RESTRAINT], rather than an independent schema." (1999: 198). Oakley argued that "[a]t present, I see no widespread agreement on these matters, especially regarding the exact number of image schemas or even regarding the question whether some of the items appearing on Johnson's authoritative list, such as ENABLEMENT, are bona fide image schemas" (Oakley, 2007: 222).

Peña's and Oakley's doubts reaffirmed the dissonance between Johnson's (1987) diagrammatical representation of ENABLEMENT and its interpretation. His diagram of ENABLEMENT looks very simple – a double, broken line arrow.

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Fig. 9. Johnson's ENABLEMENT schema

However, Johnson's interpretation is much more complex. He distinguishes two elements of ENABLEMENT, "a potential force vector and the absence of barriers or blocking counterforces" (Johnson 1987: 47), which we feel as the "power (or lack of power) to perform some action, for example, the power to pick up the baby…" (Johnson 1987: 47)[8]. What is striking is that the diagram lacks a symbol for the potential energy source object, the one that

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[7] Where Y is to indicate the energy source object, and X a neutral object, though it is obvious that both objects must have some energy.

[8] An OED example shows that ability need not have a human or animate agent: 2006 *Wired* Nov. 65/1 "The ultimate insulator must be light, strong, and, of course, able to withstand trial by fire."

has "the power" to act[9]. Furthermore, the phrase "an absence of barriers" makes that absence irrelevant, because an absence of barrier is simply characteristic of ABILITY only. It is significant that in his example "you feel able to move a chair", Johnson himself uses the word 'able', not 'enable'. While "I feel able to move a chair" is perfectly correct, 'I feel enabled to move a chair' is not. Thus, his diagram and the interpretation point rather to the ABILITY schema whose diagram below has the essential elements – an object and the potential action, symbolized by a broken arrow.
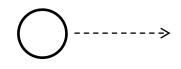

Fig. 10. The ABILITY schema

Disregarding Oakley's loose query (Oakley 2007: 222), we see that both Johnson's and Peña's interpretations are similar in that they refer to two separate phenomena: removal of a barrier and a resulting ability.

Asking how, then, "we should interpret and represent ENABLEMENT", I (Szwedek 2018) discussed the following examples illustrating the use of the lexical item 'to enable'. Examples (23) – (26) show that syntactic structures with 'to enable' are either complex transitive – S enables DO (direct object), OC (object complement), or monotransitive – S enables DO." (2018: 70).

"(23) *The surgery on his knee enabled him to walk again.* (BNC)

(24) *The director has been a great mentor and I'm grateful for the places he's enabled me to go.* (BNC)

(25) *a new train line to enable easier access to the stadium.* (OLD)

(26) *funds that will enable construction of new schools.* (OLD)" (Szwedek 2018: 70).

I observed that

"[i]n those examples

a) the grammatical subjects represent activities with implied agents (surgeon's action, donor's giving funds, engineer building a train line), or an agent with implied activity (the director's help),
b) the subjects of the *to*-infinitive OC clause are animate (*him*, *me*),

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[9] It has to be added that the source of energy can be either direct (animate) or indirect, as in (26): Somebody provided funds which enabled construction of new schools.'

c) the DOs in (25) and (26) (*access*, *construction*) represent activities with implied agents: *a new train line to enable people to access the stadium*; *funds that will enable investors to construct new schools*" (Szwedek 2018: 71).

Finally, I concluded that the ENABLEMENT image schema consists of two otherwise simple schemas – REMOVAL OF RESTRAINT and ABILITY, in complex (subordinate) relation, where ABILITY is the result of the REMOVAL OF RESTRAINT. For example, in (23), the patient wasn't able to walk because of a 'restraint" in his knee, and regained the *ability* after the 'restraint" had been removed. Thus, the ENABLEMENT schema (Fig. 12) consists of two simple schemas – REMOVAL OF RESTRAINT (Fig. 11) and ABILITY (Fig. 10) in a complex (subordinate) relation.
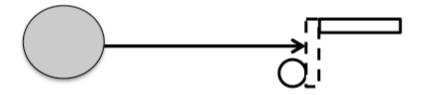
Fig. 11. REMOVAL OF RESTRAINT schema[10]
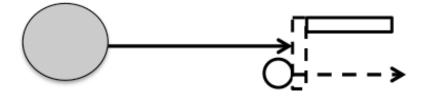
This complex image schema is shown in Fig. 12

Fig. 12. ENABLEMENT schema

What is interesting here is that two simple independent schemas form one conceptual gestalt expressed by one lexical unit.[11]

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[10] The grey circle represents the implied agent
[11] On conceptualization and verbalization see Mandler (2005): "Image-schemas are not themselves accessible […], but they structure the concepts that can be brought to mind either in the form of images or words" (2005: 140).

4. Conclusions

The nature of the image schema has for long been the subject of intense, thorough discussions without, however, reaching definite conclusion of what counts as the image schema. The proposed lists (e.g., Johnson 1987; Hampe 2005) have been fairly stable and consistent, but the questions of criteria and definition of the image schema remained unanswered, not even seriously investigated. Characteristic is Clausner and Croft's (1999) assertion that image schemas can be defined by enumeration only, and Grady's (2005) pronouncement that the image schema identification should be left to an individual "scholar's understanding" (Grady 2005: 37).

In my 2018 and 2019 papers, I solved the problem by proposing a plausible definition which satisfies Grady's (2005) conditions that on the one hand the simple image schema must not be "too general to be associated with any particular type of perceptual experience" and on the other hand must not be too rich to count as fundamental dimensions of perceptual representation" (Grady 2005: 35).

Since some linguists (e.g., Peña 1999; Oakley 2007) questioned the image schematic status of ENABLEMENT which was listed by Johnson (1987) and by many other linguists (in Hampe's 2005 volume), the present paper proposes to analyze it as a complex image schema[12] consisting of two simple image schemas – REMOVAL OF RESTRAINT and ABILITY in a subordinate relation. In the case of ENABLEMENT it would be a subordination of reason: *X was able to happen because a restraint had been removed*. Whether there are other complex image schemas and what their nature could be, is a subject yet to be investigated.

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[12] Not to be confused with Kimmel's (2005) compound image schemas.

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Corpora

BNC – The British National Corpus
OLD – The Oxford Learner's Dictionary