Husserl on Meaning, Grammar, and the Structure of Content

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Abstract: Husserl's Logical Grammar is intended to explain how complex expressions can be constructed out of simple ones so that their meaning turns out to be determined by the meanings of their constituent parts and the way they are put together. Meanings are thus understood as structured contents and classified into formal categories to the effect that the logical properties of expressions reflect their grammatical properties. As long as linguistic meaning reduces to the intentional content of pre-linguistic representations, however, it is not trivial to account for how semantics relates to syntax in this context. In this paper, I analyze Husserl's Logical Grammar as a system of recursive rules operating on representations and suggest that the syntactic form of representations (both mental and linguistic) contributes to their semantics because it carries information about semantic role. I further discuss Husserl's syntactic account of the unity of propositions and argue that, on this account, logical form supervenes on syntactic form. In the last section I draw some implications for the phenomenology of thought and conjecture that the structural features it displays are likely to convey the syntactic structures of an underlying language-like representational system.

1. Representations, Rules, and Recursion

In the *Logical Investigations* Husserl sets out the idea of a logical grammar as a theory intended to explain how complex expressions can be constructed out of simple ones so that their meaning turns out to be determined by the meanings of their constituent parts and the way they are put together.[1] Husserl's argument here mirrors the Fregean argument for compositionality. Since expressions have a determinate meaning, it must be possible to break down the meaning of complex expressions into a finite number of primitive units whose form is simple, so that infinitely many complex forms can be constructed out of these units according to corresponding combinatorial laws (Husserl 1975, pp. 244-245; 1984, p. 303, 342 ff.). A theory of such "essential structures of meanings" will state the primitive forms and the "operational laws" according to which indefinitely complex constructions can be obtained by iterating the application of a finite number of rules to a finite number of simple forms (Husserl 1984, pp. 337, 339-340, 344-345).

Husserl thus characteristically claims that meanings are structured entities, whose structure depends on the syntactic properties of their formal arrangement, rather than on semantic properties intrinsic to the lexical content of words. The relevant laws tell us how to build the meaning of complex expressions out of "syntactic stuffs falling under definite categories […] in the realm of meaning […] according to syntactical forms which are

[1] In the following, Husserl's works are cited according to the *Husserliana* edition, with the exception of Husserl 1939. The corresponding pages of the English translation are indicated for longer quotations.

likewise fixed *a priori*" (Husserl 1984, p. 329)[2]. A major issue thus lies in accounting for how meanings are given a syntactic structure and how syntax turns out to yield semantic effects. This is far from trivial, as on Husserl's intentional semantics linguistic meaning is identical with the intentional content expressed by the relevant meaning intention, where intentional contents are "ideal" content types instantiated by conscious mental events, and meaning intentions are designed to express the intentional content they instantiate (Husserl 1984, pp. 43-44, 102; see also Simons 1995; McIntyre, Smith 1982; Smith 1987). In the next sections, I will confront these issues in some detail. In the present section, I consider Husserl's view of grammar as a universal system of recursive syntactic rules operating on semantic representations.

Different concepts of representation occur in the *Logical Investigations* under different labels. The German *Räpresentation* refers in a first, restricted sense to the representational content of token mental states – what Husserl otherwise calls the matter of "concrete" acts, which is responsible for the intentional relation they bear to objects (Husserl 1984, pp. 474-475, 520, 414-415). Acts here are conceived as phenomenally conscious episodes of believing, desiring, perceiving and the like, each consisting in a relation between a psychological attitude—the act's *quality*—and an instantiated "sense" that makes for their intentional content—the act's *matter* (Husserl 1984, pp. 425-431, 621). While senses *per se* are content types that are invariant across times and persons,

[2] The English edition has the German "Stoff" routinely translated with "materials", which is also used at times for the German "Materie" (e.g. Husserl 1984, p. 328, Engl. Transl., vol 2 p. 63). To avoid confusion I constantly translate the first as "stuff" and the second as "matter".

their instances are taken to be real moments of token mental states (Husserl 1984. pp. 431-433). The notion of representation as matter is thus designed to mark off representational *contents* only, as opposed to representational vehicles.

Husserl in fact distinguishes between the representational content of acts and the representational vehicles by which they are carried, which makes for the second notion of representation found in the *Logical Investigations*. In order for a representational content to be phenomenally instantiated as an act's matter, a sensible "carrier" [*Träger*] is required, so that representational contents can occur as couched either in the sensory format of intuitive acts or in the symbolic format of signitive acts, according to the relevant "form of apprehension" [*Auffassungsform*] (Husserl 1984, pp. 620-622, see Klev 2013). The German *Räpresentant* is used in this context to refer to representational vehicles:

> Each concretely complete objectifying act has three components: its quality, its matter, and its representative content. To the extent that this content functions as a purely signitive or purely intuitive representative [*Råpresentant*], or as both together, the act is a purely signitive, a purely intuitive, or a mixed act. (Husserl 1984, pp. 620-621, Engl. Transl., vol. 2, p. 242)

The coupling of representational contents and vehicles finally makes for the general concept of representation Husserl refers to and is marked off in this context by the phrasing *Räpresentation schlechtin* (Husserl 1984, p. 621). In this latter sense, the concept relates to representational contents as carried by either a sensory or a symbolic

vehicle in a complete act, whose quality specifies the attitude under which the content is entertained:

Eventually, a further notion of representation occurs in this connection under the label *Vorstellung*, which relates to objectifying acts as the primary bearers of matter. Representations in this sense are acts, whose quality merely consists in entertaining a representational content – as opposed to engaging in believing, desiring, or any further attitude. Since matters can only occur in connection with a quality, in fact, there must be acts whose function is just to convey the matter to which ordinary attitudes like belief and desire can possibly relate. Beliefs, for instance, can only take a propositional matter as their content insofar as the relevant proposition is entertained, which requires, on this view, a prior *act* of representing that takes the same proposition as its matter without committing to belief (Husserl 1984, pp. 471-472, 514-515). Representations here are individuated by quality and count as fundamental because they are complete acts, whose functional role is making contents available for psychological processing. This notion of representation is therefore relevant to the present context only indirectly. What is crucial here is the general notion of representation connected with the view that intentional matters make for the representational content of acts.

On this reading, representations count as mental particulars that supply acts with phenomenally instantiated contents and, therefore, serve as the ultimate groundings for their intentionality (Husserl 1984, p. 624). Meaning intentions just express as linguistic meaning the representational content their matter instantiates by connecting it with an external symbol (Husserl 1984, pp. 105-106). As logical grammar is taken to operate on

meanings, its syntax is thus designed to affect the structure of content, not just linguistic expressions.

Husserl in fact conceived logical grammar as a "pure morphology of meaning" that makes for the lower level pure logic and is designed to perform a threefold task: to specify the categories under which meanings are subsumed by virtue of the syntactic structures they are embedded into, to specify the laws governing their combination into well-formed wholes, and to specify the laws governing their possible transformations (Husserl 1975, pp. 244-245, Husserl 1984, pp. 337-338, see Edie 1977, pp. 145-146).[3] These laws count as grammatical in that they attach to the syntactic forms under which matters fall. Yet they govern "the existence and non-existence of meaning", since combinations conforming to them yield a "unified meaning", while other combinations will result in a meaningless collection of unrelated semantic units (Husserl 1984, pp. 337-338). In particular, sub-propositional contents only merge into propositions according to the grammatical laws governing the syntactic forms that shape nominal and predicative

[3] Husserl's notion of *Modifikation* differs from Carnap's transformation rules, as it does not concern the relation of consequence, while it is consistent with the Chomskian notion of transformation, as it accounts for how the syntactic form displayed by the surface structure of sentences can result from grammatical transformations applied to more elementary syntactic structures – what Husserl calls syntactic stuffs (Edie 1977, pp. 156.159). This reading has been contested on the basis that transformations do not play a fundamental role in Husserl's pure grammar, as they are not ubiquitous and operate at a "higher level" with respect to the laws affecting the combination of the underlying semantic categories (Cibotaru 2016). Edie's main point still holds, however, as long as the relevant operations are taken to transform the deep structure into their surface structure of (see Drummond 2007, p. 64).

terms, while simple propositions only merge into complex propositions according to the grammatical laws governing the relevant forms of connection – i.e. the forms of logical connectives. Meanings, thus, "only fit together in antecedently definite ways", so that combinations that fail to conform to the relevant laws will also fail to be meaningful, even if each of their parts is meaningful, since they will yield "only a heap of meanings, not a single meaning" (Husserl 1984, p. 326; see Husserl 1996, pp. 100-101):

> Wherever, therefore, we see the impossibility of combining given meanings, this impossibility points to an unconditionally general law to the effect that meanings belonging to corresponding meaning-categories and conforming to the same pure forms, should lack a unified result. (Husserl 1984, p. 327)

Formulating the relevant laws therefore requires a process of "formalization" is by which referential terms are replaced by bounded variables that range over contents according to the relevant category (Husserl 1984, pp. 326-327). Husserl's morphology of meaning is thus designed in such a way that syntax conveys semantic information because meanings are subject to *a priori* grammatical laws that attach not to their matter, but to the syntactic forms under which they are subsumed, which makes for their "*essential kind*, the *semantic categories*, that they fall under" (Husserl 1984, p. 326). On this reading, semantic categories are individuated syntactically: they consist in classes of expressions whose members can be substituted *salva congruitate* in the same contexts (Centrone 2010a, p 115, cf. Husserl 1984, pp. 327-328). Substitutions *salva congruitate* are indeed always meaningful, however "false, foolish, ridiculous" they may be, while this is no

longer the case as we "transgress the bounds of categories", for instance by substituting a nominal with an adjectival or verbal phrase in a proposition (Husserl 1984, p. 326). Bar Hillel (1957) suggested in this connection that Husserl's semantic categories are nothing but the counterparts of (traditional) grammatical categories. It seems safer to say that they are individuated by the syntactic properties that shape the intentional contents expressed as linguistic meanings.[4]

Infinitely complex structures can thus be shown to be generated by finite means by iterating the combinatorial operations licensed by the laws of grammar. Although no formal theory of recursion was available when *Logical Investigations* was written, Husserl seems to have a clear view of the recursive character of grammatical laws. Combinatorial operations are designed to apply iteratively, so that structures can be embedded into structures "*in infinitum*", to the effect that infinite expressions of growing complexity are produced from a finite set of primitives:

[4] Bar-Hillel in fact suggests that Husserl confounds meaningfulness and syntactic well-formedness to the effect of basing semantic categorization on syntactical considerations (Bar-Hillel 1967, pp. 352-353, see Leclercq 2011, pp.. 151-152). Bar-Hillel's reading thus takes syntactic form to be set apart from the semantic material it informs in a way that prevents explaining how syntax and semantics may possibly relate (Drummond (2007, p. 61, see Hanna 1984, Flores 2002). I argue in what follows that Husserl's logical grammar is explicitly designed to account for the compositionality of meaning and to contend that syntax distinctively contributes to semantics. In this respect, it diverges from the categorial grammars that have been partly inspired by the fourth *Logical Investigation*, as the latter count syntax and semantics as two separate systems of rules to be connected by a mapping relation (see Morrill 2011 ch. 1).

> If we now make gradual substitutions in the primitive forms set forth, and for a simple term repeatedly substitute a combination exemplifying the same forms, and we always reapply our primitive existential law, we arrive at ever new forms of deductively proven validity, encapsulated in one another with any degree of complexity […]. We see at once that the compoundings go on *in infinitum*, in a manner permitting comprehensive oversight, that each new form remains tied to the same semantic category, the same field of variability as its terms, and that that, as long as we stay in this field, all framable combinations of meanings necessarily *exist,* i.e. represent a unified sense (Husserl 1984, p. 339-340, Engl. Transl., vol. 2, p. 70)

For instance, we can go from "(M and N) and P" to "(M and N) and (P and Q)" and then to "((M and N) and P) and Q" and so on: the truth value of the resulting propositions will systematically depend on the truth values of their constituents—the same holds for all logical connectives (Husserl 1984, p. 340). Similar considerations apply to the basic forms of connection governing the composition of sub-propositional constituents into simple propositions. We can merge noun phrases and adjectival phrases to obtain increasingly complex nominal phrases, or build a complex noun phrase by substituting complex nominal constructions for proper names. From "Napoleon lost the battle of Waterloo" we can get "[[Napoleon] the winner of Jena] lost at Waterloo", and then again "[[[Napoleon] the winner of [[Jena] the city where Hegel wrote his first *Philosophy of Spirit*]] lost at Waterloo", and so on. The resulting expressions inherit their semantic value from the semantic value of their constituents, so that each necessarily counts as "valid", that is, a construction yielding "real meaning" (Husserl 1984, p. 337).

The recursive nature of syntactic rules thus holds both for constructing complex propositions out of simple propositions and for constructing the latter out of basic sub-propositional constituents (Husserl 1984, pp. 338-339). Moreover, different forms of combination can be indefinitely combined, accounting for what is generally regarded as the productivity of language and thought, namely the fact that "an infinity of complex forms legally engendered" can be generated by finite means:

> [we] rise to the insight that all possible meanings are subject to a fixed typic of categorical structures built, in *a priori* fashion, into the general idea of meaning, that a priory laws govern the realm of meaning, whereby all possible concrete meaning-patterns systematically depend on a small number of primitive forms […] out of which they flow by pure construction. (Husserl 1984, p. 34, Engl. Transl., vol. 2, pp. 70-71)

This combinatorial structure is crucial to all kinds of *syntaktische Gebilde*, that is, to any kind of entities provided with a syntactic form, including both expressions and numbers (Husserl 1974, p. 304). This coheres with Husserl's view that formal logic and mathematics are to be united in a general formal science purporting to realize Leibniz's ideal of a *mathesis universalis* (Husserl 1975, p. 222 ff.; Centrone 2010a, p. xi). Operations are defined, both for arithmetic and grammar, as procedures to construct complex structures from a finite set of "normal" or "primitive" forms, and to reduce the first to the latter, so that "terms" can be taken to occur in logical laws as bounded variables, whose range of variability is defined by the relevant category (Husserl 1984,

pp. 336-337, 339). As for the number system, in particular, the class of arithmetical operations devised by Husserl can be shown to be extensionally equivalent with the class of partially recursive functions (Centrone 2010a, p. 54 ff.). This accords well with the treatment of grammar in the *Investigations*, suggesting that recursion is a property of any combinatorial system of entities equipped with syntactic form. If this is right, then not only Husserl was arguably the first scholar to set out "a number of general procedures by means of which new arithmetical (computable) operations are generated from given ones" (Centrone 2010a, p. 54); he also envisaged that recursion is a fundamental feature of rational minds, as it underlies the productivity of both arithmetical and grammatical operations (Husserl 1974, pp. 304-305).

2. Syntactic structures and semantic roles

Meanings are thus conceived in this context as structured entities to be classified according to the syntactic form that is bestowed upon the "matter" expressed by lexical contents, so that "every concrete meaning represents a fitting together of stuff and forms, that each such meaning falls under an ideal pattern […] and to each such pattern an *a priori* law of meaning corresponds." (Husserl 1984, p. 329). More specifically, Husserl distinguishes three components into which the semantics of linguistic expressions can be analyzed, namely core matter, syntactic stuff – to be analyzed, in turn, into the coupling of a core matter and a core form – and syntactic form.

At the bottom we find the lexical content of simple *termina* working as bare semantic materials with no intrinsic structure, what Husserl labels the "core matter" of words—in linguistic terms, lexical roots—upon which syntactic forms are bestowed. The lexical content of the word "rain" can be made to work as the meaning of a noun as well as the meaning of a verb or adjective: "the rain", "to rain", and "rainy" share, in this sense, a material content that constitutes "the essential core" of meaning (Husserl 1984, p. 332). Yet, core matters are silent about the contribution they can possibly give to the proposition expressed by the sentences in which the corresponding words occur. It is only when a "core form" is bestowed upon bare matters that a "syntactic stuff" is generated according to which lexical contents can be recruited to play a role in a proposition. Syntactic stuffs, thus, are designed to carve out bare contents into a basic repertoire of formal semantic categories, out of which complex contents can be constructed by arranging them into patterns that respond to the relevant grammatical laws.

Full blown syntactic forms are finally realized by the grammatical relations into which contents may enter according to the syntactic stuff they fall under and the way it combines with the relevant syncategorematic components , whose incomplete meaning is defined functionally as the "non-independent part of thought" that performs the connection of terms in complete thoughts (Husserl 1984, p. 315). In fact, meanings cannot be combined without "connective forms, which are themselves meanings of a non independent sort", and to which a law applies governing the "the forms and the kinds of context into which it must be fitted" (Husserl 1984, p. 325). Syncategorematic expressions in this sense include "formal words" like logical connectives, determiners,

quantifiers, but also all particles and the "formal parts" of material words, such as inflections (Husserl 1975, p. 245; 1984, pp. 315-316, p. 657 ff.).

Finally certain grammatical transformations are allowed on syntactic forms that do not affect the underlying syntactic stuff, while others require changing the core form under which lexical contents are first subsumed (Husserl 1984, pp. 332-334). Noun phrases, for instance, are supposed to occur normally in the subject and in the object position, but not in the predicate position, while adjectival phrases are taken to be "predestined" to attribution and predication, and not to occur in the subject position unless they are nominalized. Numerable and non-numerable nouns may thus serve as predicates, as in "Bucephalus is a horse", and abstract names may "refer predicatively to attributes" if they occur in the predicate position (Husserl 1984, p. 53, 116, 224). Yet, according to this reading, embedding a noun phrase in a predicative structure entails changing the relevant syntactic stuff, while nothing changes in the underlying nominal stuff when we go from "A horse died" to "John owns a horse" Similarly, the adjectival phrase referring to the instantiated property of being yellow in "my yellow pills" can shift of course to the predicate position in "my pills are yellow", while nominalization is required to shift to the subject position, where the lexical content of "yellow" is taken to refer to the corresponding abstract universal, as in "Yellow is the color of my pills". The relevant transformation in the latter case yields a nominal syntactic stuff, which can hence enter all syntactic relation where a name is required according to the law of pure grammar (Husserl 1984, p. 334)

Syntactic stuffs are eventually grouped into three ultimate categories, namely the propositional, the nominal, and the adjectival "syntagmata" (Husserl 1996: 107-110).

Taken together with the syncategorematic connective forms and the grammatical laws governing combination and transformation, they determine the structure underlying both language and thought. Although there may be room for discussion about how to specify the relationship between syntactic stuffs and syntactic forms,[5] Husserl's view seems thus broadly consonant with the with the view that not only lexical contents can be associated with different lexical categories, but their semantics also depends on the grammatical relations in which the latter are embedded (Hinzen and Seehan 2013, p. 64, 75 ff.). First,

[5] In the first appendix to *Formal und Transcendental Logic*, the number of ultimate syntactic stuffs is narrowed to two, as all simple propositions are taken to be ultimately analyzable into a predicative combination of substantive and adjectival stuffs (Husserl 1974: 310). In this text core forms are claimed not to belong to the syntax of propositions (Husserl 1974: 309). It has been suggested in this connection that the basic categories of logical grammar are not purely formal because they are rooted in the semantic material they inform and in particular in the pre-predicative structure of perceptual contents (Drummond 2007, pp. 63-65). This, however, departs from former texts, where syntactic stuffs are viewed as "syntagmata", that is as "syntactic formed stuffs" (Husserl 1996, p. 107), because "the core form is what forms the pure core into a syntagma of a specific category" (Husserl 1996, p. 112). While it is true that syntactic stuffs are not *purely* formal in that they include a material element, it seems problematic to claim that the corresponding core forms are non-syntactic. On the one hand, the core matter that makes for the lexical root of words can be subsumed under different core forms, which contrasts with their being intrinsically carved out according to formal semantic categories. On the other hand, core forms are designed to bring about *syntactic* stuffs that are poised to be realized in full blown syntactic forms and to enter grammatical laws (Husserl 1974, pp. 310-311; Drummond 2007, p. 64). The point is that, however core forms are conceived, syntactic categorization is required in order for the pre-predicative structures of perceptual content to enter the compositional constituent structure of thought and language. In this respects, the former texts look more consistent than the appendix to *Formal and Transcendental Logic*.

subsuming lexical items into parts of speech is itself a process whereby lexical contents are carved out according to forms that are sensitive to grammatical relations. Syntactic stuffs, in this sense, just lay out the first structure imposed on core matters to make them available to grammatical operations.

Second, semantic categories are not intrinsic to contents. We have seen that, in order to occur as meaningful parts of a proposition, core matters need to be imbued with forms that are poised to undergo grammatical operations and eventually be realized in full blown syntactic structures. Syntactic stuffs may constrain syntactic forms in this respect, yet core matters impose no constraint on the forms they are shaped by. In fact, core matters *per se* have no structure at all. They make for the lexical content of words, yet lexical contents in no way determine what grammatical relations they enter into. The word "green", for instance, can only occurs under one syntactic form or another in the context of a whole proposition – for instance as an adjective, a predicate, or a name. Yet it expresses the same material content in all contexts. On the one hand, thus, its meaning can only be grasped by looking at the way the content it expresses contributes to the proposition expressed by a whole sentence. On the other hand, the contribution it gives to the relevant proposition cannot be predicted from, or be determined by, the material content it expresses. Again, core matters are silent about the contribution given to the propositions expressed by the sentences in which their expressions occurs, although they can only occur as parts of propositions. This indicates both that core matters are abstract moments of meaningful expressions – because they cannot occur independently of the formal structures in which they are embedded – and that they have no intrinsic structure – because they are individuated by what turns out to be invariant under all possible

grammatical transformations. The adjectival, the predicative, and the nominal occurrences of “green”, for instance, contribute differently to the respective meaning of “he has green eyes”, “his eyes are green”, and “green is the color of her eyes”; yet they clearly share a material core, which is invariant under the relevant transformations and therefore can be distinguished from both the different syntactic forms under which it occurs and the different core forms that shape it into the underlying syntactic stuffs (Husserl 1984, p. 332-334; 1974, p. 312). In a sense, then, there is no meaning to grasp in bare words, as a structure is required for contents to occur as meaningful parts of a complete proposition. Plainly, all occurrences of a word share a common material core, which can be traced back either to sensible perception—when it is singular—or to the abstraction of a universal—when it is general (Husserl 1984, p. 223 ff.;1939, p. 394 ff.). Yet, matters can feature in a proposition only insofar as they are given a syntactic form and are therefore enabled to enter grammatical relations.

In short, contents do not naturally divide into kinds that correspond to logical functions and determine their appropriate grammatical expression. No core matter, in particular, is designed to be essentially predicative. Being a predicate is not an intrinsic property of a specific kind of contents, but a function of the grammatical relations into which they enter. By the same token, core matters are not naturally expressed by names, as nominal expressions are still syntactically structured: they may result from combining lexical items with determiners, from coining a proper name, from embedding a whole proposition in a sentential complement, and so on—normally to express the subject or the object of predication (Husserl 1984, p. 481, 486 ff., 685). This suggests that core matters are atomistically individuated, yet they only contribute to the meaning of the expressions

in which they occur when they are couched in some syntactic form or another. A natural reading is that this is evidence of a division of labor between two different systems. While a pre-linguistic, conceptual-intentional system, sub-served by a capacity for perception and abstraction, supplies bare lexical contents, thought only emerges when they are recruited by the syntactic structures that provide the framework for propositional content.

We are now in the position to see how exactly syntax conveys semantic information. Although syntactic forms may be understood here as contributing to what is meant by a linguistic expression (Rizzoli 2002), they do not behave as a part of the *sense* expressed as linguistic meaning, since they do not contribute to the descriptive characterization of the corresponding referent. This is why grammatical transformations preserve the "essential core" of meaning (Husserl 1984, p. 332). In such cases, the expressed content takes a different form, yet no new matter is generated because the new form does not add to the sense expressed by the transformed expression, but rather provides it with "a new role" (Husserl 1984, pp. 225-226, 686).

To see how syntax provides expressions with roles that affect their semantics without involving a change of meaning, we must consider Husserl's distinction between meaning and reference and locate the information carried by syntactic forms. The notion of meaning relates to the sense expressed by the relevant meaning intention and conveys the way in which an object is intended as the referent of the corresponding expression, thus accounting for the relation of reference between the expression and its referent

(Husserl 1984, pp. 51-53).[6] Referents, however, come in different formal-ontological kinds— individual, property, relation, state of affairs, and so on[7]—which are not specified by the material properties and relations attributed to the referent by the sense expressed as linguistic meaning. Sense, thus, may count as a mechanism that determines reference, but it is silent about the ontology of reference. The relevant information must be traced back to the nomic connection between semantic categories and the formal-ontological categories under which objects fall:

> In close ideal lawful connection with […] the categories of meaning are other concepts such as Object, State of Affairs, Unity, Plurality, Number, Relation, Connection etc., These are the pure, formal categories of objects. […] In both cases we are dealing with concepts that are independent from the particularity of any material knowledge, as their function makes clear, and under which all the concepts, proposition, states of affairs occurring in thought must be ordered. They arise therefore only in relation to the varying thought functions, that is their concrete basis is to be found in possible acts of thought, as

[6] See Mohanty 1976, ch. 1; Bell 1990, p. 116; Zahavi 2003, pp. 23–25. Husserl's distinction between content and object corresponds to the distinction between reference and referent stressed by Dummett (1973) with respect to Frege's philosophy of language: see Dummett (1993, p. 53). Indexicals, demonstratives, and proper names notoriously complicate the picture, but this does not affect the issue at stake here (Mulligan, Smith 1986, § 7).

[7] Husserl took states of affairs to be complex objects and held that a state of affairs is the "full and complete object" that corresponds to a whole judgment, therefore he took states of affairs – not truth values – to be the proper referents of sentences (Husserl 1984, pp. 415-416, see Dummett 1993, pp. 55-56).

such, or in the correlates that can be grasped in these (Husserl 1975, pp. 245-246, Engl. Transl., vol. 1, p. 153)

Husserl's main claim is that semantic categories co-vary with formal-ontological categories, so that expressions falling under a specific semantic category take as referent entities that falls under the corresponding ontological category, and the laws according to which meanings combine match the laws according to which such entities combine. In this sense, logical laws are grounded in a finite set of formal concepts that specify semantic categories and connective forms in syntactic terms that correlate with a formal domain of objects, to the effect that an ontological counterpart must be found for each logical law (Husserl 1975, pp. 247-248; Husserl 1996: 320, cf. Poli 1993):

> Each formal-logical law is to be equivalently converted into a formal ontological law. Instead of judgments, predicatively formed states of affair will now be judged about; instead of judgmental members (e.g. nominal significations), objects will be judged about; instead of predicative signification, characteristic marks will be judged about and so forth. We no longer even speak of truth, of the validity of judicial *posita*, but rather of the composition pertaining to a predicatively formed state of affair, of the being of objects, and the like (Husserl 1976, p. 342, Engl. Transl. 353–354)

Husserl further claims that such formal categories and laws arise in relation to the functions of thought, which seems to imply that thought itself displays a syntactic

structure and that formal ontological categories are derived from the syntactic categories governing the functions of thought. I will return to this point later. Here, I want to stress the implication of the first claim. It follows from the connection between semantics and formal ontology that the kind of objects that expressions take as referent co-vary with the syntactic forms under which core matters are subsumed, so that expressions bearing the same lexical content may refer to entities belonging to different formal ontological categories, depending on the syntactic structure in which they are embedded. Their matter is indeed invariant under grammatical transformation, as we have seen. Yet the kind of entity they pick out as a referent will vary according to the syntactic form under which it is subsumed. This helps to specify the intuition that no definite meaning seems to attach to bare words. Core matters make for the roots of meaning in that they fix what will count as the material content expressed by words. Yet they do not incorporate reference to a specific kind of entity until they are given a syntactic form. In this sense, core matters cannot properly occur as "meanings" before they are recruited to refer in a specific grammatical context. We cannot tell from the core matter expressed as the bare lexical content of "red" if we are talking about the red moment of a concrete particular, an abstract specie, or the event or process of becoming red. Neither can we predict whether it will occur in a subject or a predicate position. Consider "The red statue", "The statue is red", "The red of the statue is beautiful", "Red is a beautiful color", "The face reddened" (Reichard 2013, pp. 171-172. A referent is only picked out insofar as a syntactic structure is imposed on bare matters that specifies the relevant ontological category—the kind of entity to which the intended object belongs.

Thus, syntactic structures carry information about the ontological category of referents and the way they combine. As ontological categories are lawfully connected to semantic categories, and semantic categories are individuated formally by the syntactic properties bestowed on core matters, the formal laws governing the combination of meanings into propositions match the formal ontological laws governing the way simple objects combine into states of affairs. Therefore, syntactic structures determine the role expressions play in sentences, by fixing the way their referents fit into the state of affairs represented by the proposition they express (see Husserl 1975, pp. 244-246). Hence, they pertain not to the notion of sense as outlined in the fifth *Investigations*, but to the notion of reference. In fact, Husserl claims that a whole proposition has a "unitary reference" to the intended state of affairs in virtue of its *form*, which presupposes in turn "the function of the particular forms belonging to the reference of [its] members" (Husserl 1974, pp. 302-303). Rather than being an ingredient of meaning—understood as expressed sense—syntactic forms convey the semantic role of expressions, that is, the way they contribute *via* their reference to determine the state of affairs represented by the sentence in which they occur.[8] Syntax conveys semantic information because contents only play a role in a

[8] Dummett (1973, pp. 89–91, 190–91) distinguishes between the sematic role of expressions and their relation to referents as two components of the notion of reference, where the former specifies the contribution an expression make to the truth-value of sentences by virtue of the latter. *Mutatis mutandis*, this applies to Husserl's view that semantic categories correspond to formal ontological categories to the effect that each expression contributes to determine the state of affair represented by the propositions in which it occurs according to the ontological category its referent belongs to: noun phrases typically

proposition as they are embedded in the relevant syntactic structure according to the syntactic form under which they occur.

3. Propositions and logical form.

According to this reading, what binds together the constituents of propositions and imposes structure on them is the syntactic relation into which they enter by virtue of the syntactic form bestowed upon them. Unlike Frege, Husserl took concepts to be *representations* of "general objects" rather than something analogous to functions, so he took them to be what predicates express, rather than what they refer to, and took predicates to express complete senses (Husserl 1984, pp. 139, 218-219, 713). Indeed, since general terms express a concept, they refer to universals—species—in the same way that singular terms refer to individuals, and can occur both as subject and as predicates. What marks off predicates here is not their being intrinsically incomplete, but their grammatical function. So, Husserl did not think of propositions along Fregean lines, as resulting from saturating the incomplete sense of "conceptual terms", although he shares with Frege (1981; Frege 1892) the view that some part of a thought must be unsaturated and that propositions are to be understood as functions (Husserl 1996, p. 181, see also Husserl 1974, pp. 303-304, 309). Predicated *terms* like "red" or "horse" in fact are not

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contribute particulars or universals, adjectival and predicative phrases contribute instantiated properties and relations, complete sentences states of affairs.

intrinsically incomplete and thus must be distinguished from the predicative syntagmata "… is red" or "… is a horse", whose incompleteness arises from combining a general term with the copula, which counts as the only unsaturated element in the structure (Centrone 2010b). Husserl's view of propositional functions thus differs from Frege's view in two crucial aspects: first, propositional functions are seen as syntactic units and, second, the "functional form of predication" is connected to the "copulative function" performed by the verb "be" in the syntactic structure of propositions, rather than to the functional nature of concepts (Husserl 1974, pp. 304-305, 307) Here the copula can be read as a predicate-forming operator on adjectives, common nouns etc., as suggested in a different context by Salmon (2005). The inflected copula thus conveys the form of the proposition because it performs a predicative connection of terms, making complete sentences to represent the purported fact that the object designed by the relevant subject instantiates the property designed by the predicate (Husserl 1984, p. 658, 665-666, 668-669). This accounts, by the way, for the fact that general terms are credited with plural denotation in the context of predication, since the concepts they express may apply to different individuals when they are used as predicates, as for instance "horse" applies to Bucephalus in "Bucephalus is a horse" and to a cart-horse in "this cart-horse is a horse" (Husserl 1984, p. 53, see Centrone 2015, p. 84). A natural reading is that "plural denotation" is a referential feature that comes with the syntactic structure of predication.

The unity of propositions, thus, does not require the sense of predicates to be designed to match the sense of names, because the syntax of representations carries the information we need to construct a proposition out of its constituent parts: the unity of "members" in a proposition is indeed a "syntagma" (Husserl 1974, p. 307). Husserl's

view, in this respect, tackles a traditional problem, namely that of accounting for the unity of propositions. Given that a proposition is not the mere collection of its constituent parts, something must make for their composition into a propositional whole, yet, whatever does cannot count as a further constituent part, on pain of regress (Russell 1903, Soames 2010). Husserl's solution bears some similarity with King's (2007) in that the operation performed by the copula instructs us to combine contents to the effect of conveying the relation of instantiation between objects and properties that makes for the structure of the represented state of affair. Instantiation can be conveyed in fact by representing something *as* being in a certain way as well as by representing *that* something is so and so in judgment. Predication in the latter case is not said to *represent* the relation of instantiation, but rather to "express" the "relational being" that makes for the intended state of affairs (Husserl 1984, p. 669). In a sense, thus, it could be thought to "encode" the relation of instantiation. Husserl however is not explicit on this point and does not seem to rest on something like King's idea that the relevant syntactic relation "encodes" a relation of ascription among the semantic values of its constituents – a view that may be suspect of reinstating regress (Reichard 2013, pp. 103-104). Husserl, rather, seems to hold that syntax directly affects semantics by determining the semantic role of expressions, as it arranges the contents they express in accordance with the formal ontology of their referents, so that the structure of propositions turns out to be isomorphic with the structure of states of affairs. In this respect Husserl looks closer to the view that syntactic structures intrinsically contribute to semantics (Hinzen and Seehan 2013, pp. 1–2, fn. 1, p. 75 ff.).

Be it as it may, Husserl's syntactic conception of the unity of the proposition is consistent with his view of compositionality, as discussed in the preceding section, and more generally with the idea that thought is governed by the principles of a universal grammar, an idea Husserl traces back to the tradition of 17th century's linguistic rationalism (Husserl 1984, p. 344). Universal grammar is a logical grammar in this context, because syntax turns out to be responsible for the logical form of propositions. Logically simple expressions are indeed identical with syntactically simple ones, and the rules to form complex expressions convey the information about how to combine them, so that a complete sentence can be interpreted by constructing what it represents out of what is represented by its constituent parts. As a consequence, logical properties of expressions turn out to be "grounded" in their grammatical properties (Husserl 1975, pp. 245; 1984, p. 337, 348). This seems to entail a perfect matching of logical and grammatical form that is far from obvious in natural languages. Yet Husserl's reading does not call for a revisionist attitude about natural language, as it takes the structures of logical grammar to shape the "ideal framework which each actual language will fill up and clothe differently" (Husserl 1984, p. 347), hence to be "more or less revealed in every developed language" (Husserl 1984, p. 336). Logical form supervenes on syntax as an abstract property of expressions, accounting for the "rational" moment of language (Husserl 1984, p. 346). Therefore, it cannot be deeply disguised by natural language, as it must turn out to be realized in any possible language as the aspect in its grammar that is relevant to semantics: logical form captures what the syntactic structure of expressions determines about their meaning.

On this reading, pure grammar provides a framework for thought and works as a universal structure that underlies any possible external language. Bundgaard (2004) has argued that this is misleading, suggesting that Husserl views supports a holistic-functionalist view of language that comes nearer to the project of cognitive linguistics than to the Chomskyan program of Universal Grammar (see Edie 1977; Münch 2002). The argument goes as follows. As linguistic meanings are nothing but the expression of intentional contents of acts, semantic categories must turn out to be fixed according to a purely semantic distinction between independent and non-independent contents that is prior to the "linear" organization of syntax (Bundgaard 2004, pp. 54–55, 57–58). In this view, grammar just provides the tools to express semantic distinction and the relations that are intrinsic to the nature of content. This is supposed to be what Husserl states by saying that the grammatical distinction between *categoremata* and *syncategoremata* expresses a semantic distinction (Bundgaard 2004, pp. 55–56; Husserl 1984, pp. 312-313). The problem with this reading is that it severs syntax from semantics in a way that runs against Husserl's original claim that syntax essentially contributes to the structure of content. While it is correct that the propositional articulation of contents is prior to their expression as sentential meanings, the point of the fourth *Investigation* is that the way constituent parts are arranged into propositional wholes is determined by the syntactic laws that govern their combination. This is why the proper task of a mature "science of meanings" would consist in devising a "pure logico-grammatical theory of forms" (Husserl 1984, p. 336). The rationale for this view is apparently that, when it comes to semantic contents, parts–wholes relations are cast in compositional terms—which account for the productivity of language and thought. Interestingly, this is not the case in

other domains, such as for the relation between color and extension in the domain of sensible contents, and it explains why, in the latter case, the relevant *a priori* laws are synthetic, while they are analytic in the realm of meaning (Husserl 1984, pp. 256-257, Bundgaard 2004, p. 64).[9]

The point is that, as long as we take linguistic meanings to express pre-linguistic intentional contents, intentional contents themselves must be compositional in order for an act to be performed whose complex matter is grounded in a "predicative synthesis" and expressed by a complete sentence—what Husserl calls "propositional acts" (Husserl 1984, p. 501). In fact, sub-propositional contents being governed by the law of pure grammar is what makes it possible for them to compose into propositional wholes. In this sense, the synthetic activity of judgment depends on the syntactic structure of predication, rather than the contrary, according to the principle that "synthetic acts" can be decomposed with regard to their content into a finite set of simple material members and syntactic forms:

[9] In order to support his reading, Bundgaard suggests to sever the treatment of the relations between independent and non-independent meanings from the analysis of pure grammar that takes stage at § 10, and conjectures that at this point a "change of scope" occurs in the fourth *Investigation*, shifting the focus from the mereological semantic relations among contents to the "linear" grammatical relations among linguistic symbols (Bundgaard 2004, p. 62). Yet there is no need to postulate a "change of scope". What in fact happens in § 10 is that the general idea of a part–whole relation is turned to the specific features such relations take in the semantic sphere, that is, to the formal laws governing the combination of contents into propositional wholes. Since these laws are syntactic, they are conceived as logico-grammatical laws.

> The analysis of such a whole leads to, on the one hand, its members and, on the other, the syntactic forms of synthesis […]. We may finally note that the general treatment of possible articulations and synthetic formations leads to the pure *logico-grammatical laws* discussed in our *Fourth Investigation*. […] Here the principle obtains that our self-contained objectifying matter (and therefore any possible non-dependent meaning) can function as a member in every synthesis of every possible form. This entails the particular principle that each such matter is either a complete propositional (predicative) matter or a possible member of such a matter. (Husserl 1984, p. 502, Engl. Transl., vol. 2, pp. 161-162)

What seems clear is that (i) intentional analysis should come down to nominal matters as basic constituents of judgments, (ii) the "synthetic formation" that is specific to judgments must be traced back to the syntactic form that makes for their predicative structure, and, therefore, (iii) propositions are not generated by an enigmatic capacity for intellectual synthesis. Rather the contrary is the case: judgments display a synthetic content because they instantiate a proposition generated by the way sub-propositional matters are combined according to the relevant grammatical laws. A judgment is indeed "a syntactic unit" generated "out of syntactically formed stuffs" (Husserl 1996, p.110). What is to be explained, in this context, is how pre-linguistic intentional contents are given a syntactic structure.

4. Phenomenology and the language of thought

Husserl's intentional semantics is designed to reduce linguistic meaning to the intentional content of mental representations. Linguistic meanings are, in fact, identical with the intentional content of meaning intentions, where the latter are understood as the psychological kind of acts that are devoted to expressing the content their matter instantiates by bestowing it upon symbols (Husserl 1984, pp. 43-44, 102). If we take the notion of representation to apply to act matters according to the view of mental representations sketched in the first section, and take act matters to be phenomenal tokens of content types, then linguistic meanings are nothing but the intentional content instantiated by the mental representation picked out for expression by a meaning intention. As we have seen, however, semantic categories are individuated syntactically. Intentional contents are, thus, supposed to occur under a syntactic form in order to count as the constituents of propositions. This constrains what can count as a mental representation, as symbols look like the only representational devices that display the relevant syntactic properties—pictures and sensory contents in fact have no compositional constituent structure (Fodor 1985, p. 89 ff., 94; Fodor 2008, p. 173 ff.). Mental representations should, thus, display all features of symbolic representations except that of being expressions. This conveniently reduces the structures of language to the structures of thought, but it also suggests that the structures of thought are built on something akin to language.

Solutions are not legion. First, one can expect the structure of thought to depend on subsuming intentional contents under the grammatical categories of corresponding linguistic expressions. The matter of acts would be given a structure in the process of

being connected to a symbol by the meaning intention that accounts for its expression. Second, one can take mental representations to be symbols of a language of thought, along the line suggested by Fodor (1975, 1985). Third, one can take the syntactic structures of natural language to be generated by a language faculty, along the line of Chomsky's Universal Grammar, yet to be intrinsically connected with semantics and designed for thinking rather than for expressing thoughts (Hinzen and Seehan 2013, p. 297 ff.).

None of these solutions seem to fit Husserl's view that symbolic representations cannot be intrinsically intentional, however.[10] Symbolic representations, here, are taken to require a further object to be present to the mind beyond the intended object—such as a sensible sound-pattern—to the effect that the former is interpreted as a proxy for the latter: they only refer in virtue of the intentional content a sign is made to express by a meaning intention (Husserl 1984, pp. 43-44, 80-81, 586-587; Centrone 2015, p. 69 ff.). Like pictures, symbolic representations presuppose intentionality and thus cannot explain it on pain of regress (Husserl 1984, pp. 436-437). This entails that some non-symbolic

[10] Husserl seems to allow, at times, that linguistic expressions are required to perform—not just to *express*—judgments that pertain to the "higher intellectual sphere"—that is, judgment displaying a connection of propositions (Husserl 1984, pp. 7-8). This may suggest that the structure of thought is, in that case, constituted by linguistic structures or, more modestly, that the latter are required for the former to be psychologically "realized" (Husserl 1984, p. 8). Yet the parallelism between the laws of "authentic", intuitive thought and "inauthentic", symbolic thought implies that higher mental processes can be carried out without symbols (Husserl 1984, p. 137, 177; Husserl 1984, p. 710 ff.). This is consistent with Husserl's distinction between the conceptual and the symbolic aspect of logical operations in the *Philosophy of Arithmetic*, and generally with Husserl's theory of signs (Centrone 2010, pp. 42–43; Centrone 2015).

representations must exist out of which intentionality originally flows and whose intentionality is hence "direct", in that it is not "founded" in the intentionality of other representations. Representations whose intentionality is direct in this sense are intrinsically intentional, because their relation to the intended object is not grounded on more primitive intentional relations. Moreover, they are fundamental because they ground all derived intentionality by providing the representational contents to be bestowed upon further representational devices. This leads Husserl to the conclusion that intentionality is, originally, a property of phenomenal consciousness, whose symbolically "mediated" instances are to be reduced to the "direct" intentionality of the relevant founding acts:

> […] all relation to an object is part and parcel of the phenomenological essence of consciousness, and can in principle be found in nothing else. [This] is direct in the case of a straightforward presentation: it is mediate in the case of "founded" presentation, e.g. one by way of images [or symbols]. (Husserl 1984, p. 437, Engl. Transl., vol. 2, p. 126)

Husserl's conclusion draws on two premises that bear on the phenomenal nature of mental reality. The first is that phenomenally conscious events—*Erlebnisse*—are the basic instances of mentality and, thus, the proper objects of a purely phenomenological psychology (Husserl 1984, pp. 357). The second is that intentionality is an intrinsic property of a subclass of such events—*intentionale Erlebnisse* (Husserl 1984, pp. 382, 391-392). As we have seen in the first section, what Husserl calls acts are phenomenally

conscious episodes of perceiving, believing, desiring and the like, which are endowed with the property of being intentional because a representational content, a "matter", is part of their phenomenal content (Husserl 1984, pp. 429-430). It follows that if symbolic representation are taken to be "founded" in or "mediated" by the intentionality of a further mental act—a meaning intention that "animates" otherwise meaningless sound-patterns by bestowing a content upon them (Husserl 1984, pp. 44-45)—then symbolic representation cannot enjoy original, underived intentionality. Original intentionality must be traced back to the representational content of the relevant founding act.

As it stands, the argument does not say much about the phenomenal format of fundamental representations. It rather raises a general claim about original intentionality that only applies to symbolic representations under a specific conception, namely that symbolic representations owe their intentionality to a further mental act. On a standard view Husserl clearly shares, representations are said to be derived if they have their representational content in virtue of mental states that are distinct from themselves—e.g. meaning intentions—otherwise they are underived (Bourget 2010, pp. 33–34). The distinction concerns representational contents, not representational vehicles, and does not entail that intentionality is derived when it is carried by vehicles of a specific kind, or *because* of the vehicles it is carried by. Husserl's argument is, thus, hard to question when taken as a general claim about the metaphysics of intentionality. If we are to avoid regress, some representation must be credited with underived content, as derived intentionality must be grounded in intrinsic intentionality, that is, in representations whose representational content is not derived from other mental states. If taken as a claim about the format of fundamental representations, however, it hardly proves that original,

underived content must be carried by representational vehicles of one kind or another. At best, it establishes that intentionality is originally a property of mental representations and is only derivatively credited to things that are merely *interpreted* as representing. To reject, on this basis, that symbolic representation can possibly carry original intentionality then conflates a claim about representational content—intentionality must be non-derived in the fundamental cases—with a claim about representational *vehicles*—the claim that they must be non-symbolic in order for representations to be blessed with underived content. Nothing in principle prevents symbolic *vehicles* to be endowed with underived content, however, unless it is stipulated that symbols can only be things which are present to the mind as objects upon which content is bestowed by a further mental act. Once the conflation is removed, there is no reason to rule out that mental representations can possibly be both symbolic *and* "direct".

This is relevant to the phenomenology of thought. Husserl tracks down original, non-derived intentionality to intuitive acts that present us directly with the intended object, both in simple non conceptual acts like perceiving a red apple and in "categorial acts" involving the deployment of concepts and propositional structure, such as judging on that basis that the apple is red (Husserl 1984, p. 586 ff., 674). Representational contents, however, need representational vehicles, and we have seen in the first section that they can be of a sensory sort or of a symbolic sort. Now, in this context, symbols cannot make for the phenomenology of original intentionality, as they are not allowed to enjoy non-derived content. In fact, they are the phenomenal vehicles of "signitive" acts (Husserl 1984, p. 618 ff.). Yet neither can sensory contents, since they are not themselves intentional in the first place—intentionality must be bestowed upon them to make us

perceive objects and states of affairs (Husserl 1984, pp. 378-379, 398-399; cf. de Boers 1978, p. 138; Mulligan 1995, p. 184 ff.). Furthermore, they have no compositional constituent structure and, thus, do not support propositional thought. In this respect, it is noteworthy that no sensory content corresponds to the formal features of categorical acts (Husserl 1984, p. 702 ff.). Husserl retrospectively acknowledged that the *Investigations* fail to devise a solution (Husserl 1984, p. 535).

One may conclude that intentionality has no intrinsic phenomenology and retreat to the weaker claim that conscious tokens of thought types just come with an associated phenomenal vehicle. Alternatively, one can claim that the phenomenology of thought is non sensory, and try to accommodate this with Husserl's syntactic reading of the structure of content. In fact, Husserl routinely draws attention on contrast cases well known in the literature about cognitive phenomenology, pointing out that linguistic expression and understanding experientially differ from perceiving the sounds and shapes of words, and perception experientially differs from sensation (Husserl 1984, pp. 396-399, 41-42, 46-47, 78-82). Phenomenal contrasts among experiences that only differ in cognitive content are often taken to suggest that conscious thought is associated with a distinctive phenomenology, which relates to representational contents and cannot be reduced to the sensory properties involved in perception and mental imagery, including those involved in the phonological and orthographical imagery that goes along with inner speech (Pitt 2004). A recent argument to this effect is that a cognitive phenomenology is involved in representing high-level properties like being a Tiger or a screwdriver, which requires the deployment of concepts (Montague 2016). Husserl would agree, as he took concepts to be representations that originate in the eidetic intuition and therefore connected with a

distinct kind of conscious experience that takes universals as intended objects—what Husserl calls *Allgemeinheitsbewusstsein* (Husserl 1984, p. 113 ff., 178-179).

In this context, however, Husserl's syntactic reading of the structure of content raises a problem that specifically concerns the structure of cognitive phenomenology. If we take the compositionality of thought to depend on the syntactic arrangement of partial contents into structured propositional wholes, cognitive phenomenology must be found to display a structure that matches the relevant syntactic relations. The question then arises as to what can possibly account for that structure, given that it cannot result from sensory phenomenology, including visual and/or auditory verbal imagery. A reasonable conjecture is that the structure found in cognitive phenomenology mirrors the syntactic structure of an underlying language-like combinatorial system of representations, which is itself endowed with no sensory phenomenology and phenomenally only surfaces as it frames phenomenal consciousness according to the compositional constituent structure manifested in the apparent features of conscious thought. On this reading, the structure of cognitive phenomenology seems to require that mental representations combine according to the underlying syntactic structures of a *lingua mentis* or to the universal grammar of natural language. The second option, in particular, comes close to Husserl's view that pure grammar provides the scaffolding for thought (Hinzen, Seehan 2013, pp. viii, 1-2, 11). .

This is consistent with the idea that sensible and eidetic intuition make for a conceptual-perceptual system that supplies the bare, unstructured or pre-predicative matter of acts, by directly presenting us with particulars and universals, respectively. In this sense, it seems compatible with the view that original intentionality may *ultimately*

trace back to being phenomenally conscious *of* objects. Propositional thought emerges, however, as syntactic structures are recruited to generate complex intentional contents out of the unstructured atomic contents of intuition. Thus, if we follow Husserl in taking thought to be compositional by virtue of its syntactic structure, we should expect that there is something like a language, whose syntax underlays the structure exhibited by cognitive phenomenology.

It is worth considering that this may account for the parallelism Husserl posits between the laws governing intuitive, "authentic" thought, which proceeds without a *phenomenal* symbolic vehicle, and those governing the signitive, "inauthentic" thought that is *phenomenally* carried out in symbols. The rationale for positing such a parallelism is that intuitive contents must align with the propositional structure of judgment, in order for perception to play an evidential role in the theory of knowledge (Willard 1995, p. 150 ff.). The categorial structure of intuitive thoughts must, therefore, be isomorphic with the structure of their symbolic counterparts and subject to identical combinatorial laws—contradictions being the only blind spot, as they turn out to be symbolically conceivable, yet intuitively unconceivable in this context (Husserl 1984, pp. 710-711, 720 ff.).[11] In this sense, categorial forms are nothing but syntactic forms under a different name, and

[11] Both "authentic" and "inauthentic" thought display a combinatorial structure and their difference in this respect narrows down to the fact that the combinations accessible to authentic thought are restricted to the representation of possible object of intuition, so that contradictions turns out to be unconceivable, while contradictory and antonymic *meaningful* symbols can be constructed—provided that their constituents are meaningful—for which no possible truth maker is there to be intuitively apprehended (Husserl 1984, p. 716 ff., 720 ff.).

Husserl accordingly takes "categorial" and "syntactic" to be synonymous expressions (Husserl 1939, p. 247, fn. 1; 1974, pp. 111-112; 1976, pp. 28-29). This is what allows intuitive, "authentic" thought to display the relevant syntactic features. Yet, it also suggests that the phenomenology of thought exhibits a language-like structure, for which an explanation must be provided that does not rest on the sensory properties of phenomenal symbolic vehicles.

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