**The Subject is Qualia: Hylomorphism and Consciousness**

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*If the possessor and the possessed are united by an internal relation based on the insufficiency of being in the for-itself, we must try to determine the nature and meaning of the dyad they form.*

(Jean Paul Sartre, *Being and Nothingness*)

Things strike me in a variety ways. F and F# sound slightly different, ripe and unripe tomatoes neither look nor taste nor smell the same, and silk feels smoother than corduroy. In each case, I distinguish an experience of something on the basis of what it is like to be its subject. That is to say, in philosophical parlance, if not quite the vernacular, its “quale,” leads me to categorize it and, thus, respond appropriately to its stimulus. The function of a quale being established, we must define it along with its subject and, as Sartre maintained, their relation. How should we understand the subject and predicate terms and the copula in sentences such as ‘He is listening to Chopin’ or ‘She is seeing the sights of Paris’? Elaborating upon adverbialism, I shall argue that the subject of experiencing is a hylomorphic compound that is temporarily identical to the 'accidental compound' that it forms along with a qualified passion. I begin by explicating the adverbialist’s treatment of qualitative consciousness and defending it against the charge of circularity.

 **Qualia**

 The adverbialist identifies a quale with a “way” of experiencing, being to experiencing as rapidly or gently is to the flowing of a river.[[1]](#footnote-2) To possess a quale, on this view, is not to consciously grasp a quality of something that is distinct from oneself: neither a sense datum nor a *res*. Rather, it is to be experiencing in a certain way, as one is stimulated by events in one’s surroundings and/or body. (As we shall see, a natural extension of this view is to treat the subject of an experience, not as having it, as Sartre’s discussion misleadingly suggests, but as forming along with it a compound.) To be the subject of a red quale is to be seeing redly, as it were; that is, it is to stand in the dyadic relation of inherence to a passion, qualified in a certain way: seeing redly being united to one. Again: redness is something by which perceiving can be modified, a form to which the latter 'material' is receptive, the two capable of forming a unit to be itself united to a patient (himself, as we shall see, such a unit) the subject of a red sensory experience. A passion receiving the form of another accident becomes inherent in a subject, the latter becoming that qualified accident, the 'two' thus being, as we shall argue, 'numerically identical': Socrates becoming visually red, one in number with that passion so qualified. To say that he is now undergoing (which really means *being*) a different experience of this sort, as would come from him turning his attention to, say, a cucumber, is to say there has been a change in the way in which he is seeing: redly to greenly. His (inherent) passion having undergone a change in qualia, he is now seeing (things) differently, being united to a numerically distinct qualified passion.

 It has been argued that the adverbialist is unable to clarify the meaning of such locutions without reintroducing the model of qualitative consciousness that her theory was intended to replace.[[2]](#footnote-3) To say that ‘Socrates is sensing redly’ can only mean that ‘Socrates’ sensing is red’, which seems to entail the existence of a red phenomenal object to which Socrates is (somehow) related. The objector maintains that unless the adverbialist accepts this analysis her view will be unintelligible. She further maintains that the adverbialist cannot account for the distinctions that she posits between the ways in which a subject experiences things without reintroducing phenomenal properties. What could the difference between sensing redly and sensing greenly amount to if not that the former is the experience of phenomenal redness while the latter is the experience of phenomenal greenness? If the adverbialist eschews the request for an account of such a difference as ill-conceived, treating the distinction as a primitive fact, her view becomes “phenomenologically inadequate.” Qualia having been ‘left out of the picture’, it fails to provide a full account of a legitimate explanandum.

 Adverbialism’s comprehensibility, however, is not dependent upon a belief in phenomenal objects. The adverbialist can insist she has obviated the need to posit such things by treating experiencing as describable in terms of the ways in which it occurs, attributes belonging to a different category than those of objects. (It would be a category mistake to treat ways of occurring as akin to ways of being. Compare: ‘His walking is slow’/‘He is walking slowly’ vs. ‘The tomato is red’/‘The tomato is (being) redly’.) Even though ‘Socrates is sensing redly’ means the same thing as ‘Socrates’ sensing is red’, the adverbialist is not committed to the existence of phenomenal objects. For the former is intended by the adverbialist as an analysis of the latter, a clarification of the latter’s misleading “surface grammar,” providing for its elimination from usage. As such, the adverbialist’s analysans may be taken as a primitive form of expression, explicable only *via* paradigmatic applications, it being understood, as Wittgenstein said, that “explanations must come to an end somewhere.”

 We now turn to the Sartre’s questions. What is the subject of an experience and what sort of dyad do they form?

**Bundles of Bundles**

 The instances of a kind D are said to 'ontologically depend' upon the instances of a kind S just in case the former could not exist sans the latter existing, but not vice-versa. As St. Thomas Aquinas writes:

'Now that properly exists which itself has existence; as it were, subsisting in its own existence. Wherefore only substances are properly and truly called beings; whereas an accident has not existence, but something is (modified) by it, and so far is it called a being; for instance, whiteness is called a being, because by it something is white. Hence it is said Metaph. vii, Did. vi, 1 that an accident should be described as "of something rather than as something." The same is to be said of all non-subsistent forms.'[[3]](#footnote-4)

A man's passions seem to bear such a relation to the man himself: being unable to exist on their own, they require him as their subject, while he may change psychologically. (In this respect they are akin to substantive universals, which require parcels of matter in which to inhere.) He is their necessary ontic support or bearer: coat rack to coat, if you will. Let us call this application of Thomas' definition the 'dependent passions principle' (DEP). We shall eventually take the patient here to be an hylomorphic compound, rather than a substratum or 'bare particular.' (The latter view can be summarily dismissed because it entails the existence of a type of entity none of whose properties are essential- not even being a substratum.[[4]](#footnote-5)) But there is yet the notion associated with Hume that passions *can* exist *sans* subjects, that our talk of patients undergoing experiences is a mere *facon de parler,* which deserves more extensive critical examination by way of a defense of DEP.[[5]](#footnote-6)

 On this view, our experiences- what a contemporary Humean, Leopold Stubenberg, calls “percepts”- are not undergone by anything.[[6]](#footnote-7) Rather, they inhere in a 'bundle' or collection whose elements are (somehow) synchronically and diachronically unified. A person here just is a series of collections of percepts whose unification does not entail the existence of an supporting entity belonging to a distinct ontological category, neither the aforementioned substrata nor Aristotelian substances. Percepts themselves also turn out to be bundles, collections of qualia, unified, though, again, not in virtue of belonging to an underlying subject.[[7]](#footnote-8) A person on this view, then, is a bundle of bundles.[[8]](#footnote-9) (Stubenberg himself goes on to identify the percepts that make up the
person-bundle with neural events, these being what is experienced.[[9]](#footnote-10))

 The distinction between what one is and what one undergoes breaks down here. The resulting conflation of a subject and her percepts leaves the qualia making up the latter without ontological support, pointing up a problem with monism: qualia do not seem capable of existing independently of the entities of another category of being. As Stubenberg himself notes, his view violates an extension of DEP, the notion that a collection of properties of any sort must be “supported” by something that is not itself a property (lest there be an infinite regress).[[10]](#footnote-11)
 Hume, of course, famously argued that introspection revealed no such underlying subject of experiences in the form of a persisting 'self,' only a 'succession' of mental states themselves. Applying the empiricist's criterion of intelligibility, which justifies positing only observables, he concludes that the notion of a self is fictitious, no more than a *facon de parler*. But even a perfunctory reading of Hume's argument reveals it to be the ultimate howler, as he cannot even formulate it without employing the very notion he wishes to repudiate: 'When *I* look inside my mind ....' (italics mine) Who is doing the looking here, one is compelled to ask? What is failing to observe itself? Would not the appropriate conclusion to draw from such an introspective datum be that an observer cannot observe himself observing things, rather than 'he' does not exist?

Stubenberg's own response to advocates of DEP is a *tu quoque*: those who posit substances underlying properties must also provide an account of the nature of instantiation, in this case, an explanation of the relationship between a subject and her qualia.[[11]](#footnote-12) The parallel problem for the monist is to explain how qualia inhere in a bundle without resorting to the notion of a common subject. But this reply misses the mark. For the question posed to the monist had to do with the possibility of accidents existing without ontic support; his opponent is not faced with this issue, only with the comparatively minor problem of accounting for the ability of something to bear qualities, which can plausibly be regarded as a ‘brute’ fact. Stubenberg says that “(properties) are not like table clothes; nothing about them suggests that they collapse pitifully absent a sturdy supporting structure.”[[12]](#footnote-13) However, that is precisely what his opponent maintains: properties do not seem capable of independent existence. Thus, it is incumbent upon him to refute the DEP.

 Arda Denkel recently sought to meet this obligation. Borrowing from Frege, he contended that in itself a property is an “unsaturated” and, hence, a dependent entity.[[13]](#footnote-14) On his view, however, its saturation is not provided by something independent, a substance, *a la* Frege. Rather, it is a function of its inherence in a “compresence” of determinants every one of which saturates and is saturated by every other element.[[14]](#footnote-15) Mutually supporting determinants of “sufficient diversity,” thus, form an independent entity wholly composed of non-substances.[[15]](#footnote-16) A property, on this view, entails the existence of the complementary determinants needed to ‘flesh
out’ a collection that itself requires no additional ontic support.

 Denkel’s proposal is reminiscent of the attempt to reduce space and time to sets of unextended points and instants. Such an analysis only invites the question: how could what is extended be composed of parts lacking extension? The latter seem incapable of amounting to anything having magnitude. As Hoffman and Rosenkrantz note, Aristotle thought it “absurd that a magnitude should consist of things which are not magnitudes.”[[16]](#footnote-17) In the same way, the idea of unsaturated entities saturating each other to yield an independent entity appears implausible. How could saturation arise from combining such things, even if they are diverse? (Moreover, if a compresence is taken to be a *set* of determinants, the proposed reduction involves making the category mistake of identifying concrete entities such a tables and trees with abstractions.) Taking our cue from Frege himself, we are forced to conclude that the unsaturated and the saturated belong to distinct and mutually entailing categories.[[17]](#footnote-18) Thus, it remains incumbent upon bundle theorists to refute the ASP.

**Sartre's Dyad: United Unities**

 Individual substances as the support of accidents, we have just seen, must comprise the foundation of reality; in Michael Loux's apt phrase, they are necessarily “part(s) of the basic furniture of the world.”[[18]](#footnote-19) They enjoy this ontic status not only because of the ASP but because substance kinds- denoted by sortals and having numerically distinct particulars as members- are themselves fundamental categories of being, irreducible to the “first-order properties (such as) colors and shapes” in terms of which they must be analyzed by adherents of the alternatives just dismissed. Not all universals here turn out be properties; some- the embodied, numerically distinct members of substance kinds, exemplify properties (the instances of those other universals, each instance of a universal, thus, being a placement of itself in either some matter or a hylomorphic compound). To belong to such a kind, e. g., that of persons, is not to instantiate certain property universals- neither the kind’s nominal or real essence- it is be an instance of a universal that makes something what it is and, as placed in a particular body, numerically distinct from the other members of its kind. The instance itself or “individual substance,” is, in other words, a materially inherent substantial form; that is, an embodiment of a sortal denoted universal, such as *maple tree* or *horse*. (The relation of inherence/embodiment, in which such a form stands to some matter, is here treated as *sui generis*.) Lassie, for example, is (identical to) such an instance of the substantial universal *caninity*; it is that which supports her properties, itself needing no ontic support**.** She, thus, does not have it as a property; she *is* that (embodied) substance universal, it is her “essence,” in which her accidents inhere as their substratum. (In this way we manage to reconcile the seemingly disparate positions Aristotle held in the *Categories* and *Metaphysics*.[[19]](#footnote-20) Organisms are the “primary substances,” but so are their embodied substantive forms, as the former are one and the same with the latter.) The support of a substance’s properties, both accidental and essential, then, is what makes it what it is, its embodied substantial form. A person is, thus, a 'hylomorphic' compound who forms, along with her qualified passions, themselves, as noted above, matter-form composites, what Aristotle misleadingly referred to as “paronyms,” in Frank Lewis words, “accidental compounds,” what others still term “accidental unities”: e.g., Socrates and (his) seeing redly.[[20]](#footnote-21) Here, then, is Sartre’s “dyad.”

 We must now determine the relation between (the substance that is) a person and any accidental compound/unit of which she has become an element. Is it identity or something else? Ockham’s razor and the fact that they are co-located militates against treating them as distinct. Their modal differences, however, suggest that they should not be identified: a paronym, unlike its substantial element, cannot exist *sans* its qualified passion. R. M. Dancy contends on Aristotle's behalf that insofar as we are doing ontology- “inventory(ing)” the universe- we should disregard such differences, counting, e. g., Socrates and Socrates sensing redly as one, *a la* any competent “census-taker.”[[21]](#footnote-22) Lewis responds that a census-taker’s count should not be taken here as authoritative, at least for the purpose of doing ontology.[[22]](#footnote-23) He notes, moreover, that there are non-modal differences between them: in the normal course of events, the former, but not the latter, will eventually lack the “time-indexed” property of sensing redly at t.

 **Father Owens.**

**Temporary vs. Perpetual Identity**

 I have argued elsewhere that folk-ontology involves a dualistic conception of identity, one notion pertaining to the temporary unification of material substances and the things of which they are composed/constituted, another the intra-substantial, developmental oneness of certain 'pairs' of temporally separate entities, united across time as perpetuations of a single entity.[[23]](#footnote-24) Thus, insofar as one is concerned to preserve this conceptual scheme, one must philosophically provide for synchronic “census-taker counting” as well as mereologically alterable objects, which also entail census-taker counting, albeit across time, defining both of the above notions. Tweaking this thesis to account for the case at hand, arrive at the following distinction:

 **TI** □(x)(F)(t) (@t: Mx =t Fx ≡ @t: IFx) (where Mx is a material substance, Fx an accidental compound, 'IΦx' designates the inherence relation holding between qualified accident constituents of accidental compounds and material substances, and t is a time).

 In words: Necessarily, a material substance and an accidental compound involving it are temporarily identical at a certain time iff at that time the inherence relation holds between the former and the qualified accident constituent of the latter.

vs.

 **PI**: □(x)(y)(F) {F1x =p F2y ≡ $(∃$z)($∃$t)($∃$t\*) [Mz & (@t: F1x =t Mz & @t\*: F2x =t Mz)]}

 In words: Necessarily, temporally separated accidental compounds F1 and F2 are perpetually identical (that is, F1 =p F2) just in case there is some person P and distinct times t and t\* such @ t: P =t F1 and @ t\*: P =t F2 (i.e., both are compounds involving P, itself an embodiment of a substance universal).

 We then posit transitivity principles to account for various intuitive judgments. For example, 2 things identical to a third item ought to be identical to each other: Socrates seeing redly being Socrates and likewise Socrates sitting quietly, 'they' ought to be numerically the same as well. Thus we have:

 **TP1** □(x)(y)(z)(F)(t)[(@t: F1x =t My & @t: My =t F2z) → @t: F1x =t F2z]

 By the same token, Socrates seeing redly being identical to Socrates seeing greenly and the latter being identical to Socrates sitting cross-leggedly, we should render the first and third facts here identical. Thus:

 **TP2** □(x)(F)[(F1x =p F2x & F2x =p F3x)→ F1x =p F3x]

And, since unities develop synchronously, we should posit:

 **TP3** □(x)(y)(t)(F) [(@t: F1x=t Mx & @t\*: Mx =t F2y) → F1x =p F2y]

 TP3 yields a response to those who contend that temporary identity would violate Leibniz’s Law in respect of time-indexed properties.[[24]](#footnote-25) For a accidental compound is perpetually identical to any 'other' accidental compound that is temporarily identical to that substance to which it is (now) temporarily identical, the latter being just one of a succession of perpetually identical accidental compounds each one of which being at some time or other temporarily identical to said substance. Let us say, then, following a suggestion of Andre Gallois, that a(n) substance/accidental compound will be F at t iff it is at some time before t temporarily identical to a(n) substance/AC that will be F at t.[[25]](#footnote-26) By this standard, Socrates seeing redly in the morning would share whatever fate awaits Socrates himself, say, sleeping contentedly at night: the former will become the latter. If it is possible for the former 'pair' to be temporarily identical, then it is also possible for Socrates seeing redly to be temporarily essentially the human soul inhering in Socrates' body, that is, for the latter to “lend” to the former its essence. In borrowing it, 'he'
would acquire the above time-indexed property.

 To account for the modal differences between an aggregate and that which it constitutes, Gallois stipulates further that x is “independently” essentially F iff x is F in any possible world in which it exists and that x is at t “dependently” essentially F iff x is at t "accidentally" identical to something that is independently essentially F.[[26]](#footnote-27) Applying this distinction here, we should say (by T2) that by becoming a member of the sequence of perpetually identical facts that make up Socrates’ career, Socrates seeing redly becomes perpetually, but not necessarily temporarily, identical to any other fact to which it will be related in that manner. Socrates himself, however, is going to be temporarily identical to every possible member of that series: it is its sole “full-timer,” Socrates seeing redly being there only contingently. This diachronic fact entails their modal differences (as well as the irreducibility of the latter to the former). It would be a category mistake, however, to appeal to it in determining their relationship during the period of their co-location, for there the concern is with things existing simultaneously. Folk-ontology requires different standards for judgments of synchronic and diachronic identity. Their modal differences would, thus, not tell against their being temporarily identical. Moreover, despite only standing temporarily in this relation, they would be indiscernible in terms of their time-indexed properties. Adopting a dualistic conception of identity would, thus, allow the adverbialist to comply with the extensional version of Leibniz’s Law as well as Ockham’s Razor.

**Conclusion**

 We have been examining the relation between a subject and the qualia of his experiences. According to the two views we have considered, a quale is not a representation its subject apprehends. Both assume that a subject is “closer” to his experiences than he would be were the performance of a mental act required to grasp their qualia.[[27]](#footnote-28) To model this closeness, the bundle theorist prefers to dispense with the subject of qualia. The adverbialist’s analysis, as developed above, leaves some “room” between a subject and any fact that he forms along with a qualified passion, treating them as only factually identical. He, thus, preserves both terms of the relation, losing the 'propertyness' of qualia but not qualia themselves. Stubenberg remarks that an adequate analysis of qualitative consciousness should “save the phenomenon.”[[28]](#footnote-29) But the phenomenon in question is not merely qualia, as he suggests.[[29]](#footnote-30) Rather, it is a subject’s qualitative consciousness- the "the possessor possessed," as Sartre put it. The above development of adverbialism manages to save more of that phenomenon than does the bundle theory.

1. Adverbialism was originally developed in Roderick Chisolm’s *Perceiving: A Philosophical Study* (Ithaca, NY: Cornell University Press, 1974), pp. 115-25. Another early proponent is Wilfrid Sellars. Cf. his "The Adverbial Theory of the Objects of Sensation" in *Metaphilosophy*, 6: 144–160. See also Michael Pendlebury’s “In Defense of the Adverbial Theory of Experience,” in *Thought Language and Ontology: Essays in Memory of Hector-Neri Castaneda* ed. Francesco Orilia and William J. Rapaport (Dordrecht, The Netherlands: Kluwer Academic Publishers, 1998) pp. 95-106. I shall remain neutral here regarding the debate between dualists and materialists.
 [↑](#footnote-ref-2)
2. CQ, p. 266. Panayot Butchvarov first raised this objection. See his “Adverbial Theories of Consciousness,” in *Midwest Studies in Philosophy*, vol. 5 (1980) pp. 261-80. [↑](#footnote-ref-3)
3. *Summa Theologica* (Notre Dame, IN: Christian Classics, 1981) Question 90 Article 2. This understanding of ontological dependence is developed in Joshua Hoffman and Gary Rosenkrantz, *Substance among other Categories*, (Cambridge: Cambridge University Press, 1994), pp. 122-39 and *Substance: Its Nature and Existence*, (London: Routledge, 1997) pp. 43-72. Cf. also Locke, op. cit., vol. 1 chap. 23, p. 245, Descartes *The Philosophical Writings of Descartes*, trans. John Cottingham, Robert Stoothoff, and Dugald Murdoch (Cambridge: Cambridge University Press, 1984) 2: 114 and p. 156, and David Armstrong (*A World of States of Affairs*, Cambridge: Cambridge University Press, 1997) p. 99, Kit Kine, 'Ontological Dependence,' *Proceeding of the Aristotelian Society*, New Series, Vol. 95 (1995) pp. 269-290; E.J. Lowe, 'Ontological Dependency,' *Philosophical Papers*, 23 (1): pp. 31-48 (1994)and J.M.E. Moravcsik, 'Strawson and Ontological Priority,' in *Analytical Philosophy*, ed. R.J. Butler (Oxford: Basil Blackwell, 1965) pp. 106-119. [↑](#footnote-ref-4)
4. The name of John Locke is often associated with this view. See his *An Essay Concerning Human Understanding*, ed. John Yolton (NY: Dutton, 1965), vol. 1, chap. 23, p. 245. Whether or not he should be labeled a substratum theorist is a point of contention amongst Locke scholars. For opposing views on this matter see: M. R. Ayers, “The Ideas of Power and Substratum in Locke’s Philosophy,” *The Philosophical Quarterly*, 25 (1975) and Jonathan Bennett “Substratum,” *History of Philosophy Quarterly* 4 (1987). The two most notable modern defenders of bare particulars are Gustav Bergmann (*Realism*, Madison: University of Wisconsin Press, 1967) and Edwin Allaire “Bare Particulars” and “Another Look at Bare Particulars” both contained in *Contemporary Readings in The Foundations of Metaphysics*, ed. Stephen Laurence and Cynthia MacDonald (Oxford: Blackwell Publishers, 1998) pp. 248-54; 259-63. [↑](#footnote-ref-5)
5. See Hume’s A Treatise of Human Nature, ed. L. A. Shelby-Bigge (Oxford: Oxford University Press, 1988), I. iv. 6. [↑](#footnote-ref-6)
6. Leopold Stubenberg, *Consciousness and Qualia*, (henceforth, CQ) (Philadelphia, PA: John Benjamins Publishing Company, 1998), pp. 286-88. [↑](#footnote-ref-7)
7. CQ, pp. 286-7. Stubenberg does not provide a principle of diachronic unity for self-bundles; his view, thus, needs to be supplemented by an account of personal identity. [↑](#footnote-ref-8)
8. Hector Neri Casteneda develops a similar view of substances in “Thinking and the Structure of the World,” *Critica* 6 (1972) pp. 43-81 and “Perception, Belief, and the Structure of Physical Objects and Consciousness,” *Synthese* 35 (1977) pp. 285-351. It should also be noted that adverbialism and Stubenberg's monism' are not the only contemporary views on this subject. There is also “representationism” according to which qualia are either representations of (electro-chemical) properties of brain states or properties of mind/brain-independent physical objects. Adherents of the former view include, David Rosenthal, (“Two Concepts of Consciousness,” *Philosophical Studies* 49, pp. 329-59 “The Independence of Consciousness and Sensory Quality,” in Consciousness, ed. Enrique Villanueva Atascadero: Ridgeview Publishing Company, 1991, pp. 15-36, and “Thinking that One Thinks,” in *Consciousness: Psychological and Philosophical Essays*, ed. Martin Davies and Glyn Humphreys, Oxford:
Blackwell,1993, pp.197-223) William Lycan (*Consciousness*, Cambridge, MA: MIT Press, 1987, and “What is the Subjectivity of the Mental?” in *Philosophical Perspectives*, vol. 4, ed. James Tomberlin, Atascadero: Ridgeview, 1990, pp. 109-30) and Christopher Maloney (“About Being a Bat,” *Australasian Journal of Philosophy* 63, pp. 26-49). The latter position is held by Fred Dretske (*Naturalizing the Mind*, Cambridge, MA: MIT Press, 1995) and Michael Tye (*Ten Problems of Consciousness*, Cambridge, MA: MIT Press, 1995). I shall say nothing here about representationism beyond that I agree with Stubenberg that it leaves too much room between a subject and her qualia. [↑](#footnote-ref-9)
9. CQ, pp. 288-91. [↑](#footnote-ref-10)
10. CQ, pp.304-5, 309-10. [↑](#footnote-ref-11)
11. CQ p. 288. [↑](#footnote-ref-12)
12. CQ, p. 288. Contrary to what he asserts (CQ, p. 329) even tropes require ontic support: in that respect, they are no different than universals. [↑](#footnote-ref-13)
13. Arda Denkel, *Object and Property* (Cambridge: Cambridge University Press, 1996) p. 191-2. [↑](#footnote-ref-14)
14. Ibid., p. 191. For a similar view, see Peter Simons “Particulars in Particular Clothing,” in Laurence and MacDonald, *op. cit*., pp. 364-84. [↑](#footnote-ref-15)
15. Ibid., p.191; how much diversity is supposed to be an empirical matter. [↑](#footnote-ref-16)
16. Joshua Hoffman and Gary Rosenkrantz, *Substance among other Categories* (Cambridge: Cambridge University Press, 1994) pp. 105-13, 188-93. See *Physics* in *The Basic Works of Aristotle*, ed. Richard McKeon (NY: Random House, 1941) VI: 1. [↑](#footnote-ref-17)
17. See Gottlob Frege, “Function and Concept,” and “Concept and Object,” in *Translations from the Philosophical Writings of Gottlob Frege*, 3rd edition, ed. Peter Geach. and Max Black (Oxford: Basil Blackwell,1985) pp.21-55. [↑](#footnote-ref-18)
18. Cf. “Beyond Bundles and Substrata,” in Stephen Laurence and Cynthia MacDonald, *op. cit*., p. 244. [↑](#footnote-ref-19)
19. *Categories*, in *The Basic Works of Aristotle*, ed. Richard McKeon, op. cit., ch. 5; *Metaphysics*, in *The Basic Works of Aristotle*, op. cit., Z (VII) 6. [↑](#footnote-ref-20)
20. Frank Lewis, “Accidental Sameness in Aristotle,” *Philosophical Studies* 42 (1982), 1-5 and Michael Rea, "Sameness without Identity: an Aristotelian Solution to the Problem of Material Constitution," *Ratio (new series)* XI 3 December 1998**.** Cf. Aristotle's *Topics* A7, 103a23–31; *Physics* A7, 190a17–21, 190b18–22; *Metaphysics* D6, 1024b30–1.

1015b16–22, 1016b32–1017a6; *Metaphysics* D29, 1024b30–1. [↑](#footnote-ref-21)
21. R. M. Dancy, “On Some of Aristotle’s First Thoughts on Substance,” *Philosophical Review* 84 (1975) p. 368. [↑](#footnote-ref-22)
22. Lewis, op. cit., 22-3. [↑](#footnote-ref-23)
23. See my \_\_\_\_\_\_\_\_\_\_. [↑](#footnote-ref-24)
24. E. g., George Myro. See his “Identity and Time,” in *The Philosophical Grounds of Rationality*, ed. R. Grandy and R. Warner (Oxford: Oxford University Press, 1985) pp. 391-3. [↑](#footnote-ref-25)
25. Andre Gallois, *Occasions of Identity* (Oxford: Oxford University Press, 1998) pp., 79-100. [↑](#footnote-ref-26)
26. Ibid., pp. 168-72. [↑](#footnote-ref-27)
27. See note 17 above for a list of articles in which it is maintained that qualitative consciousness does require the performance of such a mental act. [↑](#footnote-ref-28)
28. CQ, pp. 272-3. [↑](#footnote-ref-29)
29. CQ, p. 272. [↑](#footnote-ref-30)