Aristotle on Genus and Differentia in the Topics and Categories

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Each of Aristotle's early works, the *Topics* and the *Categories*, provides important evidence for Aristotle's holding two accounts of the nature of the genus and differentia. In one account genus and differentia are radically distinct in nature. In the other they are much the same. In this paper I shall make a case for Aristotle's holding each account, suggest why he adopts them, and consider which of the two is the earlier one.

I shall often refer to Aristotle's categorical distinction between substances (or secondary substances) and non-substances. I take it to distinguish between the kinds Aristotle deems ontologically significant and the characteristics of the instances of those kinds. The distinction between kinds and characteristics arises from the syntactical distinction between nouns and adjectives: nouns express kinds; adjectives express characteristics. The ontologically significant kinds have for their instances the basic entities in Aristotle's ontology. These kinds reveal what kinds of things the basic entities are with respect to their essential nature. For this reason, according to Aristotle, the ontologically significant kinds are the genera and species of the basic entities. I shall refer to these kinds as "substantial kinds."

A species is a complex of its genus and differentia (or differentiae): for example, the species *man* is a complex of the genus *animal* and the differentia two-footed. Accordingly, genus and differentia define the species, and they belong necessarily to the species. Because
genus and differentia make up the definition of the species, they provide the account of its basic nature or essence, its "ti ēn einai" (Top. I.5.101b38). In the definition the genus divides the species from things in general, and the differentia distinguishes it from the other things falling under its genus (Top. VI.3.140a27-29). This brief description, which I derive primarily from the Topics, of genus, differentia and species holds for the two accounts of genus and differentia that I discuss.

II

The Topics and Categories indicate that at one point Aristotle believes that a radical distinction holds between the genus and differentia of substances. This distinction is the categorical distinction between kind and characteristic, which Aristotle marks by holding that the genus alone shows the ti esti, the "what-it-is," of the definiendum and that the differentia shows only a poion ti, a "certain quality," of the definiendum.

In Topics I.5, when Aristotle first introduces the predicables, he defines the genus in these terms:

The genus is what is predicated in the ti esti ("what-it-is") of many things differing in species (I.5.102a31-33). Elsewhere it is evident that at least at one point in his thought the genus alone of the elements in the definition represents the ti esti; for Aristotle holds that it is an error not to place the ti esti first in the definition and that this is why the genus is properly placed first, since it is meant to indicate the ti esti (Top. VI.5.142b22-29). The differentia, in contrast with the genus, does not concern the ti esti and is clearly distinct from the genus; a "bad mistake" then is made, accord-
ing to Aristotle, if one renders the differentia as the genus:

...for the differentia is the genus of nothing. That this is true is evident; for no differentia signifies the *ti esti*, but rather a *poion ti* ("certain quality"), such as footed and two-footed (*Top. IV.2.122b15-17, cf. VI.6.144a15-19*).

These views concerning the roles of genus and differentia are surely Aristotle's, since in expressing them he does not qualify them by holding that each "seems" to be the case, as he often does when presenting a particular position in the *Topics*; moreover, his holding that a "bad mistake" is made when one renders the differentia as a genus strongly suggests that he offers his own view. These distinct roles for genus and differentia obtain not only for substances but for non-substances as well: for instance, state, the genus of the non-substance virtue, indicates the *ti esti* of virtue, whereas good, its differentia, does not indicate the *ti esti* but rather a *poion ti*.  

The *Categories* maintains that the genus and species of primary substances are the only predicates that are substances because they reveal the *ti esti* of primary substances (5.2b29-33). The *Categories* also notes that the differentia is not a substance (5.3a21-22). The genus and species, like their specimens, are thus found in the category of substance; the differentia is not. The *Topics* reflects these doctrines: it holds that the genus is in the same category as its species (*IV.1.120b36-121a 9*); it remains silent about whether the differentia is in the same category as its subjects; it maintains that the differentia can never signify a "this," a *to de*, which on Aristotle's terms represents a substance.  

Clearly, as one would expect, Aristotle's distinction between genus
and differentia in terms of \textit{ti esti} and \textit{poion ti}, "what-it-is" and "certain quality," amounts to a categorical distinction in the case of substances. The genus as the \textit{ti esti} of a substantial definiendum is a substance or substantial kind; the differentia as a \textit{poion ti} is a non-substance or characteristic in the category of quality. Aristotle simply recognizes explicitly what he finds in the definition, a kind and a characteristic, and marks their categorical difference plainly by his use of \textit{ti esti} and \textit{poion ti}.

Aristotle's few remarks in the \textit{Topics}, which concern the meaning of \textit{ti esti}, support the interpretation that a predicate in the \textit{ti esti} of a substance must be a substance or substantial kind. In \textit{Topics} I.5, where Aristotle gives his account of the genus as a predicate in the \textit{ti esti}, he explains that such a predicate is given in response to the question, "what is the object before you?" By way of illustration, he says that if one is presented with a man, one says what it is by saying that it is an "animal" (102a32-35). Thus a predicate in the \textit{ti esti} signifies what kind of thing the object is. Indeed, it is hard to see how \textit{ti esti} could signify anything else. Greek, as well as English, will not allow anything else in response to a question about what something is except a noun and thus a kind expressed by the noun. Moreover, in the case of substances a predicate in the \textit{ti esti} signifies the object's kind with respect to its nature, its substantial kind, not just any kind it happens to fall under.\textsuperscript{9} This interpretation is supported by Aristotle's examples of these predicates here in \textit{Topics} I.5 and in the important discussion of the categories in I.9, the only other place in which he indicates the meaning of predicates in the \textit{ti esti}; for Aristotle limits
his examples to the species and genera of the substances and non-substances used in illustration and at no point offers a differentia as a predicate in the τί ἐστί. (Besides, substantial kinds seem to be the only kinds for substances Aristotle recognizes as kinds; for, when he considers some other kinds a substance might belong to, for example, "boxer" and "runner" in the Categories, he seems to treat them as characteristics (8.10a27-b11).) It is evident then why the differentia is not a predicate in the τί ἐστί of a substance. For the differentia, insofar as it is a characteristic, is not a kind and a fortiori not one of Aristotle's substantial kinds. Hence, when it applies to a substantial definiendum, it cannot indicate the latter's τί ἐστί. Aristotle says as much about characteristics in general, when in Topics I.9 he maintains that predicates in the non-substantial categories, when predicates of things outside their categories, namely substances, do not signify a τί ἐστί but only a quality or a quantity or some other non-substantial item (103b35-39).

Besides the important distinctions already noted between genus and differentia, other perhaps less important differences, but certainly relevant to my discussion, hold between them. As I noted, the genus is properly the first term in the definition because it is the τί ἐστί; it is also the more familiar or knowable term and prior in intelligibility to the differentia. These latter two points of difference, which may in fact come to the same thing, also perhaps reflect the categorical distinction between genus and differentia; for Aristotle believes that substances are prior in knowledge to non-substances (Met. VII.1.1028a32-33). At any event, these two differences, together with its being the
first term in the definition, indicate that the genus is the more important term in the definition; its preeminence is no doubt due to its role as the ti esti. In addition, at one point in the Topics Aristotle holds that the specimens and species of a genus "partake" (metechein) of the genus, where "partake" means "admit the definition of" (IV.1.121a10-19). In this same context he says nothing about the differentia, although elsewhere in the Topics he does hold that it belongs to its subject as an "attribute according to participation" (kata methexin huparchon); he explains that such a predicate is in the ti en einai, but he does not say that its subjects admit its definition (V.4.132b35-133a3). At other points in the Topics Aristotle holds that the genus and species are "synonymous," that is, possess the same definition, and that the species and its specimens are synonymous. Aristotle ignores the differentia also in these discussions. Perhaps these differences concerning participation and synonymy reflect too the categorical distinction between genus and differentia: Aristotle might believe that if a substantial subject admits the definition of the non-substantial predicates belonging to it, it would appear to be a non-substantial item.

When one considers that Aristotle derives his notion of definition from the Platonic procedure used to develop a definition through division, one can readily appreciate how he might come to introduce into the definition of a substance categorically distinct predicates: a substantial kind and a characteristic, or, in his terms, the genus and differentia of the substance. According to the bare features of division, one develops a definition first by distinguishing the definiendum from things in general through one broadly encompassing predicate, what would
be Aristotle’s highest genus, and then by distinguishing the definiendum from the other things encompassed by that predicate through additional predicates, Aristotle’s differentiae. This procedure is reflected in the definition by what Aristotle says in the Topics about distinguishing between genus and differentia in the definition: that the genus ought to separate the definiendum from things in general and the differentia from the other things encompassed by the genus (VI.3.140a27-29). If one follows the procedure of division in the development of the definition and also uses the definition to express the nature of the definiendum, as Aristotle does, then it would only be natural in the case of kinds to introduce a kind as well as characteristics into the definition. It seems only natural that in separating a kind from everything in general, from all other kinds and from all characteristics, one would use a kind to perform this task, especially if one were also concerned with capturing the nature of the definiendum: kinds would divide kinds from all else and would show their nature as kinds. And once one delineates the definiendum by one of its kinds, there would be no reason to distinguish it by additional kinds to capture its nature as a kind. One would then be free to use characteristics to differentiate it from the other kinds of the same kind, and, since things differ mostly in terms of the characteristics they possess (cf. Cat. 8.11a15-19), it would be natural to pick them as the additional differentiating predicates. Hence characteristics as well as a kind would enter the definition of a substantial definiendum.

III

When Aristotle first distinguishes between the four predicables in the Topics, he does not find it necessary to single out the differentia as a
distinct subject for investigation. Since it is "genus-like" in character, it may be ranked with the genus: ὅνα ουσίαν γένικὰν ἄραι μὴν ὀνομάσαι τοῖς γένεσιν (I.4.101b18–19). That Aristotle classifies it in this fashion would suggest that he considers the differentia to be much like the genus, that in the case of substances he treats their differentiae like substantial kinds. There is additional evidence for this interpretation in the Topics and also in the Categories.

Toward the end of Topics IV Aristotle finds it necessary to point out again that the genus is predicated of the species in the τι ἐστι; yet this time he pauses to remark that "some believe" that the differentia too is predicated of the species in the τι ἐστι. He does not try to refute this opinion, but rather remarks that one should distinguish the genus from the differentia by appealing to three considerations, one of which is that in giving the τι ἐστι it is "more fitting" for one to state the genus than the differentia (IV.6.128a23–26). At some point, then, Aristotle believes that the differentia also indicates the τι ἐστι of the definiendum, although not so clearly as the genus indicates the τι ἐστι.

At the beginning of Topics VI one of the subjects Aristotle designates for examination concerns the placement of the definiendum in its appropriate genus, and he remarks in passing that the definiendum should be placed in the genus first and then the differentiae should be added:

...for of the elements in the definition the genus seems especially to signify the substance (οὐσία) of the definiendum (VI.1.139a29–31).

Aristotle's use of "seems" suggests that this view may not be his own. But its use need not mean that. For he speaks in this way throughout
the *Topics*, and his stating an opinion in this fashion may mean no more than that it is a "generally held" view. It is evident, however, that according to this view the other things in the definition, the differentiae, also contribute to the *ousia* of the definiendum; for if the genus alone contributes to the *ousia* it would not be the one that contributes "especially" to the *ousia*. And if here *ousia* means *ti esti* (cf. I.9.103 b22), then the differentia would contribute to the *ti esti* of the definiendum.

At any event, there are places in the *Topics* in which Aristotle clearly embraces the view that the differentia, as well as the genus, is a predicate in the *ti esti*, and in which he also does not seem to consider the differentia to be any less important than the genus in the definition:

...a definition is an expression showing the *ti en einai* of a thing, and it is necessary that the predicates in the definition are only ones predicated in the *ti esti* of the thing, and the genera and differentiae are predicated in the *ti esti*... (VII.3.153a15-18).

...that of the things in the definition having been rendered, one is the genus and the other is the differentia, and the genus and the differentia are predicated in the *ti esti* (VII.5.154a26-28).

These remarks from the *Topics* concerning *ti esti* indicate another account of genus and differentia, in which a genuine categorical distinction does not obtain between them; both are predicates in the *ti esti*, and both seem to be about the same in importance in the definition. In
this account the differentia, although a characteristic, takes on an im-
portant mark of the genus and thereby comes either to resemble a substan-
tial kind or in effect to be replaced by such a kind. For the different-
tia would seem no longer to be a characteristic but instead a substantial
kind, if, like the genus, it is to be given in response to the question
concerning the \textit{ti esti} of the definiendum. For example, the differentia
two-footed is a characteristic; nevertheless, when it comes to indicate
what a substance is, its \textit{ti esti}, it is in fact replaced by the kind
'two-footed thing,' which as the \textit{ti esti} would be a substantial kind. If
this replacement occurs, then genus and differentia are not actually
categorically distinct, and all the terms in the definition are in fact
substantial kinds. As far as I know, Aristotle always considers the dif-
ferentia to be a characteristic, and certainly he does so late in his
career.\textsuperscript{15} Thus, if this replacement occurs, he probably does not realize
fully the import of his analysis of the differentia.

The \textit{Categories} also indicates another important way in which Aristot-
le treats the differentia as a substantial kind or like the genus. Be-
fore the relevant passages in the \textit{Categories} can be appreciated, however,
some distinctions made in the \textit{Categories} need to be summarized. In \textit{Cate-
gories} 2 and 5 Aristotle distinguishes between the relations of being-
said-of-another and being-in-another. Things said of another are predi-
cates that have their name and definition predicated of their subject:
the genus animal is said of its species man, and they in turn are said of
particular men; the genus color is said of its species white, and they
are said of instances of white. Things in a subject have sometimes their
name, but never their definition predicated of the subject they are in:
color and white are in body, both body in general and particular bodies. No substance is ever in a subject, both the primary substances, particular men, for instance, and the secondary substances, the genera and species of primary substances. The genera and species of primary substances are themselves substances because they alone of predicates reveal the ti esti of the primary substances. Things in a subject are non-substances or characteristics, and they are found only in substances, both the primary and secondary types. From Aristotle's explanations and his examples it would appear that the said-of-relation is an intra-categorical one, that only things of the same category or type can be said of one another, and that the in-relation is an inter-categorical one, that it can hold only between substances and characteristics, and every characteristic must be in a substance.16

But Aristotle does not agree, or at least did not always agree, with all of these conclusions. For the differentiae of substances, which Aristotle explicitly says are not substances, nevertheless are, like any substance, not in a subject, and, like secondary substances, they are said of their substantial subjects, primary substances and their species: No substance...is in a subject. This is not, however, peculiar to substance; the differentia also is not in a subject. For footed and two-footed are said of man as subject but are not in a subject; neither two-footed nor footed is in man. Moreover, the definition of the differentia is predicated of that of which the differentia is said. For example, if footed is said of man the definition of footed will also be predicated of man; for man is footed (Cat. 5.3a20-28, Akrill's trans.).
Accordingly, in the *Categories* the differentia, unlike any other characteristic, has two important properties of the secondary substance, and thus it resembles strongly the nature of a substantial kind. Aristotle goes on to underscore the similarity between secondary substance and differentia with respect to the points raised here by maintaining that by virtue of their being said of their subjects they are the only predicates whose subjects called after them are so called "synonymously," that their subjects have the name and definition in common with them (5.3a33-b9). Hence in the *Categories* Aristotle contradicts a position that he holds in the *Topics* and that I take to be evidence for a categorical distinction between genus and differentia: that the definition of the genus, but not that of the differentia, is predicated of the subject.\(^{17}\)

The following considerations suggest how Aristotle might come to treat the differentia like the genus.\(^{18}\) Since the differentia, unlike the other characteristics, plays a role in the definition of the essence, since it, as well as the genus, is given in rendering an account of the nature of the definiendum and belongs necessarily to the definiendum, Aristotle might come to think of it, like the substantial genus, as playing a categorizing role and as capable of being given in response to the question concerning *ti esti*: man, for instance, is a two-footed thing as well as an animal. But, if so, Aristotle in effect converts a characteristic into a kind; he replaces his differentia, which is supposed to be a characteristic, with a kind formed from it—the characteristic two-footed is replaced by the kind, two-footed thing—and as a predicate in the *ti esti* it is replaced by a substantial kind. It is perhaps easy for Aristotle to carry out this replacement without clearly recognizing its oc-
curring because of the ambiguity of the expressions he uses to signify differentiae. Aristotle's examples of the differentia in the Categories are the characteristics, pezon and diapoun (footed and two-footed), which are some of his most popular examples of the differentia and for this reason would seem to be paradigmatic differentiae. The expressions, pezon and diapoun, although strictly neuter adjectives, can function in Greek as nouns; they are analogous to the English substantival phrases that are formed through the addition of the dummy word "thing" to an adjective: for example, "white thing." Pezon and diapoun might then be translated by the substantival phrases, "footed thing" and "two-footed thing," or even the substantives, "pedestrian" and "biped," as well as by the adjectives, "footed" and "two-footed." This account of pezon and diapoun also applies to Aristotle's other common examples of the differentia. Accordingly, Aristotle's expressions for differentiae can indicate kinds as well as characteristics, although kinds formed from characteristics. I suggest that the ambiguity of these expressions for differentiae may have made it easier for Aristotle to interpret the differentia in terms of the notion of kind, or in effect to replace it with a substantial kind, without his seeing clearly the depth of his change in attitude toward the differentia, which in the Categories, as well as throughout his career, he still regards as a non-substance or characteristic.

IV

Two accounts of genus and differentia emerge from the foregoing examination of the Topics and Categories. The passages first examined indicate that Aristotle formulates a sharp distinction between genus and different-
In the case of substances the genus is a kind in the same category as its substantial definiendum, and thus it is categorically distinct from the differentia, a characteristic outside the category of the definiendum. Because the genus is the substantial kind of the definiendum, it alone of the terms in the definition indicates the \textit{ti esti} of the definiendum, and consequently it is the more important term in the definition. Furthermore, the definition of the genus, but not that of the differentia, applies to the definiendum. Yet the passages subsequently examined from the \textit{Topics} and \textit{Categories} also clearly indicate that Aristotle does not consistently hold to such a sharp distinction between genus and differentia and that he also thinks of them as about the same in character and importance in the definition. Passages in the \textit{Topics}, which indicate a strong similarity between genus and differentia, hold that the differentia, as well as the genus, signifies the \textit{ti esti} of the definiendum, and in effect treat the differentia as if it too were a substantial kind. Since both differentia and genus indicate the \textit{ti esti}, both would seem to be equally important in the definition. Some passages seem to treat them as the same in status; others favor the genus.\textsuperscript{22} Nonetheless, since the differentia too indicates the \textit{ti esti}, it would certainly seem to play a more important role in the definition than it does in the first account examined, since in the latter the differentia is inferior to the genus because it does not indicate the \textit{ti esti}. The \textit{Categories} reflects the similarity of genus and differentia inasmuch as it holds that, like any substantial genus and unlike any other characteristic, the differentia is not in its substantial subject and also its name and definition apply to its substantial subject. I propose that the two accounts represent dif-
ferent stages in the development of Aristotle's thought concerning genus and differentia and also that the account in which genus and differentia are genuinely categorically distinct occurs first in Aristotle's thought.

How can I maintain that evidence for each account occurs in the same work, even in the same chapter of the Categories, and still maintain that they represent distinct stages in Aristotle's thought, instead of incompatible views he holds simultaneously? Since the accounts do conflict, and if they can truly be attributed to Aristotle, it seems only reasonable and charitable, even if some of the evidence for them arises in the same work, to argue that they represent different stages in his thought, at least initially and until additional contrary evidence is available, rather than to accuse him of holding simultaneously incompatible views. Moreover, it is certainly possible that many of Aristotle's works contain material from various periods in his career. For it is a plausible and generally accepted view that his extant works are lecture notes or provided the memoranda for his actual lectures and that he would have used them over long periods, during which he would probably have revised them periodically and introduced new material into them. In addition, it is not at all surprising that the Topics contains evidence for many different periods in Aristotle's thought; for, as a handbook of dialectical debate, it would be especially open to the addition of new material as it developed. Also, since the Categories is perhaps a collection of pieces composed independently of one another, material from various periods might have found its way into it, even into the same chapter.

On the issue of the temporal priority of one of the two accounts, I suggest that it would be natural for Aristotle to formulate initially a
sharp categorical distinction between genus and differentia. As I argued in section II, Aristotle develops his notion of definition in terms of definition by division, and consequently he actually confronts categorically distinct items in the definition of a substantial definiendum, a kind and a characteristic, which he distinguishes in a categorical fashion by his use of *ti esti* and *poion ti*. His treatment of genus and differentia as in effect categorically the same perhaps comes about over a concern for the special status of the differentia as a type of characteristic. It is not like other characteristics: unlike them, but like the genus, it belongs necessarily to its subject and as an element in the definition concerns the nature of the definiendum. As I suggested in section III, these points of resemblance pressured Aristotle into an evaluation of the differentia in terms of the genus. I propose that it is at least unlikely that Aristotle would respond to such pressures early in his thought when he first spells out his categorical scheme in the *Topics* and *Categories*. Rather in that early period, in which he definitely acknowledges clear distinctions between kinds and characteristics,26 when he faces the categorically distinct genus and differentia in the definition, he would probably acknowledge them for what they are. For initially, when articulating clearly the categorical distinction between kind and characteristic, he would more likely treat the differentia simply like any other characteristic when contrasting it with the genus insofar as the genus is a kind: namely, as a characteristic and thus as an item distinct categorically from a kind. It would be later in the development of his thought on the categories that he would respond to the pressures of resemblance to reevaluate the differentia in terms of the
genus. For, in addition to the categorical distinction between kind and characteristic, he would have to recognize fully another profound distinction in the categorical scheme: it would have to come home to him forcefully how considerably different the differentia is from the other characteristics that are not differentiae. It is at least plausible that this sort of recognition would arise at a later stage for Aristotle, well after he delineates the categorical distinction between kind and characteristic.

Furthermore, the passages directly supporting the similarity of genus and differentia are so located or expressed that a case can be made for their being later additions. Of the passages from the Topics, the one in which Aristotle says that the differentia is much like the genus (101b18–19) occurs in chapter four of Book I. This chapter is an introductory chapter, which Aristotle would perhaps rework as the content of the Topics developed over the years. Besides, the passage in question occurs as a parenthetical remark and for this reason alone might be a later addition. Of the passages holding that the differentia indicates the *ti esti*, one (128a23–26) occurs in the final chapter of Book IV; thus it certainly could be a later addition, because the end of a book is a convenient place to introduce additions. Another (139a29–31) occurs as a parenthetical remark very close to the beginning of the first chapter of Book VI. Besides being a parenthetical remark, it might also be a later addition because the first part of a first chapter of a book would be a place where additions might be fairly easily introduced. The two most important and clearest expressions of the view that the differentia indicates the *ti esti* (153a15–18, 154a26–28) occur in Book VII, the next to
the last book of the *Topics*, which, like Book VIII, there is good reason to believe is as a whole later than the bulk of the *Topics*. The passage from the *Categories*, which draws a parallel between the differentia and secondary substance (3a21-28), occurs in chapter five, which Aristotle devotes to an explication of the marks of substancehood. The passage on the differentia is a digression and might then be a later addition; it occurs just after Aristotle's discussion of how the substance cannot be in a subject, and Aristotle introduces the remarks on the differentia as an aside to show that this feature, as well as its being said of its subject, is not a peculiarity of substance but also belongs to the differentia. The passage about the differentia as a predicate synonymous with its subject (3a33-b9) also includes comments on the possession of this feature by the secondary substance as well. But since this passage occurs only a few lines after the passage on the differentia as an item not in but said of its subject, and since it reinforces the similarity between secondary substance and differentia by spelling out a consequence of their not being in but said of their subject, it too might be a later addition and have entered the text at the same time as the passage on the differentia as an item not in but said of its subject. The material between the two passages (3a29-32) is also of the nature of an aside in the form of a clarification of Aristotle's use of "in a subject." All three passages might then have entered the text at the same time; for two of them deal with the differentia, which are also the only passages concerning the differentia in chapter five, and the other one clarifies a phrase just used in a description of the differentia. Certainly all three passages could be eliminated from chapter five without detriment to Aristotle's discussion of substancehood.
Footnotes

1. It is a generally accepted view that the *Topics* is very early: Pamela M. Huby, "The Date of Aristotle's *Topics* and its Treatment of the Theory of Ideas," *Classical Quarterly* 12 (1962): 72; in n. 1 on p. 72 Huby refers to many of the scholars who believe the *Topics* to be very early. For the view that the *Topics* and *Categories* were written about the same time, see: Isaac Husik, "On the *Categories* of Aristotle," *Philosophical Review* 13 (1904): 514-528; L. M. De Rijk, "The Authenticity of Aristotle's *Categories*," *Mnemosyne* 4 (1951): 129-157.

2. Cf. Cat. 5.2a11-19, 2b29-37.


4. E.g., cf. Cat. 5.3a23, Top. VI.4.141b31-32 ff.

5. VI.4.141b22-34, 5.144a23-27.

6. Unless otherwise noted, the translations are mine.

7. *Top*. VI.6.144a15-16; also the genus of anger is a predicate in the *ti esti* of anger, IV.6.127b30-31. Since I believe that Aristotle thinks primarily of the genus and differentia as the genus and differentia of substantial kinds, I concentrate on them in my discussion. Several considerations support this view. First, Aristotle's paradigmatic genus and species are substantial kinds rather than characteristics: the first example of the genus in the *Topics* is animal (I.1. 101b31); in his first discussion of the genus, animal is its only illustration, and the species are illustrated by man and ox; D. M. Balme points out that the "stock" examples of genus and species in the logical works are animal and man: "*Genos* and *Eidos* in Aristotle's Biology," *Classical Quarterly* 12 (1962): 84. That Aristotle uses
substantial kinds as his paradigmatic examples suggests that he construes analysis in terms of genus, differentia and species primarily in terms of substantial kinds. Second, in the Topics, the only work in which Aristotle discusses at length genera and differentiae of both substantial kinds and characteristics, he does not seem to distinguish in important respects between their genera and differentiae. Third, in his discussion of genus and differentia outside the Topics Aristotle rarely refers to the genus and differentia of characteristics. Fourth, Aristotle seems plainly to deny in the Metaphysics that analysis in terms of genus, differentia and species applies to the non-substantial categories (VII.4-5).

8. Top. VI.6.144a20-22, cf. Cat. 5.3b10.

9. The *ti esti*, of course, contributes to an account of the nature or essence of an item, its *ti en einai*, and remarks outside the Topics indicate that the *ti esti* may be equivalent to the *ti en einai* (*Post. Ana. II.13.96a20-b2, Met. VII.4.1030a16-18, 5.1031a11-12; cf. J. D. G. Evans, Aristotle's Concept of Dialectic (Cambridge: Cambridge Univ. Press, 1977): 112). This equivalence could not, however, hold in every use of *ti esti* in the Topics. For, as I have noted, at certain points Aristotle holds that the differentia does not contribute to the *ti esti*; but the differentia is an element in the definition, which is the account of the *ti en einai*, and as such an element the differentia would contribute to the *ti en einai* (cf. V.4.132b35-133a3); thus *ti esti* and *ti en einai* are not always synonymous expressions.


12. Aristotle would seem to be committed to this view by his belief that the categories—substance, quality, quantity and so forth—are the *summa genera* of the items falling in the categories (cf. Met. V.6. 1016b33-34, On the Soul I.1.402a23-24) and his belief that the said-of-relation is transitive in nature, that what is said of a predicate is also said of that which the predicate is said of, where "said of" signifies predication in name and definition (Cat. 2 and 3). If quality is said of two-footed, then quality would be said of whatever two-footed is said of.


15. Cf., e.g., Met. V.14, 28.1024b8-9, VIII.2.1042b22, X.9.1058a37, PA I.4.644a35.


17. IV.1.121a10-19, 3.123a27-29, 6.127b5-7; see also p. 6.

18. My discussion of this issue is much indebted to Ackrill, pp. 86-87.

19. Besides the discussion in *Categories* 5, both of them or one or the other of them shows up in the important discussions concerning genus and differentia in Cat. 3, Top. VI.6.144b12-30, Pr. Ana. I.31, Post. Ana. II.5, 13, Met. VII.12, X.9 and PA I.2-3.

20. *Schizopoun*, *ptēnon*, *pteron*, *enudron*, *thnēton* and *hēmeron*; these too
show up in many of the important discussions of genus and differentia which are referred to in n. 19.

21. Cat. 5.3a21-22; e.g., Met. V.14, 28.1024b8-9, VIII.2.1042b22, X.9. 1058a37, PA I.4.644a35.

22. Top. IV.6.128a23-26 and VI.1.139a29-31 favor the genus, and VII.3. 153a15-18 and 5.154a26-28 do not favor one over the other.


25. Because of their clear lack of connection with the chapters preceding them, chapters 10-15 have generally been thought not to be original parts of the Categories: De Rijk, pp. 149-159; cf. Ackrill, 69-70. De Rijk has also argued that chapters 7-9 were originally a "separate treatise," p. 146. Chapters 1-3 clearly provide material needed to understand the discussion of the categories in chapters 4-9. But
the abrupt beginning of the Categories, the lack of clear transitions between each of the chapters making up 1-3 and the lack of a clear transition between the two sets, 1-3 and 4-9, suggest that chapters 1-3 were not written together and that 1-3 and 4-9 did not originally form a single work.

26. For example, in Categories 2 the distinction between "things said of a subject and not in a subject" and "things said of a subject and in a subject" designates a distinction between kinds and characteristics.


28. I should like to thank E. B. Allaire for many helpful criticisms of an earlier version of this paper.