

A Commentary On Book *Alpha Elatton* Of Aristotle's Metaphysics

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In "The Christian Origins of Contemporary Institutions"¹ James Doull sketches a comprehensive understanding of Aristotle which reveals a logical coherence in Aristotle's philosophy not commonly held to be present by recent scholarship. An integral aspect of Doull's understanding of Aristotle is his argument for a continuity and development from Plato to Aristotle: he argues that Aristotle not only understands Plato but is sympathetic to his philosophical aspirations.² Aristotle is understood to arrive at a first principle which is actual and is an effectual teleological principle. This is what Plato was seeking and had poetically expressed in the middle (ideological) dialogues but was frustrated in articulating in its logical form in the later (*stoicheiological*) dialogues. Doull's interpretation brings into question the predominant interpretation of Aristotle as an empiricist in contrast to Plato the idealist.³ He challenges us to ask whether the terms of this opposition are not anachronistically imposed on Aristotle's texts.

An important factor in the tenacity of this opposition as a starting point of interpretation can be found in the influence of Werner Jaeger's developmental hypothesis. The multifarious and often diametrically opposed conclusions about Aristotle's intellectual development arrived at by scholars employing Jaeger's methodology have revealed the limitations of that methodology.⁴ However, the view of fundamental discontinuities in Aristotle's thought has continued to have a pervasive influence. This view lends itself to construing isolated sections of text in the categories of later philosophical debates, and encourages the dismissal of or inattention towards Aristotle's theology. The latter is not surprising since the distinction and relation of divine thinking to human thinking, of divine life to human life is not readily accessible in the philosophical climate of the 19th and 20th centuries. Doull, by contrast, argues that, rather than being an anomaly, the articulation of God as the concrete actuality of *noesis noeseis* is central to the illumination of Aristotle's works. Doull's synoptic view has remained foreign to standard Aristotelian scholarship in the English-speaking world, in part because "we

¹ J.A. Doull, "The Christian Origin of Contemporary Institutions," *Dionysius* 6 (1982), 111-165. I would like to thank Robert Crouse and Dennis House for their many helpful suggestions in an earlier version of this paper.

² Doull, 142-145. With this cf. Dennis House, "Did Aristotle Understand Plato?" *Animus* 1 (1996).

³ On the problem of interpreting Aristotle as an empiricist cf. Doull, 141.

⁴ This has been methodically documented by Giovanni Reale in *The Concept of First Philosophy and the Unity of the Metaphysics of Aristotle*, trans. J.R. Catan (Albany: State University of New York Press, 1979).

demand the language we are accustomed to, and that which is different from this seems not in keeping but somewhat unintelligible."⁵ It is generally assumed that there are different and irreconcilable strands in the *Metaphysics*, broadly characterized as aetiological, ontological, *ousiological* and theological.⁶ There is also a general disinclination to understand an historical development in thought. Hence differences, here between Plato and Aristotle, are naturally taken to be opposed conceptualizations of the world (perhaps the result of opposed temperments). In this context, Doull's philosophical interpretation of the Aristotelian philosophy, which involves a re-assessment of the general character of the whole enterprise, is not easily grasped.

If we wish to re-consider the general character of Aristotle's thought, it is particularly helpful to examine Book a of the *Metaphysics* because in it Aristotle pauses in the development of his universal science to ask questions about the nature of philosophy and the condition of its possibility. Out of this questioning the first principle as the ground of thinking and being emerges. God is not only intimated to be the primary object of Aristotle's science but also its ever-present condition. Aristotle returns to the development of the universal science in Book B where he gives a scientific formulation of the *aporiai* that the history of philosophy considered in Book A has produced. Out of these *aporiai* we progress towards the knowledge of the first principle. That we are on the way *to* the first principle and not moving *from* it is important. The resultant lack of a systematic exposition makes it easier to construe Aristotle's *Metaphysics* as having irreconcilably opposed theological, aetiological, ontological and *ousiological* elements. Doull's interpretation clarifies how, philosophically, these are interrelated.

Appealing to Book a for aid in understanding the general character of the *Metaphysics* assumes that it is an authentic treatise and has a proper role to play in its location in the *Metaphysics* as we have received it. These, however, are contentious points. It is a short and enigmatic book which has caused great difficulty in interpretation. This has led many scholars of the last two centuries to reject it as an authentic component of the *Metaphysics*. I will therefore address these questions while commenting on the text. Book a is concerned with the nature and possibility of *theoria* - the philosophical science whose end is wisdom. This concern arises directly out of the material covered in Book A, and helps prepare the way for the subsequent books of the *Metaphysics*. In Book A, after a succinct treatment of wisdom and its relation to all human activity in the first two chapters, we are introduced to the science of first philosophy by entering into it immediately in the analysis of the history of philosophical thought. This is akin to learning to swim by being thrown directly into the water without prior coaching. Such an approach is necessary, because we cannot *prepare* to think before we *begin* thinking. But this need to enter into thinking directly leaves open the possibility of misunderstanding the activity in which we are engaged. Hence Book a steps back from the argument and, through a series of *aporiai*, causes us to think about how it is possible that there can be an argument at all. Chapter one is concerned with the nature of philosophy, understood as

⁵ Aristotle, "Metaphysics," trans. W.D. Ross in *The Basic Works of Aristotle*, ed. Richard McKeon (New York: Random House, 1941), a.3. 994b 32-33. References to the English translation of the *Metaphysics* are to this edition unless otherwise noted.

⁶ Cf. Reale.

theoria; chapter two is concerned with the condition of its possibility, understood as the ground of all thinking and being; and chapter three is concerned with the question of developing the proper methodology of the science which is its fulfilment. The central question - how is philosophy possible? - is the unifying idea of Book a and makes intelligible its location in the metaphysical treatises as we have received them.

Book a begins with a seemingly trite sentence: "The investigation of the truth is in one way hard, in another easy."⁷ But this reference to the search for wisdom introduced in Book A gives us an important indication of the purpose of Book a, for it suggests an *aporia* which is implicit in the prior discussion. To see what this is we must keep in mind Aristotle's audience. Following Jaeger in taking the texts of Aristotle to be something of the nature of seminar notes, we must envision an audience of students already familiar with the discussion of other texts. At a minimum, it is reasonable to assume that these would have included the *Nicomachean Ethics*, the *Posterior Analytics* and the *Physics* given the explicit references to these, and probably included also (given probable references to them) *De Caelo* and *De Generatione et Corruptione*.⁸ These students would have just been struggling through the ideas and problems presented in Book A and are likely to be asking themselves whether the search for wisdom is possible at all.

How is it that A leads us to this problem? In the vision of human activity in A.1-2 we can discern an implicit argument *reductio ad absurdum* that there must be a *logos* at work in the world as it is in our thinking. Aristotle outlines a hierarchy of increasingly more complete forms of human knowing from sensation through memory, experience, art and finally science. The higher forms, while understood to follow temporally upon the lower, are comprehensive of these (the objectivity of the ascent of induction being dependent upon the ontological priority of the descent of reason). Further, by referring us to the *Ethics*, the distinctions and relations of the science's and of productive, practical and contemplative activities are brought before us. A.1-2 emphasizes the side of the knower but this is never divorced from the side of the known. Our knowledge is always knowledge of something. In this context a denial of a *logos* at work in the world leads to the loss not only of scientific knowing but of every form of knowing down to sensation, not only of contemplative activity but of practical and productive activities as well. Its acceptance allows for "the truth itself" to be moving the history of thought.⁹ Aristotle does not explicitly begin to work out how this is possible until Book G where it is argued that the structure of our knowing and the structure of being are one, though its ultimate condition - that the first principle itself not be caught in an opposition of subject and object - is hinted at in A.2 when God is said to be both the knower *par excellence* and the known *par excellence*.¹⁰ That there must be a *logos* at work in the world as it is in our

⁷ a.1. 993a 30.

⁸ These references can be found as follows: *Nicomachean Ethics* at A.1. 981b 24; *Physics* at A.3. 983b 1 and numerous other places; *Posterior Analytics* at D.30. 1025a 34, Z.12. 1037b 8; *De Caelo* at A.5. 986a 12, L.8. 1073a 32; *De Generatione et Corruptione* at H.1. 1042b 8. References to the Greek text are to *Aristotle's Metaphysics: a revised text with introduction and commentary*, W.D. Ross (Oxford: Clarendon Press, 1970).

⁹ A.3. 984b 10.

¹⁰ A.2. 983a 6-10.

thinking allows for a true development in the historical evolution of thought and the possibility of the fulfilment of our desire to know.

There are two difficulties, however. First, this is not articulated as an explicit argument. Hence the detailed criticism of previous philosophy might mistakenly lead the student to think that all philosophical positions are mere opinion. Aristotle has a pedagogical concern regarding this in each of the first four books of the *Metaphysics*. In these, we must come to see how it is possible to think being. By G.2, he can confidently contrast philosophy, dialectic, and sophistry.¹¹ This is in part based on what a achieves. For, as we shall see, a helps us to understand how we can have a knowledge of what is, which is not merely a knowledge of abstract universals (distinguishing it from dialectic), and in so doing reveals that our knowing has a relation to the first principle from the very beginning (distinguishing it from sophistry). Second, if the reason we find in our soul is at work in the world, then why are we not in an immediate possession of the understanding of that world? Book A opened with the words: "All men by nature desire to know."¹² The 'all' and the 'by nature' are important. *Theoria* is presented, not simply as one among many possible human endeavours, but rather as standing first in an hierarchical ordering of all human activity. As most free and independent, it is most complete.¹³ But if *theoria* is just such a universal end for man, it would seem strange that no one appears to have possessed the intuition of first principles and scientific knowledge which is its fulfilment. The history of philosophy as traversed in A seems to reveal only a manifold of errors. If *theoria* is not possessed, then how is a beginning to be made? Book a acknowledges two sides to the problem: one on the side of the knower and the other on the side of the known. Its discussion stresses the first, but as we will see, this cannot be divorced from the latter. These questions are central to the metaphysical enterprise. Somehow we must have a relation to the truth without possessing it in its complete and explicit form. Only then can the previous philosophers be in error, but in that error reveal something of the truth. And only then is it worthwhile to face the *aporiai* of Aristotle's treatises. These are the questions addressed in the three short chapters of a.

It will be helpful at this point to canvass some of the criticisms levelled against a as a legitimate component of the *Metaphysics*. At one extreme, it has been argued that there are no logical connexions linking the sections of a's text. In more measured analyses a has been thought to be internally related to a certain extent but unrelated to what precedes and follows it. It has also been thought to be introductory in its nature - either to philosophy in general, or to physics, or to first philosophy (instead of A) - rather than being a continuation or further development of a work.

Bonitz' interpretation is an example of the first assessment. He declares that the passages of a were put together accidentally and without cause.¹⁴ In the introduction to his translation Tredennick states: "Book II. (a) has no connexion with what precedes and

¹¹ G.2. 1004b 15-27

¹² A.1. 980a 21.

¹³ Cf. the discussion of A.2 regarding this point.

¹⁴ Cited by J. Tricot, *La Métaphysique* (Paris: J. Vrin, 1970), xxi.

follows; it is introductory to the study of philosophy in general."¹⁵ Jaeger¹⁶ and Ross likewise see a as an "excrescence on the general structure of the work."¹⁷ Ross takes it to be most likely an introduction to physics though he thinks it is possibly an introduction to theoretical philosophy in general.¹⁸ Jaeger is not impelled to search for coherent relations within the text because of the assumption that it is the product of notes taken by Pasicles from lectures given by Aristotle.¹⁹ In his early work, Owens is skeptical about a but more reserved than the commentators cited above. His skepticism with respect to accepting it is due to the lack of positive argument in the commentators for a's place and role based on its internal content; his reservation with dismissing it is based on the scant external evidence regarding the text. He judges a, L, and N not to be integral to what he understands to be the "main series" of the metaphysical treatises and takes a to be a fragmentary introduction to theoretical philosophy in general or to primary philosophy in particular.²⁰ Averroes stands at the other extreme to the general skepticism of the 19th and 20th century criticism. He takes a to be the proper introduction to the *Metaphysics* instead of A.²¹

If my commentary can establish the logical structure of a as asserted above, then the first form of criticism, that the text has no internal connexions, will be answered. Furthermore, if I can show that the *aporia* regarding the possibility of *theoria* is indeed the basis of this structure, then it makes most sense to read a, not as an introduction proper, but as the continuation of an argument already begun. And finally, if a connexion can be established with the *aporiai* and argument of the following books, then it will be reasonable to read a in its current location, not merely as consistent with the remaining books of the *Metaphysics*, but as serving a special purpose in relation to these. My contention is that the subsequent commentary will demonstrate this by revealing the unifying question and the resultant structure of a. This is not to say that this question and the subsequent ones which it spawns are exhausted in a. What is important to Aristotle's purpose in the prosecution of the metaphysical inquiry is that the questions are set out before us. Aristotle's approach is one in which there is a confidence that if the problem is sufficiently developed, its solution will become apparent.²²

Is there a particular purpose in addressing these questions in the second Book of the *Metaphysics*, rather than at some other point? If there is, then there is no need to think of a as a manifest intrusion between A and B. Three reasons are readily apparent. First, the

¹⁵ Aristotle, *Metaphysics*, text with translation by M. Tredennick, Loeb Classical Library (Cambridge: Harvard University Press, 1975), xxxi.

¹⁶ Werner Jaeger, Aristotle. Fundamentals of the History of His Development, trans. R. Robinson (Oxford: Clarendon Press, 1950), 169.

Ross, *Aristotle's Metaphysics*, 213. ¹⁷

¹⁸ Ibid

¹⁹ Jaeger, 169.

²⁰ Joseph Owens, *The Doctrine of Being in the Aristotelian Metaphysics* (Toronto: Pontifical Institute of Mediaeval Studies, 1951), 36-7. In his later work Owens argues, on the basis of a's internal content, for manifest connexions backward to A and forward to B and G, and hence he sees a legitimate utility in reading a in its current location ("Present Status," 148-169).

²¹ Noted by Crilly, 9.

²² Cf. B.1. 995a 27-29.

student will be in need of encouragement before facing the profound *aporiai* of B. There is the pedagogical risk that without a, B would be destructive of the "wonder" that Aristotle understands to be the origin of philosophy.²³ B's role is to encourage a critical skepticism which is the doorstep to philosophy. Second, by addressing the condition which allows *theoria* to be possible at all, a helps us to see how the historical sequence of ideas examined in A has within it the nature of a true development. If it is a true development, then the *aporiai* of B are not simply a collection of stimulating questions, but rather, they are *the* questions. That is, they are Aristotle's scientific formulation of where this development has brought us. Third, raising these difficulties now will give us a sense of where we are headed, so that our philosophizing will not be random but have the coherence of an activity, that is, of a process intrinsically related to its end.

This surely makes the most sense of Book A's closing lines:

but let us return to enumerate the difficulties that might be raised on these same points; for perhaps we may get from them some help towards our later difficulties.²⁴

The Greek text is unfortunately no less ambiguous than Ross' translation. However, one possibility regarding its interpretation does seem to be the most straight-forward. A.10 has summarized the history of philosophy as unfolding the four causes, but inadequately:

all men seem to seek the causes named in the *Physics*...but they seek these vaguely; and though in a sense they have all been described before, in a sense they have not been described at all.²⁵

It would seem most reasonable in the light of this that returning to "these *same* points" (emphasis mine) refers to the history of the development of philosophical enquiry and to what it has revealed: the four causes. Book a does indeed return to these points by asking of the history how it is possible that there be such a development, and what its nature is (whether its end is opinion or truth) and asking of the causes what is their nature and what is the condition of there being causes at all.

Chapter One

993a 30 - 993b 9

In the first chapter of Book a, Aristotle causes us to think about the character of philosophy: how it is easy and how it is hard. In so doing we come to see how it is possible to make a beginning at all. This first section is surely in part a very straightforward reference to A's history. Aristotle can state without explanation that "no

²³ A.2. 982b 12-13.

²⁴ A.10. 993a 25-27.

²⁵ A.10 993a 11-15.

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one is able to attain the truth adequately, while, on the other hand, we do not collectively fail"²⁶ because we have just experienced this in the discussion of A. This is indeed how most sympathetic commentators have read the text.²⁷ It should be added, however, that understanding A's history as the context of this remark also suggests what we should understand by Aristotle's further remark that "by the union of all a considerable amount is amassed."²⁸ Are we to understand by this that it is through the addition of many contributions that a 'considerable amount is amassed' or is it through a development in which the successive thinkers have expressed related moments? Out of context the expression of a's text seems to suggest the former, and this is how Thomas interprets it.²⁹ However, A's treatment of the previous history of philosophy does not bear this out. Aristotle's design in relating this history is to establish that it is not merely arbitrary in its movement but rather that the truth itself forced the thinkers to the positions they took. As will be seen below, how we interpret the nature of the combined contributions of philosophers has implications for our interpretation of the closing sentence of this section.

Book a's brief remarks state *that* the "investigation of the truth"³⁰ is easy but the context of A suggests *why* this is so. This is not unimportant, for without such an understanding, it is obvious that everyone has said something, but it is not obvious that everyone has said something "true about the nature of things."³¹ It is only with the latter that we have the makings of science. Book A's first two chapters lead us to consider what wisdom ("sophia") is. Clearly sense-perception (*to aisthanesthai*) is not this, for it is "common to all, and therefore easy and no mark of wisdom,"³² but it does stand as first (in the order of time) in the hierarchical relation of the activities of sensation, memory, experience, art and science.³³ What it means for these activities to properly compose a hierarchy is that they are what human knowing is; what distinguishes them is the extent to which they are a fulfilment of this. It is because of this that Aristotle speaks of a contemplative activity being realized even on the level of sensation in the opening lines of the *Metaphysics*:

All men desire to know. An indication of this is the delight we take in our senses; for even apart from their usefulness they are loved for themselves...³⁴

²⁶ a.1. 993a 31 - 993b 1.

²⁷ Cf. Alexander of Aphrodisias, *On Aristotle's Metaphysics 2 & 3*, trans. W.E. Dooley and A. Madigan (Ithaca: Cornell University Press, 1992), 139-140, 1; Saint Thomas, *Commentary on the Metaphysics of Aristotle*, trans. J.P. Rowan (Chicago: Henry Regnery Co., 1961), c273; Crilly, 48-9. For a linguistic analysis supporting the connexion between Books a and A cf. Joseph Owens, "The Present Status of Alpha Elatton in the Aristotelean *Metaphysics Archiv fur Geschichte der Philosophie*, 66 (1984) 155

²⁸ a.1. 993b 2-3.

²⁹ Thomas, *Commentary*, c276.

³⁰ a.1. 993a 30.

³¹ a.1. 993b 2.

³² A.2. 982a 6-12.

³³ A.1. 980a 27-981a 5 and 981b 29-982a 1

³⁴ A.1. 980a 21-23.

The sense of sight is singled out especially because it "most of all the senses, makes us know."³⁵ In the order of time we begin to know with sensation and this is present to all - even the beasts. The object of sensation is the "proverbial door, which no one can fail to hit."³⁶ It is from this that all men are capable of "wondering that things are as they are."³⁷ Unlike the Eleatics and Platonists, who must leave the sensible to find a stable object for knowledge, the students of Aristotle are to begin with sensible.

This is why the investigation of truth is in a way easy. But it is also, in another way, why it is hard. Aristotle expresses this as follows: "the fact that we can have a whole truth and not the particular part we aim at shows the difficulty of it."³⁸ This is a cryptic sentence and has been interpreted in various ways. What is this 'whole truth' (*to holon*), of which we are in possession? There is no other instance of this expression in the *Metaphysics*, but as Thomas notes, the first chapter of the *Physics* does contain a similar expression and articulates this more fully.³⁹

Aristotle's purpose in *Physics* I.1 is to show that what is given in sensation can be known. If we are to think being, we must somehow move beyond the dichotomy of the particular of sense and the universal of thought to which the history of philosophy has brought us in the Platonic position. Aristotle's way out of this is to see that in the sensible we have a confused whole (not a pure atomic particular) which we can come to know in knowing its intrinsic principles. What we begin with is the individual, and what we end with is the individual. Aristotle will later come to articulate this as the logic of substance. Substance is not posterior to a collection of independent elements. Substance is an individual which is particular and universal, it is what we sense and what we know. When we know a thing through the four causes we do not move from the thing to a knowledge of its causes as separate from it, rather we know the thing as caused. That is, a knowledge of substance will be a knowledge of the unity of the principles and that of which they are principles. This will be important when we come to the discussion of causes in a.2 and its implications regarding what a cause is.

The emphasis of *Physics* I.1 is to establish the possibility of philosophy in the confused whole with which we begin. The problem of philosophy lies in articulating the elements of this. Such a process will involve understanding a diversity which does not divorce itself from its own unity. In this we will move from a confused possession of the object to a knowing possession of the object. This is precisely the difficulty to which a points. To express it from the side of the knower, we need to make our thought adequate to the object. And it is to the side of the knower that a's text immediately turns: "Perhaps, too, as difficulties are of two kinds, the cause of the *present* difficulty is not in the facts but in us"⁴⁰ (emphasis mine). It is important that Aristotle says difficulties are of two kinds, for the obscurity of the whole with which we begin is real. Aristotle will argue that sensible

³⁵ A.1. 980a 26-27.

³⁶ a.1. 993b 4.

³⁷ A.2. 983a 15.

³⁸ a.1. 993b 6.

³⁹ Thomas, *Commentary*, c278.

⁴⁰ a.1. 993b 8-9.

substance *is* deficient, and it is from this deficiency that we will be led necessarily to the proper object of our science, but this is not the reason for the *present* difficulty. It is only when our thought has become adequate to the object that the object will be able to disclose its derivativeness. At the beginning of a Aristotle's interest in the history presented in Book A is that by entering into it our thought develops along with it. Book a ends with chapter 3 reminding us that we have not finished with this development.

993b 9 - 993b 19

We are introduced to the need to develop our thinking with a simile: "For as the eyes of bats are to the blaze of day, so is the reason in our soul to the things which are by nature most evident of all."⁴¹ An interpretation of the simile can be made which is consistent with the thought of *De Anima* and the familiar refrain in the *Physics* and the *Metaphysics* that we must begin with what is most knowable to us but least in itself and progress to that which is least knowable to us but most in itself.⁴² The eye (of the bat and of man) is made for seeing and the potency for this is actualized most fully in the blaze of day, but the nocturnal habit of the bat keeps it from perfecting this sense. So we, in our habits, are not accustomed to thinking that which is most knowable. Thus we are to be grateful to those who have contributed "by developing before us the powers of thought."⁴³ Aristotle does not understand this to be an abstract development in which the result is a formal intellectual process independent of content. Hence it is to be found in and through the "opinions" (*doxas*)⁴⁴ of previous philosophers. These are the expression of an engagement with the same object - the confused whole of the sensible - which each has attempted (self-consciously or not) to think. This is what prevents such a development from being one of merely subjective constructs.

Aristotle draws an analogy between the development of thought in us and the development of poetry:

It is true that if there had been no Timotheus we should have been without much of our lyric poetry; but if there had been no Phrynis there would have been no Timotheus. The same holds good for those who have expressed views about the truth; for from some thinkers we have inherited certain opinions, while the others have been responsible for the appearance of the former.⁴⁵

This is not simply a casual remark that Timotheus was influenced by Phrynis. From following the progress of thought in A we know that what Aristotle means is that there really would *not* have been a Timotheus without a Phrynis. Without the thought of Plato we would not have the thought of Aristotle, without the thought of the Hericliteans, Pythagoreans and Eleatics we would not have that of Plato. These former positions are not merely a convenient foil for Aristotle's own discussion. They are what have brought

⁴¹ a.1. 993b 9-11.

⁴² For example, *Physics* I.1. 184a 17-19 and *Metaphysics* Z.3. 1029b 3-7.

⁴³ a.1. 993b 14-15.

⁴⁴ a.1. 993b 18.

⁴⁵ a.1. 993b 15-19.

us to the point where we can *have* that discussion. They do not hinder us, they propel us. In the context of the historical development of thought we come to see, not an absolute opposition between 'opinion' and 'truth', but rather their intimate connexion.

Owens has argued that it is necessary for Aristotle to raise the issue of the development of thought because the errors of previous thinkers might lead us to think that the only way to begin is to make an entirely fresh start. This, he notes, is akin to contemporary debates regarding the status of the study of the history of philosophy as a way of philosophizing.⁴⁶ My argument here is that this is indeed the case but that, even further, such a 'fresh start' in thought, divorced from its development, would not even be possible. In the Greek spirit of the *boule*, Aristotle argues that we must listen to "the wise men who have now sat in council with us."⁴⁷ In the light of this it is not surprising that Aristotle's treatises typically introduce a subject by way of an historical survey of opinions. In following the historical development of opinion we are in fact entering into the universal movement of thought, since it is "the truth itself"⁴⁸ which caused the development. The importance of *aporiai* to Aristotle's manner of proceeding is related to this: they are what force us, the students of Aristotle, to develop our own thought. It is the history of thought which brings us to these *aporiai*. By working through the history we ourselves develop our own thinking, and the confusion we find ourselves in as a result of it is evidence of this.

993b 19 - 31

The final section of the first chapter of a focuses on the nature of *theoria*. This serves two purposes. First, it corrects any possible misunderstanding about where the development of philosophy leaves us. Second, it introduces the need for the central argument of a found in chapter two which examines the ground of *theoria*.

Lest we mistakenly take the development of our thinking to be productive simply of a formal process independent of content, in which *logos* and *physis* have been dislocated, or to be productive of a genealogy of arbitrarily subjective opinions, Aristotle immediately turns to that which determines the nature of *theoria* - its end: "It is right also that philosophy should be called knowledge of the truth. For the end of theoretical knowledge is truth..."⁴⁹ What is distinctive about *theoria* is that it is an activity which, in its perfection, is in full possession of its end for its end is not other than the activity itself.⁵⁰ This is why Aristotle contrasts theoretical knowledge with practical knowledge at this point.

Since moral action is pursued in the realm of the contingent, practical knowledge concerns itself with "what is relative and in the present;" since theoretical knowledge is concerned with truth, it knows the "eternal."⁵¹ It might seem surprising that we suddenly

⁴⁶ Owens, "Present Status," 158.

⁴⁷ A.5. 987a 2-3.

⁴⁸ Cf. A.3. 984b 8-11.

⁴⁹ a.1. 993 b 19-20.

⁵⁰ Cf. A.2 and *Nicomachean Ethics* VI.12.

⁵¹ a.1. 993b 22.

have the eternal mentioned here before we even know if such exists. What follows in the text elucidates this by sketching certain characteristics of knowing and being that we know must be present if the end of *theoria* is indeed truth. It may appear that in so doing, Aristotle anticipates his own argument in a manner which begs the question. But, as will be seen subsequently, I will argue that this is not the case.

a.1 continues with a dense sentence:

Now we do not know a truth without its cause; and a thing has a quality in a higher degree than other things if in virtue of it the similar quality belongs to the other things as well (eg. fire is the hottest of things; for it is the cause of the heat of all other things); so that that which causes derivative truths to be true is most true.⁵²

There are two sides to this sentence: how we know, and how a thing is. It is not accidental that these are juxtaposed. What we are presented with here is a preliminary sense that the structure of our knowing and the structure of being are the same. On the side of knowing, Book A has argued that to think the object which is before us is to think its causes. More precisely, it is to think it as caused, that is, as the unity of principles and principled. This involves understanding knowledge to render not simply a description, but an explanation of why things are the way they are. This is brought out in the legal connotation of the term *aitia* (cause) as involving the notion of responsibility. The implication of this is that we will not truly know anything unless we come to know that which is not derivative. As in the order of knowing, so in the order of being, what 'is' most truly, is what is not derivative. Fire, as responsible for the heat in other things is itself more truly hot than these other things.⁵³ The principles of eternal things, being responsible for the generation of non-eternal things while being ungenerated themselves, 'are' more truly than non-eternal things.⁵⁴

The nature of the relations within this ontological hierarchy are not worked out in a. Book G will begin to develop how all that 'is' is related to one thing (*pros hen*),⁵⁵ namely, substance. Furthermore G will introduce the idea that different kinds of substances are related hierarchically in serial succession (*tw ephexes*).⁵⁶ The import of this in turn will only fully be understood when Books Z and H have developed our understanding of the structure of sensible substance and Book *Theta* has established the priority of act over potency. Retrospectively then we will understand precisely how it is that knowledge through the causes leads us to the eternal principles referred to in a.1. We learn in A that the four causes are not external to what they are causes of, hence they do not lead us away from the thing caused, as do the Forms in the Platonic scheme. That is, Aristotle's causes are not separate substantial elements from which, by further analysis, we are led to even more fundamental elements. Hence knowing means knowing the unity of the four causes in the thing caused. A hierarchy of substances becomes evident when we see the

⁵² a.1. 993b 23-27.

⁵³ a.1. 993b 24-25.

⁵⁴ a.1. 993b 28-30.

⁵⁵ Cf. G.2. 1003a 33.

⁵⁶ Cf. G.2. 1005a 11.

degree to which this unity is complete. Sensible substance discloses its deficiency as an incomplete unity of principle and principled. An understanding that what is more complete is the condition of what is less complete will then allow us to move through the hierarchy of substances.

The above synopsis reaches beyond the confines of a.1. However, it is useful as a way of noting that the preliminary sense of knowing and being presented in a is consistent with the analysis of the later books of the *Metaphysics* and that this later analysis is connected with the understanding of the causes developed in A and further clarified in a.2. This suggests that Aristotle is aware of where he is headed in the general argument of the work.

What is significant for the purposes of a.1 is not the detailed working out of the above scheme, but rather, its basic form. This establishes a mark by which we can know whether *theoria* is possible. The final section of a.1 cannot help but bring before our mind the second chapter of A. In a more discursive manner, A.2 draws out some of the implications for the nature of *theoria* given that "Wisdom is knowledge about certain principles and causes."⁵⁷ Consideration of the wise man leads to the conclusion that "the first principles and the causes are most knowable; for by reason of these, and from these, all other things come to be known, and not these by means of the things subordinate to them."⁵⁸ Following this analysis, *theoria* is contrasted with a science of production and an intimation of its proper object - God - is made. This is all done for the purpose of stating "what is the nature of the science we are searching for, and what is the mark which our search and our whole investigation must reach."⁵⁹ However, the intentions of A.2 and a.1 are distinct. A.2 presents us with the mark of our science in preparation for the discussion of the historical development of opinions about the nature of reality. The first chapter of a returns our attention to this mark, but now with the intention of causing us to question whether this science can in fact exist. If knowing through causes leads necessarily to that which is not derivative, then we must ask: does a self-explanatory principle exist or does knowledge through causes involve us necessarily in an infinite regress? If such a principle does not exist, then it is not the case that we simply have a limited knowledge. Rather, it is the case that we have no knowledge at all. Book A has established the connexion between *theoria* and all other human activities. This implies that we do not only lose *theoria* if no such self-explanatory principle exists but all meaningful human activity. (The latter section of a.2 returns to this aspect of the problem).⁶⁰ If such a principle does exist, then it becomes apparent how it is that we can begin with the opinions of others but end with truth, for it becomes possible that "the truth itself"⁶¹ can indeed move us to, and beyond, these opinions. In retrospect we can see that the possibility of the whole history of thought as presented in A has been dependent upon the actuality of this principle.

⁵⁷ A.1. 982a 1-2.

⁵⁸ A.2. 982b 2-4.

⁵⁹ A.2. 983a 22-23.

⁶⁰ a.1. 994b 8-30.

⁶¹ A.3. 984b 10.

Chapter Two

994a 1 - 2

Chapter two of Book a begins exactly where chapter one has brought us: a.1 caused us to ask whether there are principles which are not themselves derivative, and which save us from an infinite regress. a.2 opens with the sentence: "But evidently there *is* a first principle, and the causes of things are neither an infinite series nor infinitely various in kind."⁶² It might seem strange to begin this chapter with what could reasonably be called its conclusion. As will become apparent in the subsequent discussion, the reason for this lies in the manner of Aristotle's approach to its content. In general, a.2 argues indirectly: it draws out the implications of certain forms of denying intelligibility to the world. Unlike the text of L which, explicitly and methodically, articulates an argument which leads us to the unmoved mover, here in a.2 the effect of Aristotle's discussion is to allow this principle to emerge on the horizon.

This text has, not surprisingly, been interpreted in many different ways. The most significant cause of differing interpretations is, of course, how commentators understand its context - whether as authentically Aristotelian or not, whether as part of the *Metaphysics* or not, and if a part of the *Metaphysics*, how the books other than a are understood. But furthermore, because the treatment of the subject matter is so condensed and, in a fashion not untypical of Aristotle's texts, we are not introduced to its purposes and transitions in explicit statements, how we divide the text and how we understand these divisions to be related has a great effect on our understanding of its intention and what it accomplishes. I will discuss a.2 following its opening statement in four sections: i) 994a 3 - 994a 19, the question of an infinite regress from the caused backwards to the cause; ii) 994a 19 - 994b 6, a discussion of change instigated by the question of an infinite progress from cause to thing caused; iii) 994b 6 - 994b 27, a reassessment of the Aristotelian causes; and iv) 994b 27-32, the question of an infinite number of kinds of causes.⁶³ While there is a rational order to these sections they do not form a strict linear argument. This is not a failing of the text, it simply is not its intention. It is for this reason that I will argue that the (one) first principle emerges from the discussion rather than arguing that a proof is laid down in full explicit detail.

a.2 accomplishes its task by causing us to ask what it would mean to deny intelligibility to the world. This further clarifies what it is to be a cause, for it is in the causes that the intelligibility of the world is worked out, and, most importantly a.2 brings before us the condition of there being causes at all. The first section turns our attention to one type of 'bad' infinity, that of an endless casual series. This introduces to us the need for a limit if a cause is to *be* a cause. But this only establishes a negative point: if the causes of a thing recede infinitely then we do not have causes at all. How we are to avoid such an infinite regress is still not clear. This is the purpose of the next three sections. These must point us towards an understanding both of the nature of this limit and of how

⁶² a.2. 994a 1-2.

⁶³ For the most part this follows Ross' divisions in his translation, though I differ from the interpretation given in his notes to his edition of the Greek text.

the limit demanded by intelligibility is not arbitrary and external to the object known. If it were merely this, then we would be simply discussing the demands of subjective conceptions, not of knowledge which is necessarily knowledge *of* something. What is, from the side of the knower, negatively understood as the need for a limit (the need to be free of an infinite regress) must be understood, on the side of the object, as a need for determination in order to be anything at all.

The argument of a focuses on the conditions of intelligibility, but its implications involve the conditions of being. That there is an identity of these is not merely a naïve assumption. I have noted that A.1 gives us an implicit argument *reductio ad absurdum* that reason must be at work in the world. All levels of human expression and activity (perceptive, active and contemplative) presuppose this. Anaxagoras' attempt to arrive at a pre-rational principal - his primordial chaos - was not possible, for if form were removed entirely we had, not the *physicoi's* primary corporeal element(s), but rather, nothing at all.⁶⁴ But A did not leave us only with a negative understanding. Positively it began to work out how reason was to be found in the world through an understanding of the four causes. When these are understood to be principles of thought we are able to see how the subjective and objective sides are held together: the causes are that which make a thing what it 'is' and they are also what we 'know'. Thus the final section of a.1 was able to present the subjective and objective sides reciprocally. And now in a.2, without explanation, Aristotle can lead us to what 'is' most truly through a consideration of the conditions of intelligibility. Underlying the discussion at every point is the logic that with no intelligibility there is no cause, and with no cause there is no caused - that is, there is nothing at all. Book a reveals in this a close affinity with Book G where the objective and subjective sides are likewise held together: the demands for determination in the thing in order for it to 'be' at all are worked out in thought in terms of the law of non-contradiction and the law of the excluded middle. We discover in these how it is that we are not caught in the indeterminacy of Heraclitus and how we are not forced to rely on a unity which exists only on the side of the knowing subject as Protagoras asserts. Hence, at the same time that we get "rid of the unqualified doctrine which would prevent us from determining anything in our thought,"⁶⁵ we find the articulation of an explicit *ousiology* in G. We see then that a looks back to A and forward to G. To borrow imagery from the *Odyssey*, as we emerge from Book A, the *Physicoi* on the one hand, and the Pythagoreans with Plato on the other, are our Scylla and Charybdis, while looking ahead, the sophists - as a false (though instructive) form of resolution - are our island of Calypso.

994a 3 - 994a 19

The first section of a.2 argues that an infinite regress backwards from the thing caused to the cause is impossible. This is self-evident if we understand a cause to be responsible for its effect, that is, as Book A reveals, a cause is that without which the thing caused could not be what it is. This is true for each kind of cause understood as matter (*hyles*), the source of movement (*he arche tes kinesews*) the final cause (*to hou heneka*), and the

⁶⁴ Cf. A.8. 989a 30 - 989b 20.

⁶⁵ G.4. 1009a 4-5.

essence (*ti en einai*). Ross is perhaps misleading by translating the middle two as plural for this suggests a multiplicity of 'firsts.' I will argue below that Aristotle clarifies his intention here in his subsequent discussion. Aristotle gives us an illustration for each of the first three kinds of cause but leaves the essence without any. This may be because he has already treated the question of an infinite regress with regard to essential predication in the *Posterior Analytics* (I.19-21), and a familiarity with this work has already been assumed in *Metaphysics A*.

Aristotle discusses the nature of an 'intermediate' term in a series in order to force us to consider what an endless series would be. An intermediate term is what it is by virtue of that which is prior to it (if it did not rely on this then it would not be 'intermediate'). If that which is prior is *likewise* an intermediate term then we must turn to that which is prior to *it*. If this leads us to an endless series of intermediates, we do not have a series which is endless, rather, (and this is the crucial point) we do not have a series at all, for what we have been calling intermediates cannot *be* intermediate in such a case. Hence Aristotle concludes: "Of series which are infinite in this way, and of the infinite in general, all the parts down to that now present are alike intermediates; so that if there is no first there is no cause at all."⁶⁶

994a 19 - 994b 6

Section ii looks at this hypothetical series from the other direction: as there is no cause if there is no first cause, so there is no thing caused if there is no final term. The attempt to think such an endless series fails. This is, in fact, just that indeterminate becoming of Heraclitus, where nothing 'is' anything but is endlessly other than itself. Heraclitus' follower Cratylus is aware of this and hence modifies his remark regarding the impossibility of stepping into the same river twice⁶⁷ and says instead that one cannot step in it even once.⁶⁸ This is an attempt to deny that things have a nature. The point of Aristotle's argument in a.2 is that this lack of a thing being what it is (the flux of Heraclitus, or the intermediate as cause or caused in an endless series) on the side of the knower cannot be thought, it can only be imagined, and on the side of the object cannot be actually, it can only be potentially. This explains the otherwise puzzling aside of 994a 16 that it "makes no difference whether there is one intermediate or more, nor whether they are *infinite* or finite in number" (emphasis mine). An actual infinity of terms between a first term and a last term could not be, but a potential infinity could. I will return to this in discussing section iii.

Out of this initial discussion of the impossibility of an infinite regress through cause and an infinite progress through things caused two aspects appear regarding the nature of what a cause is. First, the false step which gives rise to the notion of a series is the separation of cause and caused. Once we take the cause to be external to the thing caused we will be involved in the tracing out of a series. This is where we must not confuse the Aristotelian *aitia* with a mechanistic sense of 'cause' arising out of seventeenth century

⁶⁶ a.2. 994a 17-18.

⁶⁷ Cf. Plato's *Cratylus*, 402a.

⁶⁸ Cf. G.5. 1010a 11-14.

physics. Second, we have a preliminary sense that to be a cause is to be a limit. That this initial discussion is insufficient in rendering an understanding of the causes is evident in the fact that it does not make explicit how it is that we do indeed not fall into an endless series.

We proceed from this initial discussion to a consideration of change. In a straightforward sense this is simply a more detailed working out of how one thing does not come from another endlessly. However, the import is not limited merely to an assessment of the material cause, as Ross and Tricot assume.⁶⁹ Indeed Aristotle will argue that thinking about change by isolating one cause will leave change unintelligible. The purpose of this section is twofold: first, it helps to elucidate how causes are limits (the initial section has left us only with the understanding *that* they must be so) and second, it is necessary to render an understanding of change because it is precisely in this that a 'bad' infinity might be supposed to arise. The changeableness of the sensible appears to give credence to Heraclitus' doctrine of flux and to Parmenides' retreat from it to find a stable object for thought. If an analysis of change can show how it is that something can be and not be at the same time - how there can be an identity in difference - then the impasse created by these positions will be overcome. It is the Aristotelian causes which will effect this for us.

We find that change does not involve us in a 'bad' infinity, but just the opposite - that the very possibility of change involves the notion of a limit. Aristotle proposes two types of change, teleological and reversible (cyclical), as being comprehensive of all change. What emerges from the discussion of these is that in both we find something which is a prior condition of the change and which unifies the changing. We do not simply come to a first term in a series which is external, either as a beginning point or as a final product, but to a first term which is ever-present, which is there as the beginning and the end. When we see the unchanging in the changing, change is intelligible - we see how it is that it can *be* change.

Aristotle first dismisses the use of 'from' (*ek*) in a non-causal sense "as we say 'from the Isthmian games come the Olympian'."⁷⁰ This is not an instance of change, nor of Heraclitean flux, but simply the coincidence of a temporal relation. He gives us an example of each kind of change: "as the man comes from the boy, by the boy's changing" and "as air comes from water."⁷¹ In the latter (reversible change) we do not have two things which are simply other than each other and which appear before us. There is an inner-connexion which is their prior unity (what we might call 'H₂O'). What distinguishes this from teleological change is that this prior unity is present for thought but not in existence. It must exist either as water or as air, but the ground of that existence is its intelligible unity. Without this we cannot speak meaningfully of 'air' or 'water' since one entails a reference to the other. This type of change is also distinguished from teleological in that it is not self-explanatory. There must be something external to the unity of air and water which causes the transition from one to the other.

⁶⁹ Cf. Ross, *Aristotle's Metaphysics*, 217; Tricot 110 nl.

⁷⁰ a.2. 994a 23.

⁷¹ a.2. 994a 24-5.

In teleological change, as in the boy becoming a man or the learner of science becoming a man of science, from something determinate (not from just anything) we have its own fulfilment. This is not the movement from absolute not-being to being. It is the movement from 'that which is coming to be' to 'that which has come to be'. The former is not destroyed in the process, as air is in the change to water and *vice versa*, nor is it left behind in the process. It is completed. This provides a correction to Parmenides' radical separation of being and not-being. As the privation of its form, matter is not; as potency to be its form, matter is.

Implicit in this analysis of change are the notions of the underlying subject and the form. It is because of these that we are not faced with a limitless and hence unintelligible flux but with change as bounded by its formal cause. In teleological change that formal cause is not external to the process. With only the first discussion of the question of an infinite series of causes we might be led to think of causes as things, and things in a series. The discussion of change has clarified this: the four causes are the intelligible ground of change, they are what intrinsically limit - in the sense of determine - substance. It also clarifies that they are not independent of each other. Matter is always matter relative to form, it is not a separate thing (it is from a potential man of science that the man of science comes). In this way one thing does not proceed from another *ad infinitum*. Furthermore the end is not other than the formal cause, and is present from the beginning as the ground of change (the boy 'is' potentially the man). So too with cyclical change air is always air and potentially water, and water is always water and potentially air. The unity of these is present throughout the process of change. This is why Aristotle can say that "in both cases [teleological and cyclical change] it is impossible that the number of terms should be infinite. For the terms of the former kind, being intermediates, must have an end, and the terms of the latter kind change back into *one another*; for the destruction of either is the generation of the other."⁷²

994b 6 - 27

Section iii of a.2 presents the reader with more difficulty in arriving at a conclusive interpretation than the other sections. It consists of what appears to be a series of discrete observations regarding the first cause, the final cause, the essence, and matter. The question one must resolve is whether in this, it is addressing distinct things or whether it is alluding to one thing under different aspects. I will approach it in two ways: First, I will discuss its negative argument in which it closes certain possibilities in our thinking. Second, I will argue that its intent is to bring the first principle as the unity of the causes before us.

Aristotle causes us to think what the outcome of denying the final cause or essence would be. The belief that either of these involves us in an infinite regress is just such a denial of their actuality, since, as we saw above, this regress cannot be thought nor can it be. This is why Aristotle says that "those who maintain the infinite series eliminate the

⁷² a.2. 994b 4-6.

Good *without knowing it*⁷³ (emphasis mine). If there is no first cause then there is no cause at all. Without the final cause we must relinquish all purposeful activity, whether practical or theoretical: "(...no one would try to do anything if he were not going to come to a limit); nor would there be reason in the world; the reasonable man, at least, always acts for a purpose, and this is a limit; for the end is a limit."⁷⁴ Without the essence, knowledge becomes impossible, since nothing could be thought. The intermediate term can only be thought *qua* intermediate if that which causes it to be an intermediate is thought. The whole is necessarily prior to its parts: "But the *essence*, also, cannot be reduced to another definition which is fuller in expression. For the original definition is always more of a definition, and not the later one; and in a series in which the first term has not the required character, the next has not it either."⁷⁵ Aristotle is arguing both that an infinite regress in formal causality is impossible and that those who assert it destroy our ability to apprehend things. This may seem to be a strange manner of proceeding. If the former is true, then why address the latter? The reason for doing so is that one can say in words what, in truth, is without meaning. a.2 intends to force us to think what the implications of the assertion of an infinite regress are, and brings us to the point where we understand this to be unthinkable. And in understanding the causes to be equally the condition of our knowing and the condition of being, we see that what is unthinkable cannot be. The destruction of the "nature" known by science is equally the destruction of the "nature" which causes the individual thing to be what it is. Although Aristotle does not explicitly formulate this for us, we also recognize in the denial of the essence the destruction of all the other causes, for these are in some sense reduced to it. The condition then of formal causality will be the condition of all the causes.

It is the intention of section iii that this condition become apparent. There are three elements within the discussion which are involved in this. The first is the above mentioned reduction of the causes to the formal cause. The second is the intimation of what we will later come to understand as a hierarchy of substances. This appears at the end of a.1, and the end of a.2 as well as a.3. The third is the foreshadowing of the understanding of the priority of actuality over potency. This occurs in the image of the line and the reference to matter (if we accept the version of the text as we have it in Alexander). In the case of the former, "one who is tracing the infinitely divisible line cannot be counting the possibilities of section."⁷⁶ In thought and in being the actuality of the line as one is prior to its potential division. In relation to the line as a whole, its infinite division remains a possibility which can be imagined but cannot be thought and cannot be. Hence Aristotle subsequently remarks: "nothing infinite can exist; and if it could, at least the notion of infinity is not infinite."⁷⁷ For the notion to exist is for it to be determinate, but this is to say that it is not itself infinite, since the infinite - in the sense of being without limit - is precisely not determinate. The reference to matter is similar: "Even matter has to be conceived under the form of something which changes."⁷⁸ Matter

⁷³ a.2. 994b 12-13.

⁷⁴ a.2. 994b 13-16.

⁷⁵ a.2. 994b. 17-20.

⁷⁶ a.2. 994b 24-5.

⁷⁷ a.2. 994b 27-8.

⁷⁸ Tredennick, a.2. 994b 26-7.

is necessarily matter relative to form. This reveals the priority of form. The point here is consistent with the analysis of A which argues that it is a misconception to think of matter as some formless stuff having any independence from form.⁷⁹

Another way of speaking about the priority of act over potency is to say that we cannot have the incomplete without having as its condition the complete. The affirmation of an infinite regress is an attempt to have just the reverse. But what would be that complete principle? The reduction of the causes to form suggests that it would be the perfect unity of the four causes. Why then is this not stated? It is because we cannot apprehend the first principle directly; we must know it through the causes (looking to them as one). This is the reason for the discrete observations of section iii. In these we see the principle as matter, as end, and as form.

This is also, I think, why the question of the second type of 'bad' infinity, an infinite number of kinds of causes, is discussed at the end of a.2 (section iv): "if the *kinds* of causes had been infinite in number, then also knowledge would have been impossible; for we think we know, only when we have ascertained the causes, but that which is infinite by addition cannot be gone through in a finite time."⁸⁰ One might reasonably expect this to appear with the first discussion of an infinite regress. For in terms of the destruction of knowing and being, the logic is the same. But instead we find that it is the final thought of the chapter. This suggests a further purpose in Aristotle's interest in it: there is the implicit question how we will know absolutely that the four causes are exhaustive. It is not sufficient that we make an arbitrary stop at four, we must know them to be comprehensive. This we will only know when we know their unity. The reason for the placement of this discussion of the second type of 'bad' infinity here, then, is that it points to the necessity of the absolute unity of principle and principled which is the first cause. The effect of the discussion is to bring before us an object of thought which asserts its independence and priority.

Chapter Three

994b 31 - 995a 14

a.1 began by turning our attention to a problem in the knower. a.2 has treated the object known. Now in a.3 we return to a consideration of the disposition of the knower. Why is it that the text should re-visit this subject? What distinguishes a.3's discussion is a new context for our questioning the side of the knower. By presenting us with *aporiai* a.1 and a.2 have caused us to think about the nature and possibility of *theoria* and its proper object. With the emergence of the first principle as the condition and end of our science we not only have a renewed confidence in pursuing the methodology appropriate to this science but are capable of doing so, for the method of a science is determined by its object. This is consistent with Aristotle's manner of proceeding in other treatises. In the

⁷⁹ Cf A.8.

⁸⁰ a.2. 994b 28-30.

Ethics, after the first two chapters have introduced the object of study, I.3 pauses to remark on "the student, the sort of treatment to be expected, and the purpose of the inquiry."⁸¹ The *De Anima* follows a similar pattern within its first chapter.⁸²

There is an especial need for the students of Aristotle to think about their 'thinking' because this has been conditioned by the history to which they are heirs. Thinking is a free activity (*the* free activity) but only when thought is truly what it is in itself. We are only potentially this. To make actual this potency we must free ourselves from habits, not by dismissing the past but by attaining a self-conscious relation to the history of philosophical positions which inform our own thinking. In this light, the examination of the history of thought in A is seen to be not merely helpful but necessary. Aristotle remarks that "we demand the language we are accustomed to" and that it is "the customary that is 'intelligible'."⁸³ It is for this reason that Aristotle begins, not from the vantage point of his conclusions, but from the present condition of his students who are caught within the questions presented by the semi-confused thinking of his predecessors. This relates to my argument above regarding a.1 that we do not have an incidental relation to the history of thought, and to my comment regarding a.2 that it is possible to use words in a manner which is not wholly meaningful. As we struggle to make our own thinking adequate to thought itself, we will inevitably be involved in a struggle to make language adequate to it. We have been involved with this in Books A and a but it will become more obvious in G, D, and the following books as the articulation of problems and their solutions becomes ever more scientific. In part the need for the development of a new language is witnessed by the difficulty in commenting on the early books of the *Metaphysics* without using the distinctions of the later books. This is similar to the difficulty found in the historical survey of A where Aristotle inevitably gives a retrospective understanding of earlier positions.

The need to break free of habits points to the critical role that *aporiai* will play, not simply in B, but throughout the *Metaphysics*. It is these which force us to break our habits of thinking and hence also of speaking. a.3 is warning us that the *aporetic* discipline is the proper way forward. Suspicion has been cast on the last sentence of a.3 because it is not included in Alexander's commentary. It has been thought by some to be the addition of someone wishing to create a link with the first *aporia* of Book B that was not present in the original text. But no such linking statement is necessary since the need for *aporiai* is not external to the discussion of a.3 taken as a whole.

995a 15 - 20

The final lines of a.3 draw our attention to the distinctive approaches of different sciences. Two sciences are mentioned: mathematics and natural science. This has occasioned many to interpret a as an introduction to the *Physics* rather than the

⁸¹ "Ethica Nicomachea," trans. W.D. Ross in *The Basic Works of Aristotle*, ed. Richard McKeon (New York: Random House, 1941), I.3. 1095a 12-13.

⁸² *De Anima* I.1. 402a 10-25. As Tricot has noted, similar concerns are introduced at G.3. 1005b 4-5 and in the *Posterior Analytics* at I, 13 and 24 (118n 2).

⁸³ a.3. 994b 32 - 995a 4.

Metaphysics. However, if I am correct in considering the discussion of change in a.2 to be intimately connected to the history of thought in A, then this final section of a.3 is to be expected. Aristotle presents two dominant strands in the history: on the one hand the *Physicoi*, on the other the Pythagorean tradition with Plato understood in one sense to be its successor. Though distinct from mathematics and natural science as Aristotle understands them, these two strands have an obvious affinity with these sciences in terms of what they take to be the object of their study. Plato was criticized in Book A for leaving the sensible behind in a process of abstraction so that "mathematics has come to be identified with philosophy."⁸⁴ The *Physicoi* were criticized for taking the corporeal to be all that is. These are just the two positions likely to hold Aristotle's students' imagination. A third position, one which might resolve these, has not yet been developed. It would then be premature to mention Aristotle's first philosophy as causing students to expect a certain manner of proceeding. It is the habits of the prior two which are likely to inhibit our proper understanding of the causes and their unity in substance.

The final sentence of a.3 continues: "Hence we must inquire first what nature is: for thus we shall also see what natural science treats of [and whether it belongs to one science or to more to investigate the causes and the principles of things]."⁸⁵ Aristotle is consistent in demanding that it is the nature of the object of a study which determines the nature of the science which knows it. In this closing sentence he may simply be drawing an analogy between natural science and first philosophy but it would seem to suggest more, as Owens notes,⁸⁶ namely the *aporia* that is stated at E.1. 1026a 23-32 and K.7. 1064b 6-14:

One might raise the question whether the science of being *qua* being is to be regarded as universal or not. Each of the mathematical sciences deals with some one determinate class of things, but universal mathematics applies alike to all. Now if natural substances are the first of existing things, physics must be the first of sciences; but if there is another entity and substance, separate and unmovable, the knowledge of it must be different and prior to physics and universal because it is prior.⁸⁷

We have in this a suggestion of a hierarchy of substances and consequently a hierarchy of sciences. Though this is only a suggestion, because it is left in the form of an *aporia*, if Book a has brought its reader to the point where this appears as a true *aporia*, then it has accomplished its task.

In Book A Aristotle argues that there has been a logical development of thought in his predecessors which leads to the Aristotelian philosophy. In Book a Aristotle steps back from this argument to ask how there can be an argument at all. This is accomplished by presenting a series of *aporiai* which cause us to consider how the truth could be moving the development in the history of thought, what the implications of denying intelligibility

⁸⁴ A.9. 992a 32-3.

⁸⁵ a.3. 995a 18-20. The square brackets denote the section of text which Ross takes to be of uncertain origin.

⁸⁶ Joseph Owens, "Present Status" 166.

⁸⁷ K.7. 1064b 6-14.

to the world are not only for *theoria* but for all human activity, what it is to be a cause, how the four causes are not involved in an infinite regress, whether our thinking is adequate to its object and what that object is. The effect of this discussion is to bring before us a first principle understood as the ground of thinking and of being. God is intimated as both the object of Aristotle's universal science and its ever-present condition. To be able to think this will require Aristotle's students to free themselves of the inadequacies in the habits of their thinking. Book B begins this process. It confronts them with the *aporiai* which are the result of the development of thought presented in Book A. In its ability to give a scientific formulation to those *aporiai* Book B also reveals a further development which is properly Aristotelian. Doull argues that it is the development of pure categories of thought which allows Aristotle to comprehend and move beyond his predecessors, explicating the first principle and understanding nature and the soul in their distinction from and relation to that principle. In giving an account of those distinctions and relations Doull articulates a philosophical understanding of the connexion between *ousiology*, aetiology, ontology and theology which Book a implies will be necessary in Aristotle's universal science.