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**THE INCLUDED MIDDLE:  
*LOGOS* IN ARISTOTLE'S PHILOSOPHY**

A Thesis in

Philosophy

by

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## ABSTRACT

Our dissertation is a research of the various meanings of *logos* in Aristotle's philosophy and the conceptual relation between them. Our method is dialectic, bringing a survey of Aristotle's philosophy together the argumentation of our thesis. We started from the very beginning of the Aristotelian corpus, we devoted our first two chapters to Aristotle's logic, chapters III and IV to his philosophy of nature, and our last chapters V and VI to his ethical political philosophy. Thus, we have worked on four fundamental meanings of *logos* respectively: "standard", "proportion", "reason" and "discourse".

Our thesis is the following. In its four fundamental meanings in Aristotle's philosophy, *logos* each time refers back to a focal meaning: a relation between terms that preserves them together in their difference instead of collapsing one term to the other or holding them in indifference. Thus "standard", "proportion", "reason" and "discourse" as well as their synonyms and derivatives all refer back to a relation between formerly contrary or mutually exclusive terms. Thus the term *logos* in Aristotle provides the inclusive counterpart to what could appear as a simply exclusive principle of non-contradiction or of the excluded middle.

Most significantly, the sense of *logos* which defines human beings refers to their ability to understand and express both experiences made first hand and experiences they have *not* had and may or will *never* have first hand. It is this sense of *logos* that sheds light on the specifically human character of education, science, historiography, politics, psychology, sophistry and philosophy.

## TABLE OF CONTENTS

Acknowledgements.....	vii
INTRODUCTION.....	1
A. THE QUESTION.....	3
B. ARISTOTLE’S METHOD.....	7
1. Dialectic.....	7
2. Aristotle on method and diaclectic.....	12
3. Dialectic as a way toward nature.....	14
4. The modality of dialectic.....	18
5. Dialectic as maieutics.....	21
C. METHOD OF THE DISSERTATION.....	23
1. Two impasses: Inductive method.....	23
2. Two impasses: Deductive method.....	28
3. Method of the dissertation.....	32
4. Outline of the dissertation.....	36
5. Further perspectives.....	41
Chapter 1. BEING: <i>LOGOS</i> IN THE <i>CATEGORIES</i> .....	48
A. HOMONYMY.....	49
1. Aspect.....	50
2. A kind of somnolence.....	54
3. An exclusive version of the principle of non-contradiction.....	55
4. “Underlying thing”.....	56
5. An example.....	57
B. SYNONYMY.....	61
1. <i>Logos</i> of being.....	62
2. A kind of waking.....	65
3. An inclusive version of the principle of non-contradiction.....	67
4. Another sense of “underlying thing”.....	71
5. Return to the example.....	73
C. RECAPITULATION AND REORIENTATION.....	78
Chapter 2. POTENCY: <i>LOGOS</i> IN <i>ON INTERPRETATION</i> .....	86
A. THE INHERENCE OF <i>LOGOS</i> .....	87
1. The problem.....	88
2. Revision of the project.....	91
3. Return to Aristotle’s example.....	94
4. Return to <i>logos</i> .....	98
5. Return of <i>logos</i> .....	100
B. POTENCY.....	103
1. A trivial concept of potency.....	104
2. A temporal concept of potency.....	105
3. Motion.....	109
4. Action.....	112

5. Potency and <i>logos</i> .....	114
C. RECAPITULATION AND REORIENTATION.....	118
Chapter 3. NATURAL MOTION: <i>LOGOS</i> IN THE <i>PHYSICS</i> .....	121
A. THE NATURAL.....	122
1. The definition of nature.....	124
2. Undoing conceptions of early modern physics.....	126
3. Everyday “physics” .....	133
4. Nature as being-at-work.....	136
5. <i>Logos</i> and nature.....	139
B. THE ORGANIC.....	142
1. The soul as <i>eidos</i> .....	144
2. The soul as <i>entelekheia</i> .....	147
3. The organic.....	151
4. Nutrition.....	153
5. Reproduction.....	158
C. RECAPITULATION AND REORIENTATION.....	162
Chapter 4. ANIMAL MOTION: <i>LOGOS</i> IN <i>ON THE SOUL</i> .....	169
A. SENSATION.....	171
1. Affection.....	172
2. The fire example.....	176
3. Alteration.....	177
4. The wax example.....	180
5. The lyre example.....	183
B. LOCOMOTION.....	189
1. “Transperception” .....	189
2. Locomotion.....	192
3. The “practical syllogism” .....	195
4. A middle term.....	198
5. Beyond locomotion.....	201
C. RECAPITULATION AND REORIENTATION.....	205
Chapter 5. HUMAN ACTION: <i>LOGOS</i> IN THE <i>NICOMACHEAN ETHICS</i> .....	211
A. <i>ETHOS</i> .....	213
1. An unpractical syllogism.....	215
2. A tripartite soul.....	217
3. A kind of learning.....	221
4. A kind of imitation.....	224
5. The limitation of <i>ethos</i> .....	226
B. <i>HEXIS</i> .....	228
1. A new kind of listening.....	228
2. <i>Hexis</i> .....	231
3. Freedom.....	233
4. Medicine, architecture and music.....	235
5. <i>Hexis meta logou</i> .....	237

C. <i>ÊTHOS</i> .....	240
1. <i>Hexis kata ton logon</i> .....	240
2. Bodily <i>hexis</i> .....	244
3. Moral virtue.....	247
4. Deliberation.....	251
5. The dilemma of character painting.....	254
D. RECAPITULATION AND REORIENTATION.....	260
Chapter 6. HUMAN DISCOURSE: <i>LOGOS</i> IN THE <i>POLITICS</i> .....	265
A. SOUND AND VOICE.....	267
1. Production of sound.....	270
2. Reception of sound.....	272
3. Physiology of voice.....	274
4. Semantics of voice.....	275
5. Reception of voice.....	279
B. THE FIRST ARTICULATION OF <i>LOGOS</i> .....	281
1. Letters.....	282
2. Articulation.....	289
3. Nouns.....	292
4. Meaning.....	300
5. Understanding.....	304
C. THE SECOND ARTICULATION OF <i>LOGOS</i> .....	309
1. Wish.....	309
2. Autopsy.....	315
3. Three kinds of hearing.....	319
4. Human <i>logos</i> .....	325
5. Conclusion.....	328
CONCLUSION.....	340
A. THESIS.....	341
1. Back to “ <i>logos</i> of being” .....	341
2. Thesis and summary of dissertation.....	342
3. Implications of human <i>logos</i> .....	346
B. THE HUMAN CONDITION.....	351
1. The Cycloptic.....	351
2. Law.....	354
3. Language.....	356
4. Love.....	360
5. The Oedipal.....	364
C. <i>NOUS</i> .....	370
BIBLIOGRAPHY.....	375
APPENDIX: LEXICOLOGY OF <i>LOGOS</i> .....	389
INDEX OF GREEK TERMS.....	393

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Canım annemle babam Güzin ve Birol Aygün'e.<sup>1</sup>

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<sup>1</sup> Turkish for "To my dear parents, Güzin and Birol Aygün."



## INTRODUCTION

“They do not understand how that which is disrupted has the same *logos* as itself: a back-turning harmony as in the bow and the lyre.”

Heraclitus.<sup>1</sup>

In this dissertation, we investigate the various meanings of *logos* in Aristotle’s philosophy. We argue that they all refer back to one focal meaning: a relation between terms that preserves them together in their difference instead of collapsing one term to the other or holding them in indifference. Thus the term *logos* in Aristotle provides the inclusive counterpart to what could appear as a simply exclusive principle of non-contradiction or of the excluded middle. In the specific context of human beings, *logos* refers to their ability to understand and express experiences they have not had and may or will never have first hand.

Our dissertation takes the hybrid form of an argumentative research, each of its six chapters focusing on the function of *logos* in each of the following six Aristotelian texts: the *Categories*, *On Interpretation*, *Physics*, *On the Soul*, the *Nicomachean Ethics* and the *Politics*. Seen retrospectively, our work presents arguments for our thesis, while prospectively it assumes the form of a research offering interpretations of particular central passages from these works. The former aspect of our thesis thus is well-suited to the reader who would approach the text “horizontally” from beginning to end, as indeed we wish each reader to do, while the latter welcomes the reader limiting herself with a “vertical” reading of isolated chapters. Each chapter opens with a compact road-map for the ongoing overall

argument, and then with a brief fresh introduction on the specific topic of the chapter for the reader who has just opened the text. To partially avail the reader from having to open the original texts while reading our thesis, the translations from Ancient Greek, all made by us, attempt to be as literal as possible at the risk of not always being eloquent in English, and as consistent as possible in terms of the correspondence between the central Ancient Greek words and their English translations. For the latter purpose we added a short index of Ancient Greek terms at the end of our dissertation.

In this introduction, we first present our topic in the context of Aristotle's work and of his posterity, and then attempt to justify our overall procedure in relation to Aristotle's own method.

## A. THE QUESTION.

There is a famous Ancient Greek riddle mentioned in Plato's *Republic*: "A man and not a man shot and did not shoot a bird and not a bird, perched and not perched on a branch but not a branch, with a stone which was not a stone."<sup>2</sup> Although one is familiar with all the words in this riddle, this does not remove much puzzlement. One thing is clear though: "stone", "branch", "bird", "man" and "shooting", although familiar terms, must be said in many ways.

*Logos* too is said in many ways.

Hence the question of this dissertation is similar to the riddle above. Just like "stone" or "branch" is for English speakers, *logos* too is an all-too-familiar term for Ancient Greek readers, and yet (or precisely because of this) it is puzzling. Any reader who opens any work of Aristotle in Ancient Greek comes across the word *logos*. The *Index Aristotelicus* cites hundreds of occurrences of *logos* divided into four headings which may be roughly represented as follows (I am changing Bonitz' order. I strongly recommend the reader to take a brief look at our more detailed and adequate sketch of Bonitz' "*logos*" article in the Appendix of our dissertation):

- I. Essence, standard, form.
- II. Proportion, ratio, percentage.
- III. Reason, faculty of reasoning, intelligence.
- IV. Discourse, speech, language.<sup>3</sup>

*Logos* here means “definition”, there “standard”, elsewhere “proportion”, or “rationality”, “book”, “language” or “argument”. Just to start out with a simply lexicological consideration, in his logic, for instance in the *Categories*, the second word of the corpus is *legetai* and the eleventh *logos* itself: the opening claim of Aristotle’s work is that homonyms are *said* by a common name whereas synonyms also share their “*logos* of being”.<sup>4</sup> Further into the logic, one reads that some potencies are with *logos*, some without *logos*<sup>5</sup>, that a premise and a syllogism are somehow both *logoi*<sup>6</sup>, or else that knowledge implies the possession of the *logos* of the ‘why?’<sup>7</sup>

Instead of the logical works, if one opens a text from Aristotle’s philosophy of nature, one reads that nature lies less in the material than in the form according to *logos*<sup>8</sup>, that living beings nourish themselves and reproduce not according to a mixture or separation, but according to a *logos*<sup>9</sup>, that sensation is not only according to *logos*<sup>10</sup>, but that “sensation is *logos*”<sup>11</sup>, and finally that locomotion originates from one universal and one particular *logos*.<sup>12</sup>

As to his ethical and political works, finally, it is there that Aristotle famously epitomizes *logos* in relation to human beings by using it as the criterion of the parts of the human soul: one part of it is *alogos*, one part simply has *logos*, and one third intermediary part, while combating *logos*, is also able to partake in it.<sup>13</sup> Most famously, indeed, Aristotle defines humans as the only kind of animal that has *logos*<sup>14</sup> and he puts *logos* at the basis of human education<sup>15</sup> as well as of the household and city.<sup>16</sup>

*Logos* then is not only omnipresent in the Aristotelian corpus, apparently it is so in all its multivocality. And since Aristotle's traditional corpus opens with a discussion of the ambiguity of words<sup>17</sup>, since he insistently demands the dialectician to distinguish such terms in the *Topics* and in *On Sophistical Refutations*<sup>18</sup>, analyzes so typically the ambiguity of fundamental philosophical terms and devotes a chapter in the *Metaphysics* to such analyses, one expects Aristotle to at least implicitly thematize *logos*. It is true that Aristotle provides one definition of *logos* in the sense of "sentence": "*Logos* is a signifying voice, one of whose parts is signifying separately, not as an affirmation, but as a clarification."<sup>19</sup> While being straightforward and informative in its own right, this definition not only falls much short of exhausting the meanings of *logos*, it does not even cover the sense of *logos* as "sentence": this meaning is reduced to "declarative sentence" at the expense of other kinds of sentences.<sup>20</sup>

*Logos* is abundantly used, but not thematized by Aristotle. Despite Aristotle's explicit and recurrent emphasis on ambiguity, he does not even mention that *logos* is said in many ways, let alone offer an analysis of such an ambiguity.<sup>21</sup> *Logos* is not that which Aristotle did not think of, indeed far from that; but *logos* is that which he most persistently and thus most enigmatically used without ever explaining, disambiguating, analyzing, or even thematizing. Despite the omnipresence of *logos* in Aristotle's work, even the question of the meanings of *logos* is absent. Despite the sheer commonness of the terms of this question and despite the typically Aristotelian form it takes, the corpus offers no space for it to be even formulated, and thereby leaves behind a riddle. *Logos* is a blind spot in Aristotle's thought.

But *logos* does not seem to be less a blind spot in his posterity. The disproportion between the amount of later work on “*logos*” and on “Aristotle” separately, and that on “Aristotle *and logos*” together, is as flagrant as the disproportion between Aristotle’s work *with logos* and his work *on logos*. Just to get a necessarily simplistic sense of the former disproportion, one may venture to make a Google search for “*logos*” and “Aristotle”. While, of course, both searches give us tens of millions of results separately<sup>22</sup>, a search for “*logos* in Aristotle” yields only sixty results out of which a few concentrate solely on Aristotle *and logos* as such<sup>23</sup>, a search for “*logos* and Aristotle” yields only thirteen results, “Aristotle and *logos*” yields none.<sup>24</sup> The topic of our dissertation is at once extremely common and yet also fresh and practically unexplored by Aristotle and his posterity.

This is the question then: since *logos* is said in many ways, what are these meanings? How are they related, if at all? It is this somewhat riddle-like question emerging out of terms most familiar to Aristotle readers that we shall develop in our dissertation. It is this “purloined letter” that we shall pick up.

## B. ARISTOTLE'S METHOD.

### 1. Dialectic.

Before exhibiting our own procedure for engaging in such a task, we must touch upon Aristotle's own method because it provides much of the justification for our method. In this section, we shall first argue that Aristotle's method for sublunar phenomena is dialectic, engage in a brief survey of the dialectic implicit in three fields of inquiry in the corpus, offer explicit textual support from Aristotle's own discussions of method, and finally argue against the traditional view that Aristotelian science proceeds demonstratively. We will thus be able both to offer a general view of Aristotle's method to which we shall refer back during our dissertation, and to support our own method by means of Aristotle's.

a. Logic: Aristotle's reticence concerning the question of *logos* is especially surprising in that his method typically involves a problematization of that which appears to be unproblematic, an initial analysis of the obvious meanings of common words followed by a critical challenge. In so far as the traditional Aristotelian corpus opens abruptly with a distinction between homonymy and synonymy, its very first topic is the relation between beings and words. This abruptness, this lack of introduction and of further justification, suggest that Aristotle already assumes the relation between beings and words to be obviously problematic, so that he may directly start out by trying to clarify it without even laying out the problem.<sup>25</sup>

Aristotle then begins by announcing a fundamental limitation or a certain impossibility of delimitation in the meanings of words, a necessary ambiguity in them. If we are to follow the *Organon*, we find him later taking up and scrutinizing gradually wider linguistic and mental phenomena: in the *Categories* and *On Interpretation* Aristotle shifts his focus from words to assertions (subjects, predicates, statements, modalities, etc.), in the *Prior Analytics* to syllogisms (premises, conclusions, moods and figures of syllogisms, etc.), then in the *Posterior Analytics* to demonstrations and science (knowledge, proof, definition, principles, etc.), and finally to less rigorous or simply invalid arguments in the *Topics* and in the *On Sophistical Refutations*. Aristotle's logic seems to attempt to address various levels of linguistic and mental operations first by observation and then by investigation.

Aristotle's logic then is dialectical at least in the sense that it performs a dialogue of language with itself on these various levels. Aristotle's logic is well illustrated by the engagement and critical distance between two interlocutors of a dialogue, since, while dealing with language, Aristotle is neither simply absorbed by it nor totally detached from it. Thus, the dialogue of language with itself in Aristotle's logic takes a fundamentally Socratic form in that he follows up and pushes the claims inherent to native language speakers including himself: the seminal distinction between homonymy and synonymy is precisely intended to challenge the *prima facie* univocality between one noun and one kind of thing; the later distinctions between subject and predicate, between premise and conclusion, between different kinds of syllogism and arguments are all made for the sake of challenging and then nuancing



or often refuting an apparent sameness in language or exposing illegitimate conflation and superfluous differences.

Aristotle's logic then is not only dialectic in the sense that it is a dialogue within language, one comparable to Platonic/Socratic dialogues, it also attempts to bring out the implicit assumptions of language speakers, it is also a "maieutics" of language.

b. Physics: Aristotle's method in his philosophy of sublunar nature is also dialectic. First, it is clear that Aristotle's philosophical work on nature, which occupies half of his corpus, stands on a wealth of direct examination, and also on second-hand accounts of the experience of hunters, physicians, astronomers, fishermen, farmers, beekeepers, birdwatchers, and indeed also on the various accounts of nature in Aristotle's contemporaries and predecessors. Aristotle may be one of the philosophers that are worst represented by Auguste Rodin's self-absorbed "Thinker", because the first moment of Aristotle's philosophy of nature is an eager investigation and avid exploration of nature as is obvious from any short glance on the *History of Animals* or the *Generation of Animals*. Aristotle is at least one of the first patient and attentive spectators or listeners of natural phenomena, one of the first fervent gatherers of information concerning them.

But anyone who has read any part of the *Physics*, *Parts of Animals*, or *On Generation and Corruption* knows equally well that his philosophy of nature is not reducible to this minute and vast work of record and collectorship. If Aristotle begins as a spectator or listener of natural phenomena, he does so as one who wants to

understand as much as to know, one fascinated both by the concrete plurality of natural phenomena and by the theoretical avenues that they may suggest, one yearning for knowing causes, relations, regularities, deviations, exceptions and monstrosities. Aristotle is no less inquisitive than curious, he wonders as much as he is surprised. Whereas investigation and exploration constitute the first moment of his philosophy of nature, they are in fact meant to provide material for comparison, interpretation, elaboration, specification, generalization, in order to put natural phenomena to an internal critique, in order to get informed by life forms, to access the logic Aristotle claims his interlocutor to have.<sup>26</sup>

Just as Aristotle's logic was an extensive dialogue of language with itself, Aristotle's philosophy of nature is equally dialogical: it indistinguishably involves a listening to natural phenomena and a challenging. The best way to picture Aristotle in front of nature is perhaps to think of Socrates in front of one of his interlocutors.<sup>27</sup>

c. Ethics: At the end of the *Nicomachean Ethics*, Aristotle sketches a twofold program<sup>28</sup>: he sets out to offer an extensive review of his predecessors' view on political constitutions, after which he would evaluate them on the basis of his collection of constitutions of Greek city-states. The first part of the program is often taken to correspond to the middle books of the *Politics*, and the second part to the constitutions of 158 Greek city states Aristotle compiled according to the ancient book lists, only one of which has been discovered at the end of the 19<sup>th</sup> century: the *Athenian Constitution*. We mention this only to suggest that Aristotle's work on ethics and politics follows the same pattern as his logic and physics: a gathering of a

great amount of research beyond first-person or even second-person experiences, and then a subsequent critical discussion of/with them.

For, the *Ethics*, which ends by the declaration of this dialectical program, itself proceeds no less dialectically. Since we shall shortly return to some methodological aspects of the *Ethics*, let us point out here that Aristotle's ethics not only proceeds dialectically, but also offers a view of individual human beings and of their political life as fundamentally dialogical: according to the *Ethics*, the human soul is structured as an environment of dialogue between the desiring part of the soul and the rational part, comparable to one's relation to both one's father and friends<sup>29</sup>; the *Politics* further exposes, no longer a metaphorical, but a literal dialogue with those two interlocutors: one's growth, education and deliberation both within the familial and the political community. If in claiming this Aristotle could have hardly avoided looking into his own soul and his own relations, we are in a position to ask who Aristotle's own fathers and friends were. And although we do not know much concerning his real ancestors, family, and friends, his own work gives us a good idea about his philosophical fathers and friends: among them were indeed the Platonists, and even Plato himself, but also his predecessors such as Empedocles, Democritus, Parmenides, Eudoxus, and Heraclitus. Aristotle's ethical political philosophy not only proceeds dialectically, but also thematizes dialectic as constitutive of the individual and social life of human beings.

## 2. Aristotle on method and dialectic.

After this overview of the dialectic at work in three fields of inquiry in the Aristotelian corpus, let us support our claim that Aristotelian method is generally dialectical by turning to his explicit discussion of dialectic. This discussion is found in the *Topics* where Aristotle takes dialectic (*dialektikê*) to be a kind of “syllogism” (*sylogismos*) in the loose sense of “reasoning”; for, while the syllogism in the strict sense is a *logos* in which, certain things having been put, something else necessarily follows through them<sup>30</sup>, a dialectical syllogism starts from widespread opinions (*endoxa*), from opinions accepted by everyone or by the majority or by the wise.<sup>31</sup> The beginning of dialectic is “induction” (*epagôgê*) or even “perception” (*aisthêsis*): a taking note of what is “out there”.<sup>32</sup>

This preliminary appeal to available opinions in no way means that dialectic takes for granted commonsensical or authoritative views, an immediate perception or first impressions, and simply builds upon that basis; on the very contrary, dialectic takes up available opinions precisely so as to be able to return upon them with a critical evaluation and an argumentative account. Starting out with an “induction”, dialectic typically *uses* deductions in order to follow up or push through the implications of those opinions.<sup>33</sup> Thus dialectic is less characterized by its starting point, “widespread opinions”, than by its ability to critically return to them. This is precisely that which a syllogism in the strict sense of deductive inference cannot do and is not intended to do.

Aristotle himself argues that dialectic is characterized by its ability to reflect on its premises and first principles, and is thus capable of a reflexivity of which even science as such is necessarily incapable:

“[This field of inquiry, namely dialectic] is useful for philosophical sciences because, if we are able to question both [sides of a question], we shall more easily discern truth and falsehood at each point.<sup>34</sup> But further, [it is useful] in connection with the first principles in each science, for it is impossible to say something about them on the basis of the principles peculiar to the science in question, since principles are prior to everything else, which is why it is necessary to deal with them through the widespread opinions on each point. This belongs characteristically or most appropriately to dialectic: for, as it is investigative, it lies along the principles of all methods.”<sup>35</sup>

Dialectic starts out with what is already “out there”, what is already known by us, already familiar, obvious, clear and distinct for us, in order then to reach a point from which we can critically evaluate it.

Aristotle’s remarks on dialectic clearly echo the procedure we find at the opening of a great number of his central works. The *Posterior Analytics*<sup>36</sup>, the *Topics*<sup>37</sup>, the *Physics*<sup>38</sup>, *On the Soul*<sup>39</sup>, and even the *Metaphysics*<sup>40</sup> and the *History of Animals*<sup>41</sup> open with a common “way”: to proceed from what is clear and knowable to us toward what is clear and knowable simply or by nature. The perhaps most

famous version is the one at the beginning of the *Nicomachean Ethics* where Aristotle pays tribute to Plato:

“We should not overlook the distinction between the *logoi* that start out from principles and those that lead to principles. For it was well that Plato too raised this question, and inquired whether the way is from principles or toward principles, just as in a race one may run from the judges to the boundary or the other way.”<sup>42</sup>

In front of this dilemma, Aristotle seems to open up an obvious safe ground: “One must begin from what is known; but this has two meanings: things known to us and things known simply. Perhaps then we, at any rate, ought to begin from the things that are known to us.”<sup>43</sup>

If there is anything like an Aristotelian method, it proceeds from what is known and already clear to us toward what is most knowable and clearest according to nature.

### 3. Dialectic as a way toward nature.

How then is this procedure from what is “known to us” toward what is “known simply” a dialectical procedure? Let us answer by retrieving the three fields of inquiry distinguished above: logic, physics and ethics.

a. Language: Insofar as we know a language, an amazing amount of things is unproblematic for us: a vocabulary, grammar, syntax, major text forms, expressions, proverbs, songs, etc. To know a language is not only to have a tool for acquiring or exchanging information, neither is it simply a constant anxious obedience to rules, but it is to have already been exposed to a great amount of knowledge to such a high degree as to have “forgotten” it, so much so that this knowledge has a major but concealed impact on the kind of knowledge we may expect language to provide. Grownup speakers have internalized a language to such a degree that they necessarily have “forgotten” that it was acquired in the first place, and that they may take it as an object of skepticism, inquiry and interrogation. In other words, our mother tongue(s) is developed enough to become an interlocutor for our challenges. It is only as speakers of a particular language that we can require more rigor or justification from it.

To return to Aristotle’s “dialogue with language” in his logical works, it is simply by having a language that we can take it seriously and try to make explicit what we know by eliminating simply apparent distinctions (synonymy) or distinguishing conflated and unnuanced terms (homonymy), by revealing hidden paralogisms (*Sophistical Refutations*) and inexplicit regularities (*Analytcs*), unproductive clichés or fruitful generalizations (*Topics*), by producing new meanings for existent words or even by creating new words and constructions. Far from naïvely forgetting the significance of language and assuming it to simply correspond to things, and far from uncritically imposing the categories of the Ancient Greek

language onto things, Aristotle's dialogue within language is oriented from what is already clear to us in language toward what is clear in itself.<sup>44</sup>

b. Nature: It remains true that we know a lot more than words, meanings, grammatical rules and constructions, whether or not by means of language. Much more is clear to us: first of all, our body, our health, our habits, our needs, and further the weather, the earth, the elements, astronomical phenomena, organic living beings, animals, motions and changes, and an amazing amount of artifacts. In life, there is an obviousness and unproblematic character in what all these are, how they work and especially how they don't.

This common knowledge is again preliminary. This realm of familiarity, clarity and immediate experience is far from offering us (and is not expected to offer us) an explicit definition of motion or time or a meticulous account of the songs of birds; this practical acquaintance does not necessarily supply us with, and even by itself lead us to inquire about, the inner workings of living beings or of our environment. A clear knowledge of the kinds of motion or change, of melting, of growth, of nutrition, of sensation and locomotion – this is something quite different than perceiving them, being familiar to them or even living by them. Although much is apparent to us “out there” in nature, most of it is barely sufficient to even let us ask what is going on “in there”. This is why Aristotle's dialogue with nature proceeds from what is clear to us as living beings toward what is clearer by nature.



c. Human life: Finally, we also know much, and perhaps most, about ourselves and about others, about our personal history and about the community we live in. This clarity is what makes us able to navigate in everyday life with a relative amount of comfort in so far as we do so. What we and others feel, what we want, what we think, how we respond to the world, and what we want our lives to be like: All these are out there in the form of discourse, gestures, reactions, customs and objects. A flag, with its emphatic visibility, is a clear message from some people to themselves as much as to others; similarly, a nickname may well connote one's clear evaluation of someone to herself and to others; precisely imprinted on the immediate surface of the body, a tattoo may well be a sign of something to oneself; or even a scar, depending on how deep the wound is and on how it is made or interpreted, may well mean something far beyond a simple wound. The realm of human significations and institutions is a third domain of "obviousness".

And yet, indeed, our acquaintance with human meanings and institutions is the closest, strongest and oldest kind of familiarity, and therefore it is the hardest kind of knowledge to critically examine. This "knowledge" does not exempt us from, but rather obligates us to much reflection and long hesitation when it comes to bearing pain, to making a decision concerning what we really want, to figuring out what is going on "in there" as we listen to somebody else or even to ourselves, to discussing what is meant by "freedom" or "war", or what Aristotle meant by *logos*.

Aristotle's method is best exemplified by the dialectic he uses and exhibits in the *Ethics* and *Politics* in so far as they both require a move from a pre-givenness,

preinterpretedness and preunderstanding of human life and community toward a justified account of these as a result of internal critique.<sup>45</sup>

#### 4. The modality of dialectic.

Then dialectic characterizes Aristotle's method in the sublunar, and *a fortiori* human realm, by its procedure from what is "clear to us" toward what is "clear simply", i.e. from the pregiven widespread opinions toward principles.

What do these "principles" look like? What form does Aristotle's procession toward them take? Aren't we far off from the traditional view that for Aristotle knowledge is of universals and science is demonstrative and hence from Aristotle's general theory of science in the *Analytics*?

Before we turn to our own method in this dissertation, we must note that the questions above call for two distinctions, one between exposition and research in Aristotle's work, and the other between quantification and the logical modality of "for the most part" (*hôs epi to polu*). So, on the one hand, it is true that there are Aristotelian works that are expositions such as the *Poetics*, the *Categories*, the *Sophistical Refutations*, the *Prior Analytics*, and, to a certain degree, some of the *Parva Naturalia*, *On the Heavens*, and the *Rhetoric*, where Aristotle starts out by definitions and gradually exposes results of his previous researches. It is worthwhile to note that Aristotle's approach often tends toward exposition precisely when his field of inquiry is a new one, i.e. one that lacks the widespread opinions to proceed from. On the other hand, in many central works Aristotle explicitly starts with a

discussion of his predecessors views, and there questioning outweighs exposition, dialectical research outweighs demonstrative procedures while using them. Among these, the *Metaphysics*, the *Physics*, the *Nicomachean Ethics*, *On the Soul*, his *Posterior Analytics* are all Aristotelian works that directly put dialectic to use, and explicitly so.<sup>46</sup>

After distinguishing deductive exposition from dialectical research, we must also distinguish between the principles concerning the sublunar region and those concerning the supralunar or mathematical realms. The modality required by the sublunar realm is irreducible to the apodictic principles of the supralunar, and its rigor falls between pure necessity and pure contingency. According to the tradition, Thales not only made exact and profitable deductions concerning heavenly motions, but also advised the Ionians to build up a central chamber for deliberating issues that involve a modality that is fundamentally inadequate for such exactness and predictability.<sup>47</sup> This modality is expressed by Aristotle with the phrase: *hôs epi to polu*<sup>48</sup>, often translated as “for the most part”, “usually”, “to a large extent” or “generally”.<sup>49</sup>

Despite appearances, “for the most part” is not a quantifier, but a logical modifier that governs conclusions and *a fortiori* principles in the sublunar realm. Let us give one example of a principle applying “for the most part” in biology, and then a schematic illustration of the dialectical process in the *Ethics*. The proposition “sheep have four legs for the most part” is neither a universal nor an existential. It differs from the existential proposition “some sheep have four legs” in that its truth is not refuted by the negation of the existential, i.e. in a possible situation where *no* sheep for some reason would have four legs. It also differs from the universal proposition

“all sheep have four legs” in that its truth is not refuted by the negation of the universal, i.e. in a situation one where *not all* sheep would have four legs. In a word, having four legs for sheep is neither apodictically necessary nor merely an eventuality. What characterizes principles “for the most part” is that they are known neither deductively nor inductively, but by dialectically inquiring into what it is *for the being at hand* to be, since such principles apply conditionally, that is, under the typical Aristotelian reservation, “if nothing prevents it”.<sup>50</sup>

Let us take an example from Aristotle of a dialectical process leading from what it is “clear to us” toward what is most known by nature in the sublunar realm, from the widespread opinions to a principle applying “for the most part”. Let us turn to the beginning of the *Ethics*.<sup>51</sup> According to Aristotle, although there are many incompatible opinions concerning the supreme human good, something is clear to all, namely that this good is “happiness”.<sup>52</sup> This is where the dialectical process begins<sup>53</sup>: What do the majority or the wise exactly mean by “human happiness” and are they tenable views?<sup>54</sup> Aristotle dialectically eliminates or nuances a number of candidates, and finally gathers what is left from his criticisms and distinctions in his definition of “human happiness”.<sup>55</sup> Thus the opening dialectical discussion of the *Nicomachean Ethics* led to a principle.<sup>56</sup> And it is exactly here that Aristotle emphasizes the modality of dialectic, and adds that this principle applies “for the most part” by discussing the extent to which external goods, fortune, and even the fate of one’s descendents may well also be necessary for human happiness. In other words, because of the very subject matter at hand<sup>57</sup>, the principle is neither necessary in the way a geometrical principle would be, nor is it on a par with *any* proposition, for

instance, its negation. The logical modality of “for the most part” thus secures a level of generality, characteristic to the sublunar region, which allows the validity of the conclusion that human happiness involves the activity of one’s soul according to virtue *not at the expense* of the fact that there are virtuous but unhappy people. Then Aristotle infers that, if happiness is so “for the most part”, then one must inquire further into the human soul, habits, and virtues – which what Aristotle does in the rest of the *Ethics*.<sup>58</sup>

Thus, Aristotle’s dialectical method not only avoids the exclusive options of induction and deduction, between existential and universal propositions, but also the analogous dilemma between necessity and mere chance, and between apodictic science and mere unjustifiable opinions – all of which prove to be either inapplicable to or uninformative within the sublunar realm, and even more so within human life.<sup>59</sup> These realms, as well as our everyday life, are not simply deprived of eternal necessary structures; they allow for demonstrations that apply “for the most part”, a logical modality in its own right, irreducible to mere chance: “There is no demonstrative science of that which happens by chance, for that which happens by chance is neither something necessary nor something happening for the most part.”<sup>60</sup>

## 5. Dialectic as maieutics.

Let us conclude our discussion of Aristotle’s method by briefly highlighting how Aristotle’s dialectic perpetuates, diversifies and develops the Platonic and/or Socratic dialectic. We already claimed and textually justified that Aristotle’s method

*perpetuates* the Platonic-Socratic elenchus, dialectic, and even the “maieutics”. We may also claim that Aristotle *diversifies* this dialectic because he not only converses with his own soul, to use Socrates’ illustration of “thinking” in the *Theaetetus*<sup>61</sup>, but also seems to believe, unlike Socrates in the *Phaedrus*<sup>62</sup>, that he can “learn from trees” as much as from his contemporaries or predecessors. Finally, Aristotle *develops* the Socratic-Platonic dialectic: he did not turn away from nature in order to embark on a “second sailing” and search truth in *logoi* as the young Socrates did, he does not even seem to have felt the necessity of such a choice; Aristotle rather searched for and found *logos* in nature as much as in ethical political life<sup>63</sup>, and, to use the language of the *Phaedo*, observed the eclipse without getting blinded.<sup>64</sup> In this sense, Aristotle is radically Socratic.<sup>65</sup>

## C. METHOD OF THE DISSERTATION.

We presented the topic of our dissertation in connection with Aristotle's work and that of his posterity; we then claimed that Aristotle's method can be best termed as dialectic, a procedure from "what is clear to us" toward "what is clear by nature"; we supported our claim with textual evidence, explained its application to the three major fields of inquiry of the Aristotelian corpus, and finally clarified the logical status of Aristotelian principles in the sublunar and human realm. In this last section of our introduction, we shall exhibit the method and outline of our own work by first arguing against two contrary approaches to Aristotle.

### 1. Two impasses: Inductive method.

The method of our dissertation must also be dialectical. For, reading and interpreting Aristotelian texts are not much different than the above-mentioned human undertakings and reasonings that are irreducible to both chance and necessity. Now we shall justify this claim dialectically by taking up the available methods and submitting them to an internal critique.<sup>66</sup> The methods of approaching Aristotle can be grouped under two major headings and roughly named inductive approaches and deductive approaches – both of which we shall show to be necessary but insufficient for serving our purposes.

To begin with, there is a more or less identifiable corpus of writings in Ancient Greek which is called "Aristotle's philosophy" with more or less rigor. This

is apparent to us not through reasoning, but already from our preliminary acquaintance with the world and its history. If one is to engage in an investigation of the meanings of *logos* in Aristotle's philosophy, then one may open up his "books" and take note of the occurrences of the word *logos*. This way of reasoning is an inductive one: "Induction is the forward way from particulars to universals. For instance, if the skilled pilot is the best pilot and the skilled charioteer the best charioteer, in general the skilled person too is the best in each case. Induction is more convincing, clear and easily knowable by perception [than deduction], and is shared by many, whereas syllogism [deduction] is more cogent and more efficacious against objections."<sup>67</sup> Employing an inductive approach to our topic, then, we may proceed in the following manner: "if *logos* means 'x' in these texts, and if it means 'y' in those, and if it means 'z' in others, *then* the meanings of *logos* in Aristotle are 'x', 'y', 'z'..."

One can see the affinity between induction and statistics. Hence, a crude but indispensable way to put the inductive method to practice is to do a word-count. In front of the complexity of the problem, this approach, which we do employ in Chapter I and occasionally in the following chapters, seems to at least yield a clean-cut starting point: it answers the question "Does it exist?" by presenting the particular occurrences of *logos* in Aristotle's corpus. From there one may also quantify the frequency of the word *logos* in Aristotle's "books" and compare it with similar statistics extrapolated from Plato, Heraclitus or the Gospel according to St. John. This procedure would be convincing, clear and easily knowable by just looking; but, as Aristotle remarks, deduction is more efficacious against objections. The inductive



“results” can never be bullet-proof or even conclusive since any number of statistics is by definition exposed to be refuted by a higher number of samples to the contrary. To take up Aristotle’s example of the skilled person above, one can discuss at length whether a skilled killer, liar or thief is also the best – a classical problem in ethics in Ancient Greek philosophy.

Besides, what is the unit that is to serve as a basis for this network of occurrences? What exactly are we to count? Indeed, the word “*logos*”. But are we to count the word “*logos*” only or are we to also count its declinations, its compounds, and even perhaps the amazingly common root of *logos*, namely the verb *legein* with all its conjugations and compounds? This question perhaps reveals less a weakness of the statistical method than its possible strength: this method can in fact provide us with more and more statistics concerning these “relatives” of *logos* such as *legein*, *physiologos*, *logismos*, etc., and may even map out their intricate contextual combinations with adjacent words, the “neighbors” of *logos*, such as *ergon*, *sigê*, *mythos*, *ekhein*, *apophansis*, *onoma*, *phônê*, and *ousia*.

The true weakness of the inductive method becomes clear as soon as one tries to understand, interpret or translate even one occurrence of *logos* by strictly using this method. Take the famous line of the *Politics*: “*logon de monon anthrôpos ekhei tôn zôion.*”<sup>68</sup> This method can provide more information concerning other occurrences of the word *logos*, its “relatives” and its “neighbors”: “*logos* appears in *Categories*, 1, and *legein* in *Categories*, 4”, “*logos* is in the nominative singular form in this context”, “*logos* is followed by the verb *ekhein* in that context”... To take this last “result”, even if in an ideal situation *logos* turns out to be always followed by *ekhein*,

how does this give us any insight into the meaning of *that* particular occurrence? To answer this, we are led to the question: What does *ekhein* mean then? The statistician will then supply another chart, this time of the occurrences of *ekhein*, and its “relatives” and “neighbors”.

As can be seen, followed through to its extreme consequences, the purely statistical method leads to an infinite regress in understanding. Under the statistical hypothesis, a single occurrence of *logos* can mean anything, and this is indeed expectable at the beginning; but it can *equally* mean anything however often it is used, however much it is *explained* by Aristotle. Statistical information defers the task of understanding because it is a *preparation* for that task. No matter how much statistical information we gather, we are still at a loss as to *what* exactly we are counting. The statistical-inductive method is fundamentally inadequate for moving from the premises to the conclusion in the argument it set out and infer: “...*then* the meanings of *logos* in Aristotle are ‘x’, ‘y’, ‘z’...”

Infinite regress is not only a problem at the lowest level of understanding even one occurrence of *logos*, it also shows up at the highest level, namely at the level of the corpus as a whole. Just as a statistical method is incapable of showing us *what* to search for, it also fails to offer us any clue as to *where* to do our research. What exactly will be our field of research? Where are the boundaries of the corpus? The statistician can always choose a certain edition or manuscript, but not *as a statistician*. Editors and philologists urge us to know well beforehand that a lot of *choices* are already made in the process of editing or translating an Aristotelian text – which is why a critical apparatus is not only helpful but necessary.<sup>69</sup> The strictly

statistical method will have no resource for justifiably evaluating the textual options from which it necessarily chooses. In other words, a statistical-inductive method is unable not only to infer from its premises to a conclusion (“...*then* the meanings of *logos* in Aristotle are ‘x’, ‘y’, ‘z’...”), but even to delimit the domain from which to draw its premises as “*logos* means ‘x’ in this text”, “*logos* means ‘y’ in that text”, “*logos* means ‘z’ in that other text”, etc.

This pulverization of the meaning of any word, this infinite regress in argumentation and this confinement in unintelligibility are not the fate of the reader of Aristotle, but only that of one who simply limits herself to count, measure and match. To use the terminology of the very first sentences of the Aristotelian corpus, the statistical method provides us “homonymies” and “paronymies”, none of which entail “synonymy”; it processes words so as to provide words, but does not supply any insight into the “*logos* of being”.<sup>70</sup> This is why, while the statistical-inductive method provides a potentially infinite list of the “relatives” and “neighbors”, it remains incapable of detecting the “friends” of *logos*, i.e. terms that are neither etymologically related, nor contextually adjacent, but *conceptually connected* to it, terms such as *meson*, *ethos*, *mixis*, *eidos*, *hexis*, *physis*, or *phasis*. In other words, the coherence of the statistical network is not conceptual but lexical – which is fundamentally flawed for fulfilling a project of revealing and distinguishing the various uses of the term *logos*. For Aristotle and for us, the statistical method is necessary but insufficient: one must certainly *use* it, but this is not reason enough for *adopting* it.

## 2. Two impasses: Deductive method.

If the statistical method pulverizes the question of *what* is to be sought and *where* to conduct the research, one may well think of solving the first problem by consulting a dictionary, and the second by using a canonical edition of the Aristotelian corpus. Besides this wealth of available resources, anyone more or less acquainted with philosophy has already various conceptions of Aristotle's thought; it is "clear to us" in varying degrees that Aristotle's philosophy is systematic, encyclopedic, teleological, anti-Platonist, universalist, ahistorical, pagan, scientific, empirical, essentialist... Once we free ourselves from the statistical immersion into the Aristotelian texts, it seems like we already have a wealth of resources from which we can deduce the meanings of *logos* in Aristotle's philosophy: "*Since* we already know that Aristotle's philosophy is such and such, and *since* this authoritative translator or commentator understands *logos* as 'x', 'y', and 'z', *therefore logos* means 'x', 'y', 'z'..."

But *how* is Aristotle's philosophy really? Besides their unwarranted character, our preconceptions are no more consistent than dictionaries, editions and translations: Which preconception are we to start out with? With Aristotle the empiricist or with Aristotle the essentialist? With Aristotle the ahistorical philosopher or with Aristotle the first philosopher of a history of philosophy? With the naturalist or the theologian? Let us suppose that our preconceptions were not contradictory and that the secondary works on Aristotelian texts were not controversial at almost every point: once one simply takes the aforementioned sources and conceptions as preestablished norms and

starts from there, there is no need left to go to Aristotle's text at all. Let us again think of an ideal situation in which we possess a text that is proclaimed by *the* authorities as *the* authentic version of the *Politics*, and we read the famous phrase "*logon de monon anthrôpos ekhei tôn zôiôn.*" How are we to understand *logos* in this context, given that *logos* may mean a lot of things? Let us say that we look up *logos* in *the* authoritative Ancient Greek-English dictionary, and that the dictionary explains *logos* as "reason" and luckily cites this very phrase from the *Politics* as an example for the meaning of *logos* as "reason". But how are we to understand *reason* in this context, given that *reason* too means a lot of things? Let us say that *the* authoritative Ancient Greek-English dictionary disambiguates its meaning by reference to *the* authoritative English dictionary: *logos* in the famous line from the *Politics* means "reason" in the sense of "intelligence". The problem would then be solved. But isn't there an even shorter way? For the meaning of *logos* in the aforementioned passage, one can solve the problem by simply consulting *the* authoritative commentator or the most prestigious English translation, or even by inferring that, since Aristotle is a rationalist, *logos* there denotes the "essence" of human beings: "rationality".

It should be clear that these are not philosophical solutions, but mechanical applications of uncritically preestablished authoritative secondary resources or of unaccounted preconceptions that cannot be criticized by further deductions. In other words, critical editions, translations, dictionaries, indexes, and sometimes even preconceptions of Aristotle are all valuable tools, but never keys; they are always there, and yet never to be *possessed*, but always to be *used*. Otherwise one becomes no longer a reader of Aristotle, but a reader of the commentator or the translator. By

using a strictly deductive method one investigates not the meanings of *logos* in Aristotle, but the meaning of “reason” in the work of the translator or commentator – but, sure enough, there the same problem emerges because it was deferred: what does *ratio* mean in Thomas Aquinas or *aql* in Ibn Rushd?<sup>71</sup> Further, why didn’t Aristotle use *nous* in the sentence from the *Politics*, given that *nous* is equally translated and interpreted as “intelligence” by many authorities? If, in the context of the *Politics*, *logos* is to be understood as “reason” in the sense of “intelligence”, so is *nous* in other contexts; if *logos* is translated as “reason” in the sense of “cause”, so is *aition*; if *logos* is translated as “definition”, so is *horos* and *horismos*; if *logos* is translated as “relation” in one context, so is *pros ti* in many others. What warrants Aristotle’s use of *logos* in one context and of another word in another? Most importantly, the deductive method starts by making it impossible to ask the very question we are asking in our dissertation, in that it immediately provides the various meanings of *logos* without a detour into the Aristotelian texts: “In different contexts *logos* means intelligence, formula, essence, definition, discourse, cause, proportion, relation...” But it is precisely this immediacy that forbids us from inquiring into whether or not these meanings are interconnected, and if so, how. This is why we take Bonitz’ fourfold distinction of the meanings of *logos* (“discourse”, “essence”, “reason”, “proportion”) only provisionally.

Similar reservations follow from biographical indications taken as principles for univocally, i.e. deductively, determining Aristotelian thought at the expense of the possibility of being informed by it.<sup>72</sup> From our remarks on dialectic in Aristotle, it should be clear that we agree that the Aristotelian corpus as a whole and even his

individual “works” should be approached less as an exhibition of a unitary system than as a development, process, research and genesis.<sup>73</sup> The guidelines of this process, its cornerstones and hesitations should be supplied by the corpus itself and not merely by biographical indications. For instance, Aristotle has been clearly influenced by Plato and/or his surrounding, but merely biographical indications, abstracted from Aristotelian works themselves, do not provide us enough proof for talking about a “Platonic period” or “Anti-Platonic period” and for disambiguating such nomenclature. Aristotle has been influenced by Plato and he does argue for and against him, but it is the Aristotelian corpus itself that tells us why and how this happens, and not simply incidents in his life.<sup>74</sup> In short, the death of Plato and Aristotle’s leaving Athens are historical facts, but they are insufficient for establishing their philosophical implications: does Aristotle’s leaving Athens mean that he will turn away from Plato’s thought or that he will cling on to it with a stronger sense of duty and more enthusiasm? Biographical indications cannot provide us guidelines for approaching Aristotle unless they take their power of conviction from the corpus itself. We cannot *begin* by supposing a Platonist period and then an anti-Platonist one in Aristotle’s career and then pursue our investigation along those line of demarcation; but, as we suggested above, we may well *end up* drawing conclusions that may shed light on Aristotle’s relation to Plato, concerning the way he radicalizes the Platonic and/or Socratic undertaking of *logos*, but also concerning the way he perpetuates the “dialectic road” toward the intelligible in the divided line from Plato’s *Republic*<sup>75</sup>, and thereby answers Socrates’ question: “And do you call that man dialectical who grasps the *logos* of being of each thing?”<sup>76</sup>

In short, biographical indications, taken as a principles, have the same problematic character as other deductive approaches: they provide us material to use, criticize, interpret and possibly agree with, and not principles to deduce from. As the statistical-inductive method is unable to move away from premises so as to draw a conclusion, a purely deductive method will beg the question. Just as a merely inductive method falls into infinite regress for lack of a critical distance from the texts, the exclusive adoption of a purely deductive method will do so by moving us away from them. In the first case, we are stuck with “what is clear to us” without any access to “what is clear in Aristotle himself”; in the second case, we start out with what is supposedly clear in Aristotle, with imported “principles”, but we are deprived from resources for questioning, criticizing, evaluating or justifying them, for *arriving* at them. Induction disables us from *interpreting* anything in the Aristotelian texts, deduction disables us from interpreting anything *in the Aristotelian texts*. Thus, as we have seen, the procedure from what is clear to us toward what is clear in the object itself is a dialectical procedure – the most adequate method for research in the sublunar and human realm no less than for approaching Aristotle’s thought itself.

### 3. Method of the dissertation.

This exposition of the symmetrical shortcomings of inductive and deductive approaches to Aristotle outlines what we are to expect from a more adequate method: a procedure that *starts out* with what is clear to us and that argues its way *to* principles. To repeat our quotation above from the *Topics*:



“[Dialectic is useful] in connection with the first principles in each science; for it is impossible to say something about them on the basis of the principles peculiar to the science in question, since principles are prior to everything else, which is why it is necessary to deal with them through the widespread opinions on each point. This belongs characteristically or most appropriately to dialectic: for, as it is investigative, it lies along the principles of all methods.”<sup>77</sup>

Deductive models provide us a way to form valid inferences that apply either apodictically or “for the most part”, but they fail to offer access to the critical reevaluation of our principles; on the other hand, inductive models offer access to perception, to texts, and to our preexistent knowledge, but cannot do more than putting them as a bundle of possible and incommensurable starting points without enabling us to articulate, compare or contrast them instead of merely matching and counting them. To use the metaphor of a poker game, deductive methods do not allow us to draw new cards, whereas inductive ones simply reshuffles them and redistributes new ones.

We, however, want to be able to return to our starting point without this being mere loss of time and effort. If our starting point does not reflect the whole truth (and hopefully it does not), then we want to be able to return there with an evaluation of its shortcomings and overstatements. Returning to *where we were*, our procedure must directly involve us at each stage, and this return should take the form neither of *petitio*

*principii* nor of *tabula rasa*, but of self-criticism. This is why our method is dialectical.

What then are we to do if we are to use a dialectical method? We argued that for Aristotle the dialectical method is characterized by starting with “what is clear to us”, and secondly by its backward orientation to go back to its beginning with a critical evaluation according to “what is clear by nature”. These two moments sketch out our procedure: first, we have occurrences of *logos* in the Aristotelian corpus, dictionaries, indexes, commentaries and translations, which all form a vast “deck”, and a beginning point for reading these occurrences, a “first draw”; secondly, we proceed to interpret that first text by confronting it to other parts of the text and the corpus, and, if need be, to Aristotle’s contemporaries and predecessors (Plato, Socrates, Heraclitus, Empedocles) and to his posterity (Porphyrius, Descartes, or Hobbes). This confrontation and cross-examination may be likened to strategic further draws from the deck. Bringing survey together with demonstration, our dissertation takes the form of an argumentative research; being prospectively a research and retrospectively an argumentation, our method exhibits the twofold character of dialectic.

How far can we stretch the metaphor of a poker game? For instance, was our “first draw” to be a blind choice? This has been a difficult problem since our dissertation is not on a specific Aristotelian text, but on a concept occurring everywhere in the corpus. From our familiarity with the corpus, we certainly had a sense of which texts could be clearly relevant and resourceful, but we were at a loss as to why they would be so and which other apparently less relevant texts would turn

out to be as crucial. To take up the Socratic metaphor, we had some destinations in mind in our first sailing (which is why we embarked on the journey to begin with), but we were unsure as to what exactly they looked like, whether we would reach all of them and whether there would be an inhospitable Cycloptic island we would have to disembark on.<sup>78</sup> One may get a sense of the vastness of our field of research by adding to the high frequency of the word *logos* in Aristotelian works the variety of the fields these works are concerned with (logic, indeed, but also biology, physics, ethics and politics...) and the simply unfathomable amount of secondary literature devoted to all of them. We wish to have dealt with this vast domain by the accuracy of our interpretations and, most importantly, by the success of our research, i.e. the strength of our overall argument and the originality of our conclusions.

So what was to be our “first draw”? Since, unlike a deductive method, we could not start out by delimiting texts, we went to the very first lines of the traditional corpus, the distinction between homonymy and synonymy at the very opening of the *Categories* by the criterion of a common “*logos* of being”. We chose this distinction as a starting point not simply because, as an inductive method may have suggested, the traditional Aristotelian corpus opens with it, but because *it* opens the corpus as all our consequent argumentation will show retrospectively: this passage is the best starting point of an investigation of the various meanings of *logos* in Aristotle’s philosophy in that, although we claim that Aristotle never thematizes *logos*, it abruptly problematizes the relation between beings and words by means of the concept *logos*. In short, the passage is highly question-worthy in that this seminal distinction of the Aristotelian corpus designates our problem precisely without

thematizing it. It is this question of “*logos* of being” that drove our dissertation as a whole by unfolding from logical and metaphysical questions into Aristotle’s accounts of nature and human life.

#### 4. Outline of the dissertation.

In order to facilitate the reader’s *prospective* reading of our dissertation as a research, let us offer a *retrospectively* constituted overview of its argument. Our attempt to solve the question of *logos* in Aristotle’s philosophy crossed six chapters, the first two on Aristotle’s logic (*Categories*, *On Interpretation*), the third and fourth on his physics (*Physics* and *On the Soul*), and the fifth and sixth on his ethics (*Nicomachean Ethics* and *Politics*).<sup>79</sup> In the following outline, we shall italicize our conclusions that justify our overall claim that the various sense of *logos* in Aristotle refer back to a focal meaning: a relation holding on to its terms in their very difference without letting one yield to the other, providing the included middle or the inclusive counterpart to what could appear as a simply exclusive principle of non-contradiction.

#### Being.

Chapter I: Being: What does “*logos* of being” mean at the very inception of the *Categories*, which itself opens the traditional corpus? It distinguishes homonymy and synonymy by providing an answer to the question: “What is it *for this being* to

be?”<sup>80</sup> Through our discussion of the questions emerging from its context, we argue that *logos* here means standard: a relation between a being and “what it is *for it* to be”. *That a being has such a standard means that it holds on at once to its being and to its claim concerning “what it is for itself to be”, without letting one yield or be indifferent to the other.* But what does such a standard mean unless it is inherent to the being in question? How are we to determine what it is to be *for this being*?

Chapter II: Potency: *On Interpretation* elaborates the question of the inherence of *logos* as standard: for a being to have an inherent standard implies that it is neither indifferent nor identical to it and that its meeting the standard is neither merely necessary nor an eventuality. *To have a “logos of being” then means to hold actuality and an inherent potency together without letting one yield to the other.*<sup>81</sup> Having an inherent standard takes the two forms of motion and action, according to whether it involves univocal potency or a two-sided potency, a “potency with *logos*”, *a potency for two contrary outcomes without one outplaying or remaining indifferent to the other.*<sup>82</sup> The question of the “*logos* of being” is thus filtrated into two distinct questions: how does motion instantiate the inherence of the “*logos* of being”? And how does action do so?

Moving.

Chapter III: Natural motion: It is the *Physics* that thematizes moving beings. If, according to the *Physics*, nature is an *inherent* source of motion and the “form

according to *logos*”, then natural beings shall exhibit *logos* as their *inherent* standard<sup>83</sup> by means of internally motivated motions, namely reproduction, nutrition, sensation and locomotion.<sup>84</sup> But whereas a natural element, although capable of locomotion under compulsion, is indifferent to the difference of its likes and inimical to others’ difference, living beings further instantiate *logos* by producing their likes and integrating others: *a reproducing being holds contrary elements together by integrating them to its own “form according to logos” in another body, while the self-nourishing being does so in its own body.*<sup>85</sup> Reproduction and nutrition then are two ways in which living beings exhibit the inherence of their “*logos* of being”.

Chapter IV: Animal motion: Whereas reproduction and nutrition destroy other forms according to their own *logos*, the opposite holds true for sensation, the defining feature of animal life. “Sensation is a *logos*”<sup>86</sup>: unlike reproduction and nutrition, *sensation holds together the state of the organ and that of the object in their very difference instead of being indifferent to or overtaking it.* For Aristotle, locomotion too takes the “logical” form of the immediate conclusion of a practical syllogism: locomotion happens when *the animal holds both the universal premise spoken by desire and the particular premise spoken in sensation* unlike the univocal “universal” motion of elements or celestial bodies that is indifferent to all particular differences.<sup>87</sup>

One conclusion is drawn: while it appears as a grammatical category at the beginning of the *Categories*, “*logos* of being” means the standard of a being and the inherence of *logos* is exhibited by its internally motivated, i.e. natural, motions:

reproduction, nutrition, sensation and locomotion. This roughly corresponds to two of the four major senses of *logos*: “standard” and “proportion”.

But what about the senses of *logos* as “reason” and “discourse”? Remains then our second question: how does *action* instantiate the inherence of the “*logos* of being”?

Acting.

Chapter V: Human action: Having two-sided potencies, “potencies with *logos*”, a human being holds two contradictory options open at once without letting one yield to the other. This precisely confuses the immediacy of the practical syllogism: the particular premise is no longer provided by immediate sensation, but rather re-elaborated by positive states.<sup>88</sup> *Specifically human potencies are not potencies at the expense of a contrary potency*. Art, science and action, all positive states with *logos*<sup>89</sup>, presuppose “potencies with *logos*” in the *Nicomachean Ethics*: a dermatologist correctly interprets a particular itch by *keeping open the possibility that it may be a sign of healing as well as one of disease*. Positive states with *logos* (“intellectual virtues”) hold contrary interpretations of particular sensibles.

As to positive states according to *logos* (“virtues of character”), they involve the desiring part of the human soul: a courageous citizen is intellectually but also “emotionally” apt at deliberating well concerning matters involving fear, i.e. she *keeps open the possibility that a particular situation may call for retreat or attack*. *Positive states according to logos hold contrary interpretations of particular*

*sensibles in so far as the latter are objects of desire (pleasure or pain): “The desiring part in general somehow partakes [in *logos*] insofar as it listens to and can obey it in the sense in which we say ‘taking account [*ekhein logon*] of both one’s father and one’s friends’.”<sup>90</sup>*

Chapter VI: Human *logos*: The *Politics* takes this metaphor literally by claiming that *logos*, this time finally as “discourse”, establishes both the household and the city.<sup>91</sup> Developing an Aristotelian account of discourse and human communication, in our last chapter we claim that discourse is characterized by the human ability to understand and express that which is *not* lived and *not even livable* by the human individual first hand. This meaning of *logos* shares the same structure as all the previous ones: as *logos* as speech breaks down the boundary between what one has experienced and what one has not, *human beings are able to have first-hand experiences not at the expense of understanding and relating those they never had or may never have.*<sup>92</sup> This ultimate meaning of *logos* founds both the household and the city, provides a necessary condition of historiography, myth, politics and science, and finally enables humans to even inquire into what it is for *an ox* to be (and not *for a human being*) by asking: “What is it *for this being* to be?”

This last question, “What is it *for this being* to be?”, is precisely the question we discussed in the context of the *Categories* at the very beginning of our dissertation. Thus at the term of our lengthy pursuit of answers to the question “What should a being be like if it is to have anything like a *logos* of being?”, we also reached an answer to the question: “What should *we* be like if we are to ask such a question,



i.e. a question concerning the *logos* of being of something we are not?” The question of the “*logos* of being” presents itself only to a being “having *logos*”.

All these instances of *logos* (“standard”, “proportion”, “reason” and “discourse”) share the same structure in Aristotle: they are all relations that do not let their different terms yield or lay indifferent to one another. Propelled by both the principle of non-contradiction and this structure of *logos*, Aristotle’s philosophy thus presents itself as a Heraclitean attempt “understand how that which is disrupted has the same *logos* as itself: a back-turning harmony as in the bow and the lyre”.<sup>93</sup>

## 5. Further perspectives.

Our dissertation is inspired by what we timidly and indeed provisionally may call a “current” in reading, interpreting and translating the Ancients; among those that inspired us are figures as diverse as Martin Heidegger, Hannah Arendt, Enrico Berti, Rémi Brague, Francis Sparshott, John Sallis, Eva Brann, Joe Sachs, and Francisco J. Gonzalez. What, in our view, brings them together is at once a strong impulse to return to the Ancient Greeks by working through the historical sedimentation that separates us from them, and an effort to approach them neither as *ex cathedra* authorities for our time nor as historical data, but as interlocutors. What inspired us in them all is that they all put much emphasis on dialectic: on the importance of our interpretative activity as readers, commentators and translators.

We are aware that in this dissertation we have failed to write chapters devoted to the *Metaphysics* (especially book VI), to the *Rhetoric* and *Poetics*, and to a

monolithic study of *logos* in Aristotelian logic. This should be attributed to the fact that we made an unavoidable choice between thorough and deep specialization in one domain of Aristotle's philosophy and more exhaustive familiarity with the corpus as a whole, and that, indeed, we chose the latter option. Hence our shortcomings in terms of the depth of our analyses and mastery of secondary literature (especially Jaeger which we have only recently come in contact to) should be evaluated in terms of our perilous but deliberate choice of approaching *the* comprehensive thinker from a comprehensive angle.

By our dissertation, we wish to contribute to the above-mentioned effort of equally avoiding the option of a purely intrinsic or absolute evaluation of the classics as well as that of a simply instrumental approach to them. This is because we do not want to, and claim that we cannot, deny their influence on us or their distance from us. While it is ridiculous to underestimate the importance of Aristotle on science and philosophy as outdated, it is equally alarming to fall into antiquarianism. Neither "old" nor "ancient", for us Aristotle's philosophy is not only living, it is the philosophy of the future, of the young and the newborn. And this on three levels:

First, Aristotle's logic has much to teach us about what understanding and explaining means in an age of statistics, that is, of *post hoc ergo propter hoc* thinking, because the breadth of his work allows one to articulate causation and responsibility on all diverse levels from natural elements to human institutions and undertakings.

Secondly, Aristotle's physics can teach us how to understand the environment in a time on the verge of a cataclysmic future, because, unlike unworldly models of

nature, his philosophy of nature articulates the relation between living bodies and the nature that surrounds *and* constitutes them:

“There cannot be one wisdom dealing with the good of all things, any more than there is one art of medicine for all beings. Even if the human being is better than other animals, this makes no difference: for there are beings far more divine in their nature than the human being, for instance, most apparently at least, that out of which the cosmos is constituted.”<sup>94</sup>

Thirdly and finally, by its concrete, i.e. emotional, intellectual, interpersonal, familial and political account of human self-fulfillment, Aristotle’s ethics can help us interrogate our education which is gradually polarized between absolutist repressive propaganda and mere technical training, for, “just as the human being, when fulfilled, is the best of animals, the human being is also the worst of all when sundered from law and justice.”<sup>95</sup>

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<sup>1</sup> Heraclitus, DK22B51. Quotations from Presocratics follow the Diels-Kranz edition. We are following Hippolytus in reading *homologeîn* (“agreeing”, “having the same *logos*”) instead of *xumpheretai* (“bring together), and *palintropos* (“backwards”). Kirk and Raven cite Hippolytus as “the fullest source” in the context of this fragment. (G. S. Kirk, J. E. Raven and M. Schofield, *The Presocratic Philosophers*, (Cambridge: Cambridge University Press, 1983) p. 192)

<sup>2</sup> Plato, *Republic*, V, 479b11-c5. See also Plato, *Euthydemus*, 300d. All translations from Ancient Greek are ours unless notified otherwise.

<sup>3</sup> Hermann Bonitz, *Index Aristotelicus* (Graz: Akademische Druck und Verlagsanstalt, 1955), pp. 433-437.

<sup>4</sup> *Categories*, I, 1a1-13.

<sup>5</sup> *On Interpretation*, 13, 22b38-23a1. See also *Metaphysics*, IX, 2, 5.

<sup>6</sup> *Prior Analytics*, I, 1, 24a15, 24b19.

<sup>7</sup> *Posterior Analytics*, I, 6, 74b27-28. See also II, 19, 100a1-3.

<sup>8</sup> *Physics*, II, 1, 193a31ff.

<sup>9</sup> *On Generation and Destruction*, II, 6, 333b9-16. See also Aristotle’s example of fire as *not* having a *logos* of growth in *On the Soul*, II, 4, 416a16-18.

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<sup>10</sup> *On the Soul*, II, 12, 424a25.

<sup>11</sup> *On the Soul*, III, 2, 426a8. See also 426a28ff.

<sup>12</sup> *On the Soul*, III, 11, 434a17-22. See also *Movement of Animals*, 7.

<sup>13</sup> *Nicomachean Ethics*, I, 13, 1102a29-1102b34.

<sup>14</sup> *Politics*, I, 1, 1253a10-11; VII, 12, 1332b5-6.

<sup>15</sup> *Politics*, VII, 12, 1332a38-1332b11; 13, 1334b7-28.

<sup>16</sup> *Politics*, I, 1, 1253a18.

<sup>17</sup> *Categories*, I, 1a1ff.

<sup>18</sup> *Topics*, II, 2, 110a22ff; *On Sophistical Refutations*, IV-VI *et passim*. See also *Rhetoric*, II, 24, 1401a10ff.

<sup>19</sup> *On Interpretation*, 4, 16b26-28. See also *Poetics*, 20, 1457a23-24.

<sup>20</sup> *On Interpretation*, IV, 16b26ff. For our elaboration of this topic, see the last section of Chapter VI.

<sup>21</sup> For the question of the multivocality of *logos* in Greek philosophy taken generally, see, for instance, W. K. C. Guthrie, *A History of Greek Philosophy*, vol. 1 (Cambridge: Cambridge University Press, 1962), p. 38.

In the introduction to his translation of the *Parts of Animals*, A. L. Peck notes the variety of the meanings of *logos* within one and the same work (640a32, 646b2, 678a35, 695b19, 639b15...), and considers them to be “correlated” without showing what this correlation is: “... here is a term of very varied meanings, a term which brings into mind a number of *correlated* conceptions, of which one or another may be uppermost in a particular case...” (Aristotle, *Parts of Animals*, tr. A. L. Peck (Cambridge: Harvard University Press, 1937), p. 26ff., emphasis ours.)

<sup>22</sup> Of course, a Google search for *logos* is practically impossible, because the word *logos* is homonymous – which is something search engines have a hard time detecting. But one can presume that if such a search could be disambiguated, it would yield millions of results. Just as the search for *logos* gives us too much, the search for the word “Aristotle” gives us too little, since it will leave out the results for “Aristoteles”, “Aristote”, “Aristo”, “Aristotele”, etc. All this to reemphasize that our illustration here is extremely superficial, which, we hope, does not prevent it from being preliminarily informative.

<sup>23</sup> Some of the important results are as follows: Friederike Rese’s “Praxis and Logos in Aristotle: On the Meaning of Reason and Speech for Human Life and Action”, in *Epoché*, vol. 9, #2, Spring 2005 (a paper I had the chance to listen at the Ancient Philosophy Society Meeting at Penn State in 2004); Russel Winslow’s “On the Nature of *Logos* in Aristotle”, a paper presented again at the next APS meeting in Fordham in October 2004; a paper by Irina Deretić from the University of Belgrade. Further we should note Martin Heidegger’s extensive work on *logos* in *Sein und Zeit* (Tübingen: Max Niemeyer, eleventh edition, 1967) and in the preparatory lectures, as well as Rémi Brague’s insightful analyses in *Introduction au monde grec*, (Paris: Éditions de La Transparence, 2005) pp. 69-82, and in *Aristote et la question du monde*, (Paris: PUF, 1988). See also Jean Brun, *Aristote et le lycée* (Paris: PUF, 1961), pp. 22-27. Apart from these, we should point out two extremely short “notes” that concentrate directly on our problem: R. D. Hicks, “On Doubtful Meanings of *logos* in Aristotle”, in *Proceedings of the Cambridge Philosophical Society*, 100-102, 1915, p. 1-2; J. L. Stocks, “On the Aristotelian use of *logos*”, in *The Classical Quarterly*, 18, 1914, p. 9-12.

Most surprising for us was Barbara Cassin’s article “Enquête sur le *logos* dans le *De Anima*”, in *Sur le De Anima d’Aristote*, ed. Cristina Viano (Paris: VRIN, 1996), pp. 257-293. There she embarks on exactly our project, but indeed limits herself to various uses of *logos* in *On the Soul*. Her conclusion is that, among the various meanings of *logos* in *On the Soul*, mathematical proportion and articulate speech are incompatible. Our work, especially our chapters IV and VI, attempt to show that not only these two senses of *logos*, but all of them in Aristotle refer directly or indirectly back to one focal meaning.

<sup>24</sup> There is an exception in his posterity to this negligence of *logos*: Porphyry’s mention of the multivocality of *logos* in his commentary of the *Categories*, which not only excludes the sense of “ratio” but also does not step into the task of accounting for this multivocality (Porphyry, *On Aristotle’s Categories*, 64,28, tr. Steven K. Strange (Ithaca: Cornell University Press, 1992), pp. 44-45), and also his remarks in *Commentary on the Harmonics of Ptolemy* which, although very interesting,

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unfortunately are not concerned with Aristotle's uses of *logos*. (*Commentary on the Harmonics of Ptolemy*, 12, 6-28)

<sup>25</sup> Aristotle explicitly deals with his own assumption not in the *Categories*, but in *Sophistical Refutations*, I, 165a6ff.

<sup>26</sup> See especially A. L. Peck's introduction in Aristotle, *History of Animals*, (Cambridge: Harcard University Press), pp. x, xi.

<sup>27</sup> For the influence of the Platonic dialogical form on Aristotle, see Werner Jaeger, *Aristotle: Fundamentals of the History of His Development*, tr. Richard Robinson (Oxford: Clarendon, 1950), p. 24ff.

<sup>28</sup> *Nicomachean Ethics*, X, 9, 1181b16ff.

<sup>29</sup> *Nicomachean Ethics*, I, 13, 1102b29-1103a4.

<sup>30</sup> *Topics*, I, 1, 100a25-27; *Prior Analytics*, I, 1, 24b19-21.

<sup>31</sup> *Topics*, I, 1, 100a30-b21.

<sup>32</sup> *Posterior Analytics*, II, 19, 100b2-4.

<sup>33</sup> *Topics*, I, 12, 105a13-17; *Posterior Analytics*, II, 19, 100a15-100b4.

<sup>34</sup> This is taken to be an echo of, if not a clear reference to, Plato's *Parmenides*.

<sup>35</sup> *Topics*, I, 2, 101a35-101b4. For the investigatory nature of dialectic, see *Sophistical Refutations*, XI, 172a18, where Aristotle uses the term *erôtêtikê* instead *exetastikê*.

<sup>36</sup> *Posterior Analytics*, I, 1, 71a1-11.

<sup>37</sup> *Topics*, I, 2, 101a35-101b4.

<sup>38</sup> *Physics*, I, 1, 184a16-22.

<sup>39</sup> *On the Soul*, II, 2, 413a11-13.

<sup>40</sup> *Metaphysics*, I, 1; II, 1; VII, 3, 1029b3-12.

<sup>41</sup> *History of Animals*, I, 6, 491a7-14.

<sup>42</sup> *Nicomachean Ethics*, I, 4, 1095a31-1095b2. See also Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), pp. 27-29.

<sup>43</sup> *Nicomachean Ethics*, I, 4, 1095b2-4. See also *Eudemian Ethics*, II, 1, 1220a15-22. See also Ross, David, *Aristotle* (London: Methuen & Co.: 1949), p. 38.

<sup>44</sup> An indication that Aristotle is not simply transposing Ancient Greek "categories" onto beings as such is the fact that he often complains, for instance in the *Ethics*, that a certain concept for an excess or mean disposition has no name in Ancient Greek. (See for instance, *Nicomachean Ethics*, II, 7, 1107b31.) We shall see a clear example of this in Chapter VI as regards different kinds of "hearing" that are not distinguished in language.

For the discussion around Aristotle's imposition of Ancient Greek linguistic "categories" onto "categories of thought", see Émile Benveniste, "Catégories de langue et catégories de pensée", *Problèmes de linguistique générale* (Paris: Gallimard, 1966), pp. 64-70. For some important replies to Benveniste, see Jacques Vuillemin, "Le système des catégories", *De la logique à la théologie. Cinq études sur Aristote* (Paris: Flammarion, 1967), pp. 76-77; Gilles-Gaston Granger, *La doctrine aristotélicienne de la science* (Paris: Aubier Montaigne, 1976), p. 60.

<sup>45</sup> For an exemplary dialectical approach, see *Metaphysics*, I, 3-10.

<sup>46</sup> See Ross' introduction in Aristotle, *Metaphysics*, 2 vol., (Oxford: Clarendon, 1924) p. lxxvii. See also David Ross, *Aristotle* (London: Methuen & Co.: 1949), p. 48; Enrico Berti, "Les méthodes d'argumentation et de démonstration dans la *Physique*", in *La Physique d'Aristote* (Paris: VRIN, 1991), pp. 59; Saffet Babür, "Aristoteles'te *episteme*", *Yeditepe'de Felsefe*, #7 (İstanbul: Yeditepe Üniversitesi Yayınları, 2002), pp. 7-20. Jonathan Barnes also uses this distinction to draw a similar conclusion. Jonathan Barnes, "Aristotle's Theory of Demonstration", in *Phronesis*, 14, 1969, quoted in Pierre Pellegrin's introduction to *Parties des animaux*, tr. J.-M. Le Blond (Paris: Flammarion, 1945), p. 21.

<sup>47</sup> G. S. Kirk, J. E. Raven, M. Schofield, *The Presocratic Philosophers* (Cambridge: Cambridge University Press, 1983), pp. 78-79.

<sup>48</sup> *Posterior Analytics*, I, 30, 87b20-21; *Prior Analytics*, I, 13.

<sup>49</sup> In our exposition of the status of *epi to polu* principles and arguments that hold "for the most part" in Aristotle, we are largely using the following paper: Nicholas Denver, "Can Physics Be

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Exact?”, *La Physique d’Aristote et les conditions d’une science de la nature*, (Paris: VRIN, 1991) pp. 73-83. See also Ross, David, *Aristotle* (London: Methuen & Co.: 1949), p. 31.

<sup>50</sup> *Physics*, II, 8, 199b18ff.

<sup>51</sup> Our example is partially inspired by Carlo Natali’s seminar entitled “Le premier traité d’éthique – La structure et les desseins de l’*Ethique à Nicomaque*” that took place at the University of Paris I in February-March 2006. See also Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), especially p. 28.

<sup>52</sup> *Nicomachean Ethics*, I, 4, 1095a14-21.

<sup>53</sup> “Especially in the *Ethics*, Aristotle tends to use terms *critically*, not simply as standing for established notions...” (Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 12.)

<sup>54</sup> Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 25.

<sup>55</sup> *Nicomachean Ethics*, I, 7, 1098a3-5, 17-19.

<sup>56</sup> That Aristotle takes his definition of human happiness as a “principle” can be seen from 1098b2-12.

<sup>57</sup> *Nicomachean Ethics*, I, 7, 1098a21-1098b8.

<sup>58</sup> Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), pp. 23-25.

<sup>59</sup> We are happy to see our views concerning Aristotle’s method confirmed by Pierre Aubenque, especially in the context of the *Nicomachean Ethics*. (Aubenque, Pierre, *La prudence chez Aristote*, (Paris: PUF, 1963), pp. 37-41.)

<sup>60</sup> *Posterior Analytics*, I, 30, 87b19-21.

<sup>61</sup> Plato, *Theaetetus*, 189e. See also *Sophist*, 263e, and *Philebus*, 38c-e. According to Pierre Aubenque, these may be the passages Aristotle alludes to in *Topics*, VIII, 14, 163a36-163b3: “If we have nobody else, we must [argue for and against] with ourselves.” (Pierre Aubenque, *Le problème de l’être chez Aristote* (Paris: PUF, 2002), p. 256n3). See also *On the Heavens*, II, 13, 294b8.

<sup>62</sup> Plato, *Phaedrus*, 230d.

<sup>63</sup> For explicit Aristotelian criticisms of Socrates’ turn away from nature, see *Metaphysics*, I, 9, 992a24-28, 992b8-9.

<sup>64</sup> Plato, *Phaedo*, 99d-e.

<sup>65</sup> On this dialectical and elenctic character of Aristotelian method see Ross’ introduction to Aristotle, *Metaphysics* (Oxford: Clarendon, 1924), p. xxxv. See also Pierre-Marie Morel, *Aristote* (Paris: Flammarion, 2003), p. 82; Enrico Berti, “Les méthodes d’argumentation et de démonstration dans la *Physique*”, in *La Physique d’Aristote* (Paris: VRIN, 1991), p. 59. For the extent and depth of Socrates’ influence on Aristotle see also Werner Jaeger, *Aristotle: Fundamentals of the History of His Development*, tr. Richard Robinson (Oxford: Clarendon, 1950), pp. 21-22 and 47ff.

<sup>66</sup> “It appears that [our predecessors] talk about some principles and causes; thus, if we go over [their accounts], it will be serviceable to our present pursuit [*methodos*]: for, either we shall find some other kind of cause, or we shall believe more in what is said now.” (*Metaphysics*, I, 3, 983b3-7.)

<sup>67</sup> *Topics*, I, 12, 105a13-19.

<sup>68</sup> *Politics*, I, 1, 1253a9-10.

<sup>69</sup> See for instance, Jacques Brunschwig, “Qu’est-ce que ‘La Physique’ d’Aristote?”, in *La Physique d’Aristote et les Conditions d’une Science de la Nature*, (Paris: Vrin, 1991), pp. 11-40.

<sup>70</sup> *Categories*, I, 1a1-12.

<sup>71</sup> For instance, for *logos as nutk* see Averroès, *Commentaire moyen sur le De Interpretatione*, tr. S. Diebler (Paris: VRIN, 2000), pp. 141, 179. Or for *logos as aql*, see Averroès, *L’Islam et la raison*, tr. Marc Geoffroy (Paris: Flammarion, 2000), p. 109.

<sup>72</sup> David Ross, *Aristotle* (London: Methuen & Co.: 1949), p. 18.

<sup>73</sup> Werner Jaeger, *Aristotle: Fundamentals of the History of His Development*, tr. Richard Robinson (Oxford: Clarendon, 1950).

<sup>74</sup> Annick Jaulin, *Aristote – La métaphysique*, (Paris: PUF, 1999), pp.8-11. Similar remarks concerning Jaeger’s genetic interpretation of the diverse uses of *phronêsis* in Aristotle can be found in Pierre Aubenque, *La prudence chez Aristote*, (Paris: PUF, 2004), pp. 15-31.

<sup>75</sup> Plato, *Republic*, 533d7-534a8.

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<sup>76</sup> Plato, *Republic*, 534b3-4; for “*logos tou einai*” see also Plato, *Sophist*, 78d1ff.

<sup>77</sup> *Topics*, I, 2, 101b1-4.

<sup>78</sup> We are returning to this metaphor not simply to parody Socrates, but because once again Aristotle perpetuates and develops Socrates with the claim that, by being necessarily committed in particular and unforeseeable circumstances, virtuous acts (probably including “virtuous” readings of Aristotle) are comparable “to the medical art or the art of steering a ship”. (*Nicomachean Ethics*, II, 2, 1104a8-11)

<sup>79</sup> To divide the Aristotelian corpus into three parts: logic, physics and ethics, while being traditional, is a traditional procedure which itself is not although foreign to Aristotle. See *Topics*, I, 14, 105b19ff.

<sup>80</sup> *Categories*, 1, 1a2ff.

<sup>81</sup> *On Interpretation*, 9, 13.

<sup>82</sup> *On Interpretation*, 13, 23a1.

<sup>83</sup> *Physics*, II, 1, 193a30-31.

<sup>84</sup> *Physics*, II, 1, 192b8-16.

<sup>85</sup> *On the Soul*, II, 4, 416a10-18. See also *On Breath*, 9, 485b18.

<sup>86</sup> *On the Soul*, III, 2, 426b7-8; II, 12, 424a25-28.

<sup>87</sup> *Movement of Animals*, 7, 701a32-33; *On the Soul*, III, 11, 434a17-22. It is indeed true that both animals and elements are capable of locomotion. What distinguishes the two is precisely *logos*: if displaced elements have a “desire” for locomotion, whereas animals *hold that desire together with particular sensations* as a result of which they move.

<sup>88</sup> *Nicomachean Ethics*, II, 5.

<sup>89</sup> *Nicomachean Ethics*, VI.

<sup>90</sup> *Nicomachean Ethics*, I, 13, 1102b33-1103a3. Also *Rhetoric*, II, 6, 1384a23-25; *Eudemian Ethics*, II, 1, 1219b27-1220a11. See also *Nicomachean Ethics*, VI, 2: “Thus choice is either thought infused with desire or desire infused with thinking through, and such a source is the human being.”

<sup>91</sup> *Politics*, I, 1, 1253a8-18; VII, 12, 1332b5-6; *Nicomachean Ethics*, IX, 9, 1169b20-21; *Eudemian Ethics*, II, 8, 1224b30. But see also *Nicomachean Ethics*, VIII, 12, 1162a15-25.

<sup>92</sup> *Nicomachean Ethics*, IX, 4, especially 1166a32-1166b2: “a friend is another self... it would seem that there could such a love [friendship toward oneself] insofar as each person is two or more, and because the *hyperbolê* of friendship resembles friendship toward oneself.”

<sup>93</sup> Heraclitus, DK22B51.

<sup>94</sup> *Nicomachean Ethics*, VI, 7, 1141a33-1141b2.

<sup>95</sup> *Politics*, I, 1, 1253a31-33.

## I. BEING.

### *LOGOS IN THE CATEGORIES.*

“Of the *logos* of being, humans are always uncomprehending... they forget what they do when awake as they forget [what they do] in sleep.”

Heraclitus.<sup>1</sup>

What does *logos* mean in the *Categories*?

In this first chapter, we investigate the meaning of the expression “*logos* of being” at the very opening of the traditional Aristotelian corpus. Since this expression distinguishes synonymy from homonymy, here we (A.) first clarify “homonymy”, then (B.) “synonymy”, and finally (C.) conclude, by the comparison of the two, that *logos* in the *Categories* means “standard”. But, as we shall show in our discussion with the Cartesian concept of “substance”, the inherence of this standard is justified not in the *Categories*, but the question of “*logos* of being” extends into *On Interpretation*, the focal text of our next chapter.



## A. HOMONYMY.

Words are conventional signs for things.<sup>2</sup> They at once designate things, but are also unmotivated by them: The Atlantic Ocean *has* a name only in a weak sense of *having*. Naming the “Atlantic Ocean” is like understanding Alexander the Great as living in the fourth century *before Christ*. At this level, language seems to be the realm of an inadequacy or distortion, but from this inadequacy follows an unlimited indifference and freedom: the freedom of naming things, calling them as we wish, and articulating those words, forming higher units even more loosely related to things themselves. This freedom is indeed at the level of language or thought, indeed it doesn't *touch* the world – and that is precisely its virtue –, but this freedom, this infinite malleability of language makes it possible to consider the world as wide open to *our* interpretation, *our* projects, *our* retrospective distortions, *our* capricious manipulations and arrangements. Hence the acquisition of language is the acquisition of an immense power which may well provoke the fantasy of a world presented *to* us instead of standing *outside, around* and often *against* us: the fantasy of an undetermined, but infinitely determinable world.

And yet, for the most part we do not live in a world that appears to be waiting *for us* all along, preparing treasures or traps *for us*, we also live in a world *we* await and adapt to. How, if at all, does the world divert the unlimited magical power of our determinations? How, if at all, can language and speakers *adhere* to the very beings that are fantastically, but fundamentally, divorced from words? What, if any, are the

powers of the world for dissuading us from the significations we give to it? These are the questions at stake in this chapter.

### 1. Aspect.

What does *logos* mean in the *Categories*?

Since we are investigating the functions of *logos* in Aristotle's philosophy, it may be reasonable to begin our investigation with one of Aristotle's logical works, the *Categories*, insofar as logic already seems to promise us at least something relating to *logos*. On the rudimentary level of word count, however, *logos* is not a frequent word in the *Categories*. Although a very common word in the Aristotelian corpus as well as in Ancient Greek, it appears 46 times in the *Categories* as a whole. Even when *logos* does occur in the text, Aristotle mostly employs in its commonsensical meaning of "something said"<sup>3</sup> or of "assertion".<sup>4</sup> At first then *logos* does not seem to be a theme or explicit focus in the *Categories*.<sup>5</sup>

Apart from a clearly philosophical and yet cursory remark concerning the priority of things themselves to *logos*<sup>6</sup> which is developed only in other texts<sup>7</sup>, there is one use of *logos* in the *Categories* that does seem to be not only philosophically loaded, but also extensively employed in the text. This usage of *logos* appears in the very first sentence of the *Categories* within the phrase "*logos* of being" and then reappears in the emphatic use of the verb *legein* in the following four chapters: "Those whose names<sup>8</sup> only are common, but whose *logos* of being according to this name is different, are called homonyms..."<sup>9</sup> The following sentences show that

“*logos* of being” is that which synonyms share as distinct from homonyms which are mere namesakes. Since no straightforward account of *logos* is offered in the text, we may use this expression, “*logos tês ousias*”, the differentia between synonymy and homonymy, as a clue to the philosophical meaning of *logos* in the *Categories*.

What is the function of *logos* at this opening of the *Categories* – the threshold of the traditional Aristotelian corpus?<sup>10</sup>

“Those whose names only are common, but whose *logos* of being according to this name is different, are called homonyms, such as ‘animal’ for both the human being and the representation<sup>11</sup>; for if one supplies what is it for each of them to be animal, one will supply a particular [*idios*] *logos* for each. Those whose names are common and whose *logos* of being according to this name are also common are called synonyms, such as ‘animal’ for both the human being and the ox; for each of these are addressed [*prosagoreuetai*] with the common name ‘animal’ and their *logos* of being is the same. For if one supplies the *logos* of what it is for each to be animal, one will supply the same *logos*.”<sup>12</sup>

A human being and a representation of a human being share the name “animal” and to this extent they are homonyms. In Aristotle’s work, homonymy designates the relation between a representation and a thing represented<sup>13</sup>, as we see here, but also between *leukon* as a color (“white”) and *leukon* as a sound (“clear”)<sup>14</sup>, between a particular circle and “circle said simply”<sup>15</sup>, between a hand of a living

being and a wooden hand or the hand of a corpse<sup>16</sup>, between a part and a whole<sup>17</sup>, and even between a species and its genus...<sup>18</sup> Despite this wide range of relations, two random namesakes such as a latch (a collarbone) and a latch (a kind of lock) are no less homonyms.<sup>19</sup> Further, given that the relation between beings and names or words is not “natural” for Aristotle<sup>20</sup>, any two beings could be called by the same name and thus made homonyms: I may call my cat “Tom”. Moreover, Aristotle’s account of homonymy suggests that homonyms need not share a name uttered, but simply a way of being addressed, regarded, greeted, accosted or appealed to. Finally, Aristotle’s examples show that homonymy does not even imply several beings since even one being can be addressed homonymously as long as it is addressed with regard to something that is not what it is *for it* to be, as long as its *logos* of being is disregarded.<sup>21</sup> If language is conventional, we may designate two things with any word, and *a fortiori* we may designate anything any way we want.

What then is there in a being that is apart from its *logos* of being such that it can be thus addressed homonymously? We encounter a conceptualization and an example of this in the Chapter 2. We shall quote extensively for later reference:

“Of beings some are said of some underlying thing but are not in an underlying thing, for instance human being is said of some underlying human being, but is in no underlying thing. Then some are in an underlying thing but are not said of an underlying thing (by ‘in an underlying thing’ I am not saying that which is present in something as a part, but that for which it is impossible to be apart from that in which it is), for instance a grammar is in an

underlying soul, but is not said of any underlying thing, or the ‘a certain whiteness’ is in an underlying body (for all color is in a body), but is not said of any underlying body. Then some are both said of an underlying thing and in an underlying thing, for instance knowledge is in the underlying soul and is said of the underlying grammar. Then some are neither in an underlying thing nor said of an underlying thing, for instance this human being or this horse.”<sup>22</sup>

Aristotle’s fourfold distinction in this second chapter of the *Categories* is made along two criteria: (1) being in or not being in an underlying thing, and (2) being said of or not being said of an underlying thing. “Being in an underlying thing” (*en hypokeimenou einai*) here is used very broadly in the sense that grammar *is in* a soul and all whiteness *is in* a body and not in the sense that a man *is in* a house or my wallet *is in* my pocket. On the other hand, the second criterion of Aristotle’s fourfold distinction here, “being said of some underlying thing” (*kath’ hypokeimenou tinos legesthai*) is used very narrowly in the sense that animal *is said of* a human being and knowledge *is said of* grammar, but whiteness *is not said of* a table.<sup>23</sup> In order to address a being homonymously, in order to address it while disregarding its *logos* of being, one then may address it merely with respect to that which *is in* it – not, Aristotle emphasizes, as that which is present in something as a part, but as that which cannot be apart from that *in* which it *is*. Thus, to consider a paperweight as “a certain hardness” or an ox as “meat” or as “power” is to address them homonymously since hardness *is in* the paperweight as meat and power *are in* the ox. Similarly, a book may be used as a fan, a bottle as a weapon, a key as a saw, or perhaps most

simply as some thing right here (*tode ti*). One can see that the easiest and safest way to avoid addressing a being in its *logos* of being is to address it in the most immediate way possible, as “just this right now”. For this homonymous appearance, for this appearance of that which *is in* an underlying being and yet is not considered in its *logos* of being, we shall provisionally use the term “aspect”.

## 2. A kind of somnolence.

As one can see, the wide range of homonymy is irreducible to a lexicological class of namesakes, but, as we shall see better, implies a certain experiential stance as well as a corresponding understanding of the relation between aspects and, most importantly, an understanding of being. To get a more firm hold on homonymy, let us first elaborate it in its experiential form.

The homonymous way of viewing things as aspects, however abstract, is not foreign to everyday experience. Waiting for a bus, one is not really thinking of the bus; preparing coffee, one is thinking neither of coffee nor of the preparation of coffee. In both cases, one is rather thinking of “all sorts of things”. If interrupted and interrogated about what was on one’s mind, one may say: “I was just thinking... A yellow blur, a rattling, then something said yesterday, then something a little bit far away, and then something high and ashy somewhere... Nothing really...” The content of thought here is a sequence of free-floating aspects, comparable to daydreaming. A similar loose texture shows itself in casual conversations where people are “just talking”, where they talk about “this and that”, “nothing really”. And indeed

the world is such that it can be treated in this way: to the daydreamer waiting for a bus, it offers at all times a rattling, things said yesterday, then something a little bit far away, etc.; to people chatting, it always supplies a “just this now” and then a “just that”... In everyday life, experience often takes the form of a sequence of aspects that do not add up to anything – aspects of “nothing really”.

To be exact, however, we must acknowledge that there is something fundamentally inexact about these *enumerations* of aspects. First of all, they are made after the fact, from our sober analytical viewpoint. Hence, once enumerated, each aspect comes to mean more than it in fact did, since at first it did not mean “anything really”: “It’s just something said yesterday... it’s just a yellow blur... it’s just the sound of the name...” These formulations and enumerations fail to reflect the way in which these aspects precisely do not count, the way in which their flow adds up to “nothing really”. With this reservation, we may call this experiential form of discreet homonymous aspects “somnia”.

### 3. An exclusive version of the principle of non-contradiction.

However essentially inadequate our analytical sober perspective may be when it comes to thematizing this somnia, we may say in retrospect that these free-floating aspects are fundamentally isolated from one another. Each aspect is just what it is, no more or less. It either is or is not. Aspects do not imply one another; they are so isolated that they cannot explicitly oppose or reject another either. If there is anything regulating these disparate aspects, it is a broad version of the “principle of

non-contradiction”<sup>24</sup>: the same cannot be and fail to be. This impoverished version of the principle can be roughly formulated as a negated conjunction:  $\sim (p \ \& \ \sim p)$ , or as its equivalent unnegated disjunction:  $p \vee \sim p$ . Since this version of the principle of non-contradiction excludes an aspect from anything other than itself, it may be called the “exclusive version of the PNC”.

It is indeed Aristotle himself who first formulated the PNC in this exclusive form in the fourth book of the *Metaphysics*, as “most certain” and “most familiar”<sup>25</sup> and opposed it to what Heraclitus supposedly says: “it is impossible for anyone to suppose the same to be and not be, as some think Heraclitus says.”<sup>26</sup> The temporal qualification implicit in this version is made explicit later in the same chapter: “it is clear that it is impossible for the same to be and not be the same at the same time.”<sup>27</sup> Thus, as each aspect is present to the exclusion of all others, the only relation between aspects is a formal one: pure succession.

#### 4. “Underlying thing”.

In our attempt to understand the function of *logos* in the *Categories* as the differentia between synonymy and homonymy, we have now seen that homonymy is a way of addressing beings in aspects, that the experiential form of this familiar stance toward things is a kind of somnolence, and that the relationship between aspects is the pure succession of mutually exclusive moments. This temporal qualification of the exclusive PNC may bring to mind the following question: Is there any constant underlying being in which these homonymous aspects come to be and



pass away in pure succession? If so, what is it? Is it not an aspect itself? What is this being that keeps receiving aspects *at different times* and never at the same time?

According to Chapter 5 of the *Categories*, there is indeed something which is “most characteristically” determined by admitting contraries. It is called *ousia*, which we shall translate as “being”: “Most characteristic of being seems to be that, being the same and numerically one, it admits contraries, in such a way that one cannot show anything else which is not a being that, while numerically one, admits contraries.”<sup>28</sup> Admitting contraries then is not only what is most characteristic of being, but also what is unique to it.<sup>29</sup> For instance, color, which is not a being in this sense, “will not be white and black while being the same and being one in number”.<sup>30</sup> The implication is that a being is somehow capable of being now white and then not white while remaining the same thing. A being cannot be and fail to be at the same time any more than an aspect can, and a being cannot present this aspect and another aspect at the same time either; but unlike anything else a being can present this aspect at one time and that aspect at another, without itself ceasing to be.<sup>31</sup> The conception of being as the underlying thing detached from its aspects is the understanding of being implied by the somnolent flow of homonymous aspects.

## 5. An example.

What is this underlying thing which admits and subtends different qualities that *are in* it at different times? One may think: that which remains constant after the

abstraction of aspects. If it was true that aspects were abstractions, then being turns out to be the abstraction of an abstraction.

Descartes' famous wax example may be of some assistance in clarifying this conception of being.<sup>32</sup> As it is well known, the Second Meditation engages in such a systematic abstraction of sensuous aspects in order to prove that the underlying thing is perceived by the mind alone and that the mind is therefore better known than the body.

“Let us take, as an example of the thing [*exempli causa*], this piece of wax. It has been taken recently from the honeycomb; it has not yet lost all the honey flavor. It retains some of the scent of the flowers from which it was collected. Its color, shape, and size are manifest. It is hard and cold; it is easy to touch. If you rap on it with your knuckle, it will emit a sound. In short, everything *is present in* it that appears needed to enable a body to be known as distinctly as possible.”

Let us start by noting that Descartes' emphasis in this last sentence that characteristics of all five senses “are present in” the piece of wax (*adsunt* in Latin) literally translates the way Aristotle says that color “is in” (*en esti* in Ancient Greek) an underlying being. If Descartes is correct in saying that the mind is better known than the body, he must be able to show that the sensuous characteristics that are in the piece of wax are somehow less known than the mind. In order to demonstrate this, Descartes burns the piece of wax and observes that the aspect of hardness, whiteness

or coldness that was in it before, is in it no longer, and is replaced by softness, darkness and heat. As one can easily see, this is an empirical confirmation of the exclusive version of the PNC: contraries cannot coexist.

The crucial question is whether anything remains throughout the experiment: “Does the wax still remain? I must confess that it does; no one denies it; no one thinks otherwise.” Descartes thus infers that there is something unchanged although all sensuous characteristics have changed. He then asks: “So what was there in the wax that was so distinctly grasped?” The answer is: something extended, flexible, and mutable. As Descartes emphasizes, the underlying thing is neither the flexed nor the unflexed, but the *flexible*; it is neither the mutated nor the unmutated, but the *mutable*. It is not even simply extended: “What is it to be extended? Is this thing’s extension also unknown? For it becomes greater in wax that beginning to melt, greater in boiling wax, and greater still as the heat is increased.” Properly speaking, then, that which underlies the change of aspects is a thing minimally extended and further extendable or retractable, flexible and mutable. As it is precisely not determined by any magnitude or shape, the underlying thing can neither be seen, nor heard nor smelled; nor can it be an object of imagination, since one can imagine only a finite number of flexions and mutations whereas the underlying thing is infinitely flexible, mutable and extendable. Thus, Descartes claims, the only possibility is that the underlying thing is inspected by the mind alone, free from both sensation and imagination. The underlying thing *can* be anything, but by itself it is pure indeterminacy, an *x*, a “just this”. Further, being purely extendable, flexible and mutable, it reflects that which may change it; being purely indeterminate, it simply

reflects the mind's power of determination, the power of judgment: this... *is such and such*. It even reflects the power of judgment regardless of the truth and falsity of the judgment: as the object of a true or false judgment, the "just this" attests the very existence of the mental act of judgment. Descartes concludes that the mind is clearly and distinctly known to itself as giving a judgment regardless of the content and correctness of this judgment. To return to our initial question, then: What is this underlying thing admitting and subsisting different qualities that *are in* it at different times? Descartes' answer is the following: something infinitely indeterminate.

In our task of understanding the *logos* of being as the differentia between homonymy and synonymy, here we come to the end of our brief elaboration of homonymy: homonymy is a way of addressing beings in mere aspects; its experiential form is a kind of somnolence where the relationship between aspects is nothing more than the pure succession, which corresponds to an exclusive version of the PNC; and finally, the understanding of being implied in this stance is that of a purely indeterminate substratum – Cartesian *substantia*.

## B. SYNONYMY.

Seen from a somnolent viewpoint, “being” in Aristotle is not different from Cartesian *substantia*. This can be seen from Aristotle’s discussion with his predecessors about the number of the “sources” in the first beginning of the *Physics*. There Aristotle starts by asserting that the source is either one or many<sup>33</sup>: he takes up the Parmenidian hypothesis that the source is one<sup>34</sup>, criticizes it for implying the impossibility of motion, change and nature as such<sup>35</sup>; gradually picking from this hypothesis the term “underlying thing” (*hypokeimenon*)<sup>36</sup>, Aristotle then takes up the hypothesis of the “Physicists”<sup>37</sup> according to which the sources are many and specifies it by claiming that in one way or another all take contraries to be sources.<sup>38</sup> In a word, Aristotle there takes both the term “underlying thing” and the contraries from both sides of the argument concerning the number of sources. What does Aristotle do with this underlying thing and the contraries? He simply puts the underlying thing beneath the transition of one contrary to another.<sup>39</sup> Aristotle even calls this underlying thing an “underlying nature” (*hypokeimenê physis*) and his examples are akin to Descartes’ wax example:

“The underlying nature is knowable through analogy: as bronze is in relation to a statue, or as wood is in relation to a bed, or as the formless is before taking on its form in relation to any of the other things that have form, so is this [underlying nature] in relation to a being [*ousia*] or to the this [*to tode ti*] or to a being [*to on*].”<sup>40</sup>

Thus, Aristotle is clearly not at odds with the idea that transient sensuous aspects inhere in something constant that is indifferent and irreducible to them. Aristotle is arguably the one who introduced the term *hypokeimenon* as a philosophical term, perhaps taking it from its momentary but highly suggestive occurrences in Plato's dialogues.<sup>41</sup> Even if it is clearly true that Aristotle does not connect this constant being with the "subjectivity" of the thinker as Descartes does, both the idea and the Latin word *subiectum* are derived from *hypokeimenon*.

This being said, the concept of being implied in homonymy is Descartes' conclusion, not Aristotle's. To be the underlying being in which aspects inhere is only half of the account of "being" in Aristotle and we must return to the first chapter of the *Categories* in order to see what is left out, namely, the *logos* of being.

### 1. *Logos* of being.

Aristotle defines, exemplifies and explains synonyms as follows:

"Those whose names are common and whose *logos* of being according to this name are also common are called synonyms, such as 'animal' for both the human being and the ox; for each of these are addressed with the common name 'animal' and their *logos* of being is the same. For if one supplies the *logos* of what it is for each to be animal, one will supply the same *logos*."<sup>42</sup>

As the counterpart of homonymy which was a commonality of name between beings in abstraction from their *logos* of being, synonymy is a commonality of names in relation to their *logos* of being.<sup>43</sup> Aristotle explains the expression *logos* of being solely as “what it is for each to be.”<sup>44</sup> He does not elaborate *logos* of being, but rather seems to be content with a rough understanding of it insofar as it allows him to distinguish homonyms and synonyms. What then is the purpose of this distinction, especially given that it is not logically exhaustive?<sup>45</sup> The text does not suggest that it is simply a terminological distinction made in order to avoid confusion later on, but that it is introduced as a matter for thought in its own right. Since it is made with respect to how beings<sup>46</sup> *are addressed*, this distinction, however “ontological”, is not simply objective; neither is it simply subjective, “mental” or “linguistic”, since the differentia of homonymous and synonymous designations explicitly refers to what it is to be *for the being itself*. To say the least, the distinction between homonymy and synonymy highlights that beings are not simply addressed as different beings, but also in different ways, depending on whether or not the addressing appeals to the *logos* of being. The distinction between homonymy and synonymy is one between commonality of name as such and commonality of both name and *logos*.<sup>47</sup>

Although Aristotle does not clarify the meaning of *logos* here, he does give us an example: a human being and an ox addressed as “animal” have the same *logos* of being with respect to this name, because “if one supplies the *logos* of what it is for each to be animal, one will supply the same *logos*.”<sup>48</sup> Just as homonyms, synonyms too at first come in pairs: a human being and an ox, as “animal”, are synonymous, because what it is for them to be animal is the same. The commonality between an ox

and a human being is *their* commonality, since *they* nourish themselves, *they* perceive, *they* move, *they* desire. Thus a being can be addressed synonymously on its own as well: if one can address an ox and a human being not as “white” or “powerful”, but as “animal”, one already has in view the *logos* of being of each, and can address them one by one on their own.

The unlimited possibilities of homonymous designations are here suddenly limited by a condition not emerging from language or thought, but from the thing at hand: what it is *for it* to be. Similarly, the power of naming the aspects that *are in* an underlying being is decentered by that which *is said of* it. According to Aristotle’s examples, the difference between homonymy and synonymy is the difference between the way a representation of a human being is an “animal” and the way a human being is an “animal”. Thus, being is not only that *in* which all others are, but also that *of* which they *are said*: “All others are either *said of* these underlying beings or *are in* them.”<sup>49</sup>

The implication is that the world is not simply made out of underlying beings and whatever is *in* or *on* it, that being is not simply an underlying thing in which determinations come and go. The world is neither some stuff, an indifferent material, nor a material *and* external determinations. Being, in turn, is no more a purely indeterminate being than it is a mere aspect. Being has an inherent determination that is irreducible to an aspect, and being does not survive the coming to be and passing away of this determination. Then not all motion and change occur *in* and *out of* beings; there are beings that come to be and pass away *themselves*.<sup>50</sup> They have an inherent limit which binds them and, if transgressed, leads to their destruction. Even



though it is “most characteristic”<sup>51</sup> of being to admit contraries, being is not defined as that which underlies simply any change from one contrary to the other. Aristotelian being is not infinitely indeterminate and determinable as such, but already has inherent determination. For a being, to be is not to be anything in any way, but to be something in a certain way. This is the second half of the account of being we find in Aristotle and not in Descartes.

## 2. A kind of waking.

If, as we claimed, everyday life offers examples of somnolence where one is “*just* thinking” or “*just* talking”, where homonymous aspects parade while adding up to “nothing really”, it is not exhausted by this stance. Thought also seems capable of some kind of waking as well as somnolence. To take up our previous examples, then, a daydreaming while waiting for a bus may be disturbed by an event, an accident, an object, or a memory, just like a chat may be interrupted by the emergence of an issue, the telling of a story or a discussion. In Latin, such a matter for discourse and deliberation is called a *causa*, as a cause one is engaged in or as a case at court; it is also called *res*, as has been suggested by the answer of the daydreamer to what he was thinking in terms of “reality”: “Nothing *really*...”<sup>52</sup> There is then something “real” about this waking stance in the sense that it is concentrated around an issue. This does not imply that there is something necessarily serious, truthful and objective about this stance or that the matter at hand is important, but it does imply that somnolent thinking is decentered by a kind of waking. Instead of being the pivot of

disparate transient aspects, experience now gravitates around that which it takes to be an “issue”, a “case”, or at least “something real”.

Already, when one interrupts a daydreamer and asks what she was thinking, one is operating in a waking stance, there is something at issue. It is indeed from a waking stance that somnolence can be thematized and analyzed, and indeed this thematization will be made after the fact and remains inaccurate to that extent. This waking stance is obvious from our present argument as well, since here we are not thinking or speaking about “nothing really” and we hope that all that we say does add up to something more than “nothing”. Although somnolence can be thematized only in retrospect, the advantage of a sober stance is that it can keep in mind this inappropriateness and recognize that neither thought nor the world are exhausted by somnolence.

Indeed the world is such that it offers “something real” instead of aspects that add up to “nothing really”. Instead of “just something bulky” *or* “just something warm” *or* “just something moving”, what appears now is a living being, an ox: the ox is bulky *and* warm, he is laying down on the grass *and* he is moving his tail *and* digesting food, he is where his tail is *and* where his horns point *and* where his chest lays. It is however only in comparison to the somnolent viewpoint that we may remark that these aspects are no longer simply exclusive of one another, that there is some container underlying the flow of all of them, because it is not true that the aspects are aggregated here. From a properly sober standpoint, we should rather say that the sober appearance is less a conjunction of formerly disparate aspects than the appearance of a standard. Aspects have not vanished here, but they appear as aspects

*according to* this standard, i.e., aspects *of* something. In a way, what distinguishes synonymy from homonymy, or sobriety from somnolence, is this simple conjunction: *of*. A selfsame aspect *of* “nothing really” is open to infinite manipulation because its only “demand” (which is not a demand at all) is to be clearly and distinctly selfsame, to be *just* “this” – which it already is.

But the sober world offers something that is not infinitely malleable, something that has a demand, or better, something that *is* such a demand: to be an ox is to be what it is *for an ox* to be so. Similarly, the little talk that could go in any direction is now interrupted by something to attend to: a story that organizes characters, actions and circumstances, a topic of discussion that articulates different aspects of an issue, a suggestion that asks to be responded. This demand may well be rejected: the ox may well be seen as a lump of meat, and one may well refuse to attend to an issue raised in a conversation; nevertheless such a rejection will never make it as if this demand has never been made. On the contrary, the rejection or dismissal of this demand will turn the demand into a *rejected* one, and to that extent will affirm its having been. *Logos* of being means a standard of being.

### 3. An inclusive version of the principle of non-contradiction.

Every extended being has magnitude and thus is at once “here” and also “there”. Similarly, the motion of the tail of the ox depends on the fact that it moves in certain ways while his body remains still. The motion of the tail *of* the ox depends on *his* being now there and then there. The head *of* the ox is cooler, harder and more

silent than *his* stomach. We find here the same emphasis on the “*of*” as before. This “*of*” does not match different aspects to one another, it does not connect the formerly disjointed coldness and hardness and heat, it is the original that organizes, hierarchizes and defines aspects according to something that is not an aspect. Being conjoins aspects – at least, it conjoins the aspects of “being here” and “being there”, the aspects of “being now” and “being now still”. From this point of view, it is an abuse of the law of the excluded middle to argue that “if an Indian is black as a whole while his teeth are white, then he is white and not white”.<sup>53</sup>

Although being is indeed subject to the exclusive version of the PNC insofar as it is impossible for it to be and not be at the same time, it is also true that the aspects here are no longer simply subject to the exclusive PNC. The whiteness of the Indian’s teeth, instead of excluding all that is not white, here is conjoined with the darkness of his skin; the motion of the ox’s tail, instead of excluding all rest, here includes and even necessitates the rest of his body. In short, here the PNC works no longer a formal law of disjunction and exclusion, but as an original demand of inclusion. The PNC here can no longer simply preclude the cohabitation of contraries at the same time, it must proclaim that the same *can and is meant to* belong and fail to belong to the same at the same time – but *in different respects*.<sup>54</sup>

Although Aristotle is perhaps the first to formulate the exclusive PNC in contrast to what Heraclitus supposedly says, it is not true that he excludes other versions of the PNC. His discussion of the PNC in general seems to have its roots in the fourth book of Plato’s *Republic*, where Socrates, while discussing the unity of the soul, suggests to Glaucon that “it is clear that the same will not be willing to do or

undergo opposites at the same time in the same respect (*kata tauton*) and in relation to the same. (*pros tauton*)”.<sup>55</sup> Later, Socrates shifts this emphasis on the unwillingness of being to be a certain way toward the impossibility of their being so.<sup>56</sup> After considering the examples of a man moving his arms<sup>57</sup> and a spinning top<sup>58</sup>, he modifies his first statement:

“Then the saying of such things will neither scare us nor persuade us that something, being the same, would ever suffer, be, or do opposites at the same time, in the same respect [*kata to auto*] and in relation to the same [*pros to auto*].”<sup>59</sup>

Here then Socrates states at least a qualified version of the exclusive PNC: the exclusive PNC holds *in the same respect* and in relation to the same. Socrates thereby implies that the exclusive PNC would not necessarily work if different respects were involved. Simply put, Socrates draws our attention to the respects in which contraries are not disjoined, but conjoined. Let us call this version of the PNC, the “inclusive PNC”. According to the inclusive PNC, then, while it is true that a top either moves or does not move absolutely, it may well be moving and not moving in different respects – in this instance, with respect to its different parts.

Our distinction between the exclusive and inclusive versions of the PNC does not however map onto, respectively, Aristotle’s and Socrates’ versions. In fact, although we have seen Aristotle state the supposedly anti-Heraclitean exclusive version of the PNC, his earlier statement of the PNC in *Metaphysics*, IV, takes into

account the respects: “it is impossible for the same to belong and not belong to the same at the same time in the same respect [*kata to auto*].”<sup>60</sup> Why does Aristotle omit the clause “in relation to the same” (*pros to auto*) that we find in Socrates’ version? What does it add to the PNC? It indicates the fact that the same cannot be, say, both bigger and not bigger than the same.<sup>61</sup> Since Aristotle has an extensive account of relation (*pros ti*) both in *Categories*, 7, and in the fifteenth chapter of *Metaphysics*, V, he cannot have been unaware of this qualification. The only possibility seems that he did not deem this qualification to be crucial in that it is superfluous to indicate that something can have properties that stand in opposite relations to different objects. Thus, a statement such as “this finger is longer” would be, in the eyes of Aristotle, an inherently incomplete statement.

Although Aristotle’s disjunctive PNC was formulated precisely in opposition to “what Heraclitus is supposed to have said”, here, on the contrary, Aristotle joins Heraclitus in recognizing the need to develop the exclusive PNC and, as Heraclitus says, to “understand how that which is disrupted has the same *logos* as itself: a back-turning harmony as in the bow and the lyre”.<sup>62</sup> Aristotle explicitly rejects the absolute disjunction or conjunction between being and non-being by appealing to these respects:

“In one way they [those who simply conjoined being and non-being] speak correctly, in another way they do not know [*agnoousin*]. For, being [*to on*] is said in two ways so that in a way being can come into being [*gignesthai*] out

of non-being [*mê on*], in another way it cannot. And the same can at once be and not be, but not in the same respect [*all' ou kata tauto*].”<sup>63</sup>

The inclusive version of the PNC will inform us more about beings than the exclusive version: where the latter will compellingly show that the same thing cannot be both white and not-white, moving and not-moving at the same time, the former will add that this is true *not absolutely* but only as long as we are considering one respect. The latter will view the motion of the tail of an ox as simply moving, the former will illuminate the very relation of inclusiveness between the motion of tail and the rest of the spine of the ox.

Aristotle then has both the exclusive and the inclusive versions of the PNC.<sup>64</sup> Without the inclusive PNC, one cannot draw the difference between an aspect and a being as having a *logos* in its own right, a standard of being.

#### 4. Another sense of “underlying thing”.

Let us briefly return to Socrates’ examples in the *Republic* in order to see connection between these respects which may be opposed to one another and the *logos* of being. His first example is of a man standing still while moving his arms and head. The example may seem to present us a trunk that is standing still, an arm and a head in motion. A surgeon or a beauty contest jury member may well give judgments and advice from this stance, focusing on each part of the human body in isolation from the others. A gym teacher, a coach or a dance teacher may well approach the

human body in this way, having different diagnoses and exercises for each of its parts. As the exclusive PNC dictates, his arms cannot be moving and not moving at the same time, no more than his head or his trunk.

But the example, of course, is intended to highlight not a trunk or two arms or a head, but the body of a man as a whole: *his* trunk, *his* two arms, *his* head. The motion of his arms and head and the stability of his trunk are not random aspects of his motion and rest, they are rather respects precisely regulated by a standard, by the man's *logos* of being, by what it is *for him* to be. To be a human being is to be a living body, and to be a living body is to be the demand that one's motion and rest originate in oneself<sup>65</sup>, the demand to articulate motion and rest in such a way that the body can find in itself both a stable ground and a joint around which motion is possible. In fact, the motion of a living body is a demand not only to orchestrate its internal parts, but also to adapt itself to the system between the organism and its environment: the earth underneath, the water, the air, the heat of the sun, and ultimately the celestial spheres.<sup>66</sup> Briefly put, to move his arms and head while standing still is not a challenge to the selfsameness and unity of his body and life, it is precisely part of what it is *for him* to be.

Socrates' second example is a spinning top moving with respect to its periphery but not with respect to its axis. Again, this motion and rest are not primarily aspects in their own right, but rather respects precisely regulated by what it is *for a top* to be, since to be a top is to be the very conjunction of peripheral motion and axial rest.<sup>67</sup> Once this conjunction is disrupted, once this demand is rejected, one has a top only homonymously. If, while spinning, the axis cannot stand still at the horizontal



level, one has a wheel, and if it cannot stand still in no respects, then one has a ball<sup>68</sup>; in either case, one does not have a top that is adequate to what it is *for a top* to be. In this case as well as the previous one, the PNC is at work not by excluding different aspects, but by offering different respects in which the same can conjoin contraries and in fact demands this conjunction according to what it is for it to be – according to its *logos* of being.

One can see how Heraclitus' examples, i.e. the bow and the lyre, are almost<sup>69</sup> perfect paradigms of Aristotle's conjunction of opposites in beings: they require that the cord be pulled in two opposite directions, i.e., that it be stretched. In fact, the notes of the lyre and the accuracy of the bow depend on how well their cords are stretched. Requiring that their cord be pulled in two opposite directions, they also require a stable frame to hold the tension together without one pull yielding to the other. One would disrupt what it is for a bow to be not by *establishing* such an opposition, but by *removing* it, for instance by burning the bow like Descartes did to the piece of wax. Here, then, we find out that being is not simply that *in which* determinations indifferently come and go, but also that which has an inherent standard, a claim or a "say" on its being. Here, then, we find Aristotle much closer to the Heraclitean "*logos* of being" than to Cartesian *substantia*.

## 5. Return to the example.

If it is true that the regard for *logos* of being that we find in Aristotle and Heraclitus is the second half of our story, how are we to modify our previous

treatment of the famous Cartesian wax example? Wasn't it true that the wax survived the alteration of all its sensuous aspects under the influence of the fire, and that its true nature was to be pure indeterminacy, i.e. pure possibility? As we have seen, Descartes' conclusion that the wax is primarily an object of the mind, and not of sense and imagination, is premised on the fact that the wax does remain the same thing throughout his experiment, and on that basis he extends this durability to all physical objects reducing them to their geometrical, i.e. purely mental, properties.

There is something one-sided about Descartes' argument. Now that we have a better understanding of *logos* of being, we can shed light on what Descartes implicitly muffles. First, one may raise suspicion as to whether Descartes chooses the piece of wax simply because it exhibits various sensuous aspects, and not also because the "demand" of the piece of wax as a thing is almost unapparent and thus already seems to be immediately reducible to infinite possibilities of manipulation – which will be Descartes conclusion. A piece of wax seems to be a thing that is not a *res* or a *causa*, an object that does *not* make a *case* on its own.<sup>70</sup> Descartes does not take an ox or a country or an artwork, but a piece of wax as his example. The wax is an almost perfect example for muffling the *logos* of being and for thereby reducing all synonymy to homonymy, all waking to somnolence. Perhaps it is no coincidence that Descartes makes recurrent references to his own somnolence and grants the possibility that he is at sleep throughout the *Meditationes*; in fact, his argument against skepticism draws much of its power from the fact that he is able to bracket sober experience as a whole. Descartes' meditations as well as his wax example are excellent descriptions of somnolence, but not of the piece of wax as having a "*logos*

of being”. As Heraclitus puts it: “Of the *logos* of being, humans are always uncomprehending... they forget what they do when awake as they forget [what they do] in sleep.”<sup>71</sup>

It is true that the sweetness, the scent of flowers and the whiteness *are in* the wax and that after being heated these properties are replaced by other properties, while something remained constant. As we have said, Aristotle’s exposition and criticism of his predecessors in the first book of the *Physics* often suggests this structure of an underlying thing which remains constant throughout the transition from some property to its contrary. To return to the language of *Categories*<sup>72</sup>, everything other than beings are in them as an underlying being – *or they are that which is said of them as an underlying being*.<sup>73</sup> Descartes’ reasoning omits the question as to whether anything is said of beings (*kath’ hypokeimenôn tôn protôn ousiôn legetai*). Descartes suppresses the fact that, however unthingly, the wax is a thing, it is a *res* and a *causa*. There are not only things that *are in* the wax, but also things that *are said of* it.

The way to show how Descartes’ treatment of his example is one-sided is to take his example more seriously and more literally than he did – something we can do as readers of Aristotle’s biological works. What then *is said of* the wax? “The bee makes the comb... from flowers.”<sup>74</sup> According to Aristotle’s *History of Animals*, wax is a substance taken from flowers by bees for the sake of building a honeycomb. However muffled, wax does exhibit a standard: to have the appropriate consistency for building a honeycomb, and thus to be neither totally dry nor melted. The wax has a *logos* of being, a standard stating *of it* what it is *for it* to be wax. One can always

reject, dismiss or omit this demand, as Descartes does, but one can do so precisely because there is already something to reject, dismiss or omit. Indeed the wax can be seen as something infinitely malleable, but it will not survive all manipulation *as the wax it is*. Turning from sweet to not-sweet and from white to not-white, the wax is perhaps still what it is for it to be so; but the piece of wax is no longer what it is for it to be itself when it is heated and loses the consistency that is required for the construction of a honeycomb.

For Descartes, if it is true that the wax remains throughout the transformations of all its sensuous aspects, then it validly follows that the wax was nothing but pure extension to begin with – an object of the mind alone. Thus, Descartes asked the crucial question: “Does the wax still remain?” Then he immediately gave a strong straightforward answer: “I must confess that it does; no one denies it; no one thinks otherwise.” Why *must* he confess that it does? Who is there to deny it? Who are these others that “do not think otherwise”? It seems as if Aristotle, for one, would think otherwise, claiming that the wax still remains *only homonymously* because the fire did abolish its *logos* of being as wax. Before the experiment, Descartes already assumed that the wax would remain independently from its properties and he simply inferred that the wax is indeed pure extension. Descartes’ reasoning here is a *petitio principii*. It is not true that the wax remains throughout the experiment, thus it does not follow that the mind perceived the same piece of wax all along and was thereby confirmed in its own existence.

Picking the most “unthingly” thing as a paradigm and treating it as indifferent to all of its aspects, Descartes spreads a “waxy” or plastic texture to all things and he

tailors sober experience on the model of somnolence. He reduces all synonymy to homonymy and brackets the possibility for beings to have a *logos* of being, for other beings to attend to that *logos*. It is not anachronistic to object to Descartes from what we take to be Aristotle's viewpoint, since Aristotle was aware of at least philosophers who reduced *logos* of beings to incidental properties:

“In general those who say this [those who deny the PNC] do away with being and what it is for something to be. For it is necessary for them to say that all things are incidental [*symbēbēkenai*] and that there is no such thing as the very thing it is to be human or animal.”<sup>75</sup>

### C. RECAPITULATION AND REORIENTATION.

We have offered a parallel elaboration of homonymy and synonymy by first interpreting the text of the *Categories*, then by discussing the experiential forms, the understanding of being and the version of the PNC each imply, and finally by comparing them to the Cartesian concept of substance. Now we are in a position to attain the goal we have set at the outset: an understanding of the philosophical meaning of *logos* in the *Categories* as the differentia between homonymy and synonymy.

What then does *logos* mean in the *Categories*?

*Logos means standard.* In general, it is what it is to be *for the being at hand*; in the case of an ox or a human being, this means what it is for each of them to be animal.<sup>76</sup> The emphasis here is not so much on “being x” or “being y” as it is on “for each of them” (*autôn hekaterôi*), a dative clause of interest as in the question: “What does this have to do *with me*?”<sup>77</sup> The question at hand, “what is ‘being x’?” is to be investigated from the perspective of the being itself, and synonymy is not distinguished from homonymy as long as this shift of perspective does not occur. One may well designate a representation and a human being homonymously as “animals”; what is overviewed here is not the question “What is being animal?” itself, since a representation of a human being may well be more “informative” than the perception of one with respect to this question<sup>78</sup>, but rather what being animal has to do *with the being at hand*. By distinguishing synonymy from homonymy, then, Aristotle suggests that it is possible to address, and equally possible to fail to address, beings from the

perspective of their being, and not simply in the aspects that appear to us. In fact, mistaking a grizzly bear for a blackbear is in a way more “truthful” than considering it in its weight, furriness or dangerousness. *Logos* articulates the way in which a being presents one aspect not at the expense of another. *Logos means the standard that articulates the being at hand in the manifold of its aspects.*

This is exactly what Aristotle takes to be “most characteristic of being”:  
“Being the same and one in number, it is receptive of contraries.”<sup>79</sup> This is at once most characteristic of being, i.e. its most fundamental property, and this is what is unique to being.<sup>80</sup> In contrast, according to Aristotle’s first example, color “will not be white and black while being the same and being one in number”.<sup>81</sup> The implication is that a being will be white and black while remaining the same thing. Taken synonymously, a being such as a cloak will remain the same thing regardless of its turning from white to black or to non-white. This is indeed why Aristotle typically adds a temporal clause to the principle of non-contradiction: it is insufficient to proclaim that the same thing cannot be and not be or that “it is impossible for anyone to suppose the same to be and not be, as some think Heraclitus says”.<sup>82</sup> It is necessary to add a temporal qualification: “if it is impossible for contraries to belong to the same at once...”<sup>83</sup> One can easily see how the PNC is directly related to the concept of being: the principle stating that the same being cannot be and not be at the same time brings to mind the possibility that the same being can indeed be and not be at different times. It is *logos* that captures this temporal unity of being. *Logos means the inherent standard that articulates the being at hand in its spatiotemporal manifold.*

Even though Aristotle explicitly says that “nothing seems to admit contraries at the same time” in the *Categories*<sup>84</sup>, his major statement of the PNC does add another reservation to the exclusive PNC: “it is impossible that the same belong and not belong to the same at the same time and in the same respect [*kata to auto*].”<sup>85</sup> This suggests that the same being can be and not be even at the same time – as long as these are in different respects. Thus, it is not impossible for the same person to be white with respect to his teeth, and yet black with respect to his whole body at the very same time<sup>86</sup>; it is not impossible for the same person to be in motion with respect to his heart but in rest as a whole. One can see how Aristotle’s remark here is crucial: if it was simply not the case that the same could be and not be something at the same time, then Socrates could not be at once where his feet are and where his head is. This added clause allows for the possibility that a being be at once here and a bit further, or be at once partly white and partly non-white. Thus, being most characteristically is receptive of contraries at different times – or at the same time but in different respects. *Logos is standard that articulates the being at hand in the unity of its respects.*

*Logos* is a promise to provide us something no sculpture, representation, impression or name necessarily does: the very way of being of a being. To address an ox as an animal is to consider it with respect to what it is for it to be: to address it not only as something here, something there, something now, something then, something brown or black, but as animal: as a being that grows, desires, perceives and moves. *Logos* captures a being from within the perspective of that being, i.e. in its temporal stability, in its spatial extendedness and in the variety of its aspects. *Logos* captures



the “extendedness” of beings, with a connotation of “stretch” that will pervade the rest of our dissertation. Unlike Nietzsche who thinks that Aristotle simply accuses Heraclitus for contradicting the principle of non-contradiction<sup>87</sup>, Aristotle’s seminal use of *logos* at the opening of the corpus is a retrieval of the Heraclitean effort to “understand how that which is disrupted has the same *logos* as itself: a back-turning harmony, as in the bow and the lyre.”<sup>88</sup>

*Logos* means standard in the *Categories*: a being’s holding on both to its being and to what it is for it to be, without letting one yield to the other.

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There remains the essential question: even though things may seem to be irreducible to free-floating aspects, is it true that a piece of wax or a spinning top has itself a *logos* of being, the way Aristotle’s examples (an ox and a human being) have? Aren’t we speaking loosely when we claim that being a “substance taken from flowers by bees for the sake of building a honeycomb” is what it is *for the piece of wax* to be? Shouldn’t *logos* be imputed to *us*, and interpreted accordingly as results of a mental synthesis carried out by *us*, in *us* and for *us*, instead of taking place in the world, in and for the beings themselves, within and for the piece of wax? Even though we have seen how synonymy cannot be reduced to homonymy in the *Categories*, we need to make a dialectical backward step in our argument in order to pursue the meaning of *logos* in Aristotle’s philosophy: What warrants for the *inherence* of the standard we concluded *logos* to be?

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- <sup>1</sup> DK22B1. Quoted in *Rhetoric*, III, 5, 1407b.
- <sup>2</sup> *On Interpretation*, 2, 16a19-20, 16a26-29. See also *On Interpretation*, 4, 16b33-17a2; *Poetics*, 20, 1456b35, 1457a2, 11, 14, 23.
- <sup>3</sup> See, for instance, nine occurrences of *logos* in *Categories*, 5, 4a23-4b11.
- <sup>4</sup> See, for instance, *Categories*, 10, 12b7-10.
- <sup>5</sup> In fact, the *Categories* is traditionally considered as a text not on *logos*, but on its constituents. See, for instance, *Categories*, 4, 1b25: “Each one of those that are said without combination (*tôn kata mêdemian symplokên legomenôn...*) means either *ousia* or how-much...”
- <sup>6</sup> *Categories*, 12, 14b15-20.
- <sup>7</sup> *On Sophistical Refutations*, 1, 165a6-14. *On Interpretation*, 9, 18b38-19a1. See especially *Metaphysics*, IX, 10, 1051b7ff.
- <sup>8</sup> In Ancient Greek, *onoma* can mean “noun” as opposed to “verb” (*rhema*) as well as “name” and “reputation”. See the “*onoma*” article in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).
- <sup>9</sup> *Categories*, 1, 1a1-2.
- <sup>10</sup> The traditional arrangement of Aristotle’s corpus indeed goes back not to Aristotle, but to Andronicus of Rhodes who is said to have had access to original manuscripts in Rome and arranged the Aristotelian corpus in the second half of the first century B. C. E. See Ross, David, *Aristotle* (London: Methuen & Co.: 1949), p. 7n.
- <sup>11</sup> *Gegrammenon*. Although there is indeed no word for “representation” in Ancient Greek, especially no word that has the same strong metaphysical connotations, the meaning of “representation” can be compared to *gegrammenon* which can mean “that which has been drawn”, but also “that which has been written down” or even “that whose name has been written”.
- <sup>12</sup> *Categories*, 1, 1a1-13. For “*logos tês ousias*” in Aristotle’s biology, see *Parts of Animals*, IV, 13, 695b19.
- <sup>13</sup> See also *Parts of Animals*, I, 1, 640b34-641a7; or *On the Soul*, II, 1, 412b20-22: “the eye is the material of vision, and if vision is left out there is no eye, except homonymously, as for instance the stone or painted [*gegrammenos*] eye.” For the distinction between representation and the represented, see *On Memory and Recollection*, 1, 450b15-451a14.
- <sup>14</sup> *Topics*, I, 15, 106b6-10.
- <sup>15</sup> *Metaphysics*, VII, 10, 1035b1-2.
- <sup>16</sup> *Parts of Animals*, I, 1, 641a1.
- <sup>17</sup> *Parts of Animals*, II, 1, 647b18.
- <sup>18</sup> *Topics*, IV, 3, 123a27. This last case is especially puzzling, since calling a species (say, “ox”) by its genus (“animal”) is precisely Aristotle’s example of synonymy. Thus, if homonymy operates between a species and a genus, it seems like it is reserved to instances where a genus is addressed as one of its species and *not vice versa*.
- <sup>19</sup> *Nicomachean Ethics*, V, 1, 1129a29-31. See also *Nicomachean Ethics*, I, 6, 1096b25-30.
- <sup>20</sup> *On Interpretation*, 2, 16a19-20, 16a26-29. For an explanation of “*synthêkê*” see also *On Interpretation*, 4, 16b33-17a2. Also see *Poetics*, 20, 1456b35, 1457a2, 11, 14, 23.
- <sup>21</sup> See also *Topics*, VI, 10, 148a23-25.
- <sup>22</sup> *Categories*, 2, 1a20-1b5.
- <sup>23</sup> We shall italicize the phrases “being in” and “being said of” each time it is used in these senses.
- <sup>24</sup> We are aware that this principle has been named differently. Since we shall be discussing different versions of it, we were obliged to employ a rough designation. Further, we shall hereafter abbreviate this designation as PNC.
- <sup>25</sup> *Metaphysics*, IV, 3, 1005b10, 13.

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<sup>26</sup> *Metaphysics*, IV, 3, 1005b23-25. See also *Metaphysics*, IV, 4, 1006a4-5, 1006b34-1007a1; *On Interpretation*, 5, 20a16-17. For another ambiguously critical reference to Heraclitus in this context, see *Metaphysics*, IV, 8, 1012a33.

<sup>27</sup> *Metaphysics*, IV, 3, 1005b30-32. See also *Sophistical Refutations*, 4, 165b39-166a7.

<sup>28</sup> *Categories*, 5, 4a10-13.

<sup>29</sup> *Categories*, 5, 4a11-13.

<sup>30</sup> *Categories*, 5, 4a14-15.

<sup>31</sup> *Categories*, 5, 2b5-6.

<sup>32</sup> In our quotations from Descartes, we shall use the following work: René Descartes, *Méditations Métaphysiques*, (Paris: Flammarion, 1979).

<sup>33</sup> *Physics*, I, 2, 185a5.

<sup>34</sup> *Physics*, I, 2, 184b15ff.

<sup>35</sup> *Physics*, I, 2, 184b27-185a1. Aristotle's more central objection to the hypothesis of Parmenides and Melissus stems from his investigation of the precise way in which "being" and "one" are meant. *Physics*, I, 2, 185a22ff.

<sup>36</sup> *Physics*, I, 2, 185a32; 3, 186a34-35; 3, 186b17-18; 4, 187a13; 4, 187a19.

<sup>37</sup> *Physics*, I, 4, 187a12.

<sup>38</sup> *Physics*, I, 5.

<sup>39</sup> This structure of contraries and the thing underlying them is in fact a leitmotif in the Aristotelian corpus. See *Metaphysics*, IV, XII, or *Physics*, I, 6, 189b12-13: "this opinion seems to be the ancient one, that the one and excess and deficiency are the sources of beings..." *Physics*, I, 6, 189b20-22: "if among four, there were two oppositions, there would need to be present some nature in between, apart from each pair [of contraries]." Aristotle's conclusion concerning the number of sources in this first book of the *Physics* is the following: "It is impossible for contraries to be acted upon by one another. But this is solved because the underlying thing is something different. For it is not a contrary. So in a certain way the sources are not more than the contraries, but two in number in this way of speaking; but neither are they altogether two on account of there being the [underlying thing] different from them – but three." (*Physics*, I, 7, 190b33-191a2)

<sup>40</sup> *Physics*, I, 7, 191a7-12.

<sup>41</sup> See especially Plato, *Protagoras*, 349b: "As I suppose, the question was this: are the five names 'wisdom', 'temperance', 'courage', 'justice' and 'holiness' attached to one thing (*epi henī pragmati estin*), or is there something underlying (*hypokeitai*) each of these names – some being or thing on its own (*tis idios ousia kai pragma*) having its own power, each being different than the others?" See also Plato, *Republic*, IX, 581c and *Cratylus*, 422d.

<sup>42</sup> *Categories*, 1, 1a6-13.

<sup>43</sup> The same definition is given in *Topics*, VI, 10, 148a23-25.

<sup>44</sup> *Cat.*, I, 1, 1a5, 1a11: "*ti estin autōn hekaterōi to zōōi einai.*" See also *On Memory and Recollection*, 1, 450b23.

<sup>45</sup> See "polyonyms" and "heteronyms" in Simplicius, of Cilicia, *On Aristotle's "Categories I-4"*, tr. Michael Chase (New York: Cornell University Press, 2003) 22, 22ff; 38, 11ff. pp. 37-38, 53.

<sup>46</sup> This opening chapter of the Aristotelian corpus gives us no indication that it deals with anything other than beings (literally, "that about which we can say 'the name of x', 'the *logos* of being of x' or 'x has an appellation [*prosegorian ekhei*] ..."), or rather kinds of relation between beings, the threefold distinction is made with respect to the way beings are called.

<sup>47</sup> *Sophistical Refutations*, 13, 173a34-35.

<sup>48</sup> *Categories*, 1, 1a10-12.

<sup>49</sup> *Categories*, 5, 2b5-6.

<sup>50</sup> The only change that beings do not undergo in the proper sense is coming-to-be and passing-away. (See *Physics*, V.) We will indeed return to this crucial exception in our Chapter III. See *On Interpretation*, 13, 23a21-25; *Metaphysics*, IX, 8, 1050b6-35; XII, 1, 1069a30-1069b2.

<sup>51</sup> *Categories*, 5, 4a10-11.

<sup>52</sup> Just as *res* and *causa* in Latin often mean much less a "mere object" than an "issue", a "matter of concern" etc., *pragma* in Greek often refers to a matter of public concern. For instance, in the *Rhetoric* Aristotle employs *pragmata* as "the main issue to be discussed" and "the proper subject-

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matter of rhetoric”. (*Rhetoric*, I, *passim*) In our next chapter, we shall return to this issue in the context of the connection between *pragma*, *pragmateuesthai* and *praxis*.

<sup>53</sup> *Sophistical Refutations*, 5, 167a7-9.

<sup>54</sup> For one of the many discussions of the denial of this qualification in the Aristotelian corpus, see *Sophistical Refutations*, 22, 178a17-19.

<sup>55</sup> Plato, *Republic*, IV, 3, 436b8-c1.

<sup>56</sup> Plato, *Republic*, IV, 436c5-6.

<sup>57</sup> Plato, *Republic*, IV, 436c8-d1.

<sup>58</sup> Plato, *Republic*, IV, 436d4-e6.

<sup>59</sup> Plato, *Republic*, IV, 436e8-437a2.

<sup>60</sup> *Metaphysics*, IV, 1005b19-20.

<sup>61</sup> Indeed, this is a crucial theme in many dialogues such as the *Parmenides* and the *Republic*.

<sup>62</sup> Heraclitus, DK22B51. Quotations from Presocratics follow the Diels-Kranz edition. We are following Hippolytus in reading *homologeein* (“agreeing”, “having the same *logos*”) instead of *xumpheretai* (“bring together), and *palintropos* (“backwards”). Kirk and Raven cite Hippolytus as “the fullest source” in the context of this fragment. (G. S. Kirk, J. E. Raven and M. Schofield, *The Presocratic Philosophers*, (Cambridge: Cambridge University Press, 1983) p. 192)

<sup>63</sup> *Metaphysics*, IV, 5, 1009a32-35.

<sup>64</sup> It is worthwhile to note that, unlike Aristotle’s versions, Socrates’ version of the PNC includes not only the “in the same respect” (*kata to auto*), but also the “in relation to the same” (*pros to auto*). What does this latter qualification add to the PNC? Perhaps that the same cannot be, say, both bigger and not bigger than the same. For Aristotle’s account of the “*pros ti*”, see *Metaphysics*, V, 15.

<sup>65</sup> *Physics*, II, 1, 192b8-23.

<sup>66</sup> For an analysis of this articulation of motion and rest in living bodies, see Aristotle, *On the Movement of Animals*, 1, 698a7-698b8.

<sup>67</sup> In our discussion of the PNC and of the top example, I have benefited much from Gregory Recco’s Ph. D. dissertation, *Athens Victorious: Democracy in Plato’s Republic*, Penn State University, 2002, pp. 23-34.

<sup>68</sup> *On the Soul*, III, 10, 433b27. For an insightful discussion of the articulation of the limbs of animals capable of locomotion, see *On the Motion of Animals*, 1.

<sup>69</sup> Why they are not perfect examples in our view will become clear at the end of this section.

<sup>70</sup> Many famous examples in the history of philosophy have exploited the fact that wax is almost pure matter without form. Plato, *Theaetetus*, 191c-d; Aristotle, *On Memory and Recollection*, 450a32-b11, *Generation of Animals*, I, 21, 729b17, *Physics*, VII, 3, 245b11, *On the Heavens*, III, 7, 305b30, *On the Soul*, II, 1, 412b7, III, 12, 435a2. See also Jacob Klein, *A Commentary on Plato’s Meno* (Illinois: Chicago University Press, 1998), p. 187. See also Themistius, *Paraphrase de la “Métaphysique” d’Aristote (livre lambda)*, tr. Rémi Brague (Paris: Vrin, 1999), p.58. In our Chapter IV, we shall discuss another wax example in Aristotle from *On the Soul*, II.

<sup>71</sup> DK22B1. Quoted in *Rhetoric*, III, 5, 1407b.

<sup>72</sup> *Categories*, 2, 1a20-1b8.

<sup>73</sup> *Categories*, 5, 2b3-5.

<sup>74</sup> *History of Animals*, V, 22, 553b31-554a1. For Aristotle on beeswax, see also *History of Animals*, V, 21 and 22.

<sup>75</sup> *Metaphysics*, IV, 4, 1007a20-23. See also Aristotle’s refutation of the Megaric view of potency in *Metaphysics*, IX, 3.

<sup>76</sup> *Categories*, 1, 1a5, 1a11.

<sup>77</sup> See Herbert Weir Smyth, *Greek Grammar* (Harvard: Harvard University Press, 2002), p. 341: “Here belong the phrases (1) *ti (estin) emoi kai soi; what have I to do with thee? (...)* (2) *ti taut’ emoi; what have I to do with this? (...)* (3) *ti emoi pleon; what gain have I?”*

<sup>78</sup> We touch upon problems concerning the pictorial representation of human character in Chapter V in the context of our discussion of “positive states” (*hexeis*).

<sup>79</sup> *Categories*, 5, 4a10-11.

<sup>80</sup> *Categories*, 5, 4a11-13.

<sup>81</sup> *Categories*, 5, 4a14-15.

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<sup>82</sup> *Metaphysics*, IV, 3, 1005b23-25. For another version of the PNC without temporal reference, see *Categories*, 10, 13b2-3. For another ambiguously critical reference to Heraclitus in this context, see *Metaphysics*, IV, 8, 1012a33.

<sup>83</sup> *Metaphysics*, IV, 3, 1005b27-28, 30-32. *On Interpretation*, 10, 20a17-18. See also *Sophistical Refutations*, 4, 165b39-166a7, 22, 178a16-19.

<sup>84</sup> *Categories*, 6, 5b39-6a1.

<sup>85</sup> *Metaphysics*, IV, 3, 1005b19-20.

<sup>86</sup> *Sophistical Refutations*, 5, 167a7-9; 6, 168b14-16.

<sup>87</sup> Friedrich Nietzsche, *La philosophie à l'âge tragiques des Grecs*, tr. J.-L. Backes, M. Haar, M. B. de Launay, (Paris: Gallimard, 1975), p. 29. There is indeed truth to Nietzsche's claim, especially, *Physics*, I, 2, 185b20; *Metaphysics*, XI, 5, 1062a32 and XI, 6, 1063b24 clearly mention Heraclitus' ideas as a challenge for the principle of non-contradiction. And yet *Metaphysics*, IV, 3, 1005b25 and *Metaphysics*, IV, 5, 1010a13 clearly distinguish Heraclitus from what is said about him and from his followers; finally, *Topics*, VIII, 5, 159b31 and *Metaphysics*, IV, 7, 1012a24 do not provide sufficient support for simply confronting Aristotle and Heraclitus as Nietzsche does.

<sup>88</sup> DK22B51.

## II. POTENCY.

### *LOGOS IN ON INTERPRETATION.*

“Changing, it is at rest.”

Heraclitus.<sup>1</sup>

If *logos* means standard of a being in the *Categories*, what warrants for its *inherence* to that being?

This question is developed in *On Interpretation*. In the three sections of this chapter, (A.) we first develop this problem and return to Aristotle’s own examples; (B.) this leads us to a discussion of his distinction between possibility and necessity from which we conclude that having an *inherent* standard requires that the being be at once at work *and in potency*. (C.) Thus this chapter spills first into Aristotle’s account of natural motion, the topic of chapters III and IV, and then into the discussion of human action and language, the topic of chapters V and VI.

## A. THE INHERENCE OF *LOGOS*.

“Being is said in many ways” – the leitmotif of Aristotle’s philosophy. Before we enter our discussion of *On Interpretation*, let us make a preliminary reflection on the relevance of the multivocity of being. And let us do this in the form of a *reductio ad absurdum*, i.e. by thinking on what the univocity of being would entail. In fact, modern physics and metaphysics took this option quite seriously *against the Aristotelianism of their time*. But it is not the case that nobody thought of such a possibility until the modern times; in fact Aristotle himself defends the multivocity of being explicitly and insistently against the tenets of a view according to which there is no such thing as potency, namely the Megaric school.<sup>2</sup> Thus in our *reductio ad absurdum* we are certainly not falling into anachronism.

So what would the world look like, assuming that there are not different and irreducible *ways* of being, but only being as such? To follow Aristotle’s examples in the *Metaphysics*, there would be nobody *capable* of building a house without necessarily building one in actuality, nobody *capable* of seeing who does not constantly see, no *sensibles* other than the ones actually sensed, no habits, no capacities, no arts, no education, no memory, *in extremis* no coming to be.<sup>3</sup> A realm of eternity, necessity, pure actuality, a realm with no shade and depth. In a way, this world is a dream world, a world humans can aspire to. This world however is *not* a dream world for Aristotle; for him, there *is* such a realm of eternity and necessity: the supralunar realm.<sup>4</sup>

The sublunar world, however, is the world of finitude, of limitation, of materiality, of potencies with all that it entails: precisely a world of growth, decay, natural capacities, habits and arts. And yet the world of finitude is *in no way* reducible to a world of random events: although being finite and lacking immediate actuality, the world of finitude exhibits forms and events that are either merely necessary or merely contingent, either rational or natural.<sup>5</sup> Much of Aristotle's work instills a wonder, no longer in front of the realm of eternity and transparency which we do not inhabit, but in front of the humble, hesitant and yet multifarious beings among which we belong and find ourselves. In other words, the fact that being is said in many ways precludes the collapse of the distinction between actuality and potency, it inspires a sense of curiosity in front of the internal logic of beings, their *logos*<sup>6</sup> – if, indeed, there is such an *inherent* standard, which is the problematic of this chapter.

### 1. The problem.

We attempted to develop the philosophical meaning of *logos* in the *Categories*. There it appeared in the phrase “*logos* of being” and was employed to distinguish synonymy from homonymy. We discussed the two different versions of PNC as well as the two corresponding conceptions of “being” that are operative in homonymy and synonymy, and while doing this, we took up several examples – most emphatically the Cartesian wax example. We concluded that *logos* in Aristotle's *Categories* means standard. At the very end of chapter, however, we suggested that this conclusion can only be temporary because, being the exposition it is, the



*Categories* does not supply us a justification for the *inherence* of the standard. How then can one establish the *inherence* of a standard? How can one find warrant for the claim that the “*logos of being*” is *of that being*, i.e. that it is not externally imposed?

In distinguishing the wax from its homonymous aspects, for instance, we claimed that its “*logos of being*” is to be a substance produced by bees from flowers for the sake of building a honeycomb<sup>7</sup>, that wax itself is not an indeterminate underlying being that is indifferent to its properties, and therefore that it cannot survive all imaginable sensuous modifications without ceasing to be the very claim it is. In a word, we claimed that wax is inherently determined. In the same line of thought, we treated our other examples as if it was they themselves that demanded their properties to harmonize with their *logos of being*. We spoke as if a bow itself had its own standard and that a top made a claim for its own being.

In all these instances, we were right in arguing that these beings were neither free-floating aspects nor a pure underlying substance nor a conjunction of the two, and yet we were speaking inadequately or only metaphorically in talking about *their logos of being*, since the standard of wax is set not by the wax itself, but precisely by bees, the bow’s standard by a bow-maker, a top’s by the toy-maker. To claim that the piece of wax is *concerned* about whether or not it is hot, white, liquid or solid, is not to attend to its *logos of being*, but precisely to fail to attune oneself to what it is to be *for the piece of wax*. Similarly, the top, the bow and the lyre themselves may well be indifferent to the properties they can and cannot have if they are to be at all. Strictly speaking, a lyre’s existence, production and quality are in no way an issue for the lyre itself, but for the craftsman, for his customers, for lyre-players, for the lyre-players’

audience, for the political community<sup>8</sup>, and even for humanity as such. Thus, if *logos* is a standard as we claimed it is, its inherent character remains metaphorical or figurative, and therefore philosophically questionable.

Our examples establish not that beings have a standard, but that the standard of not all beings is internal. The bees view the wax as material for building the honeycomb, but they *precisely* “build the honey comb by bringing drops from the flowers and especially from trees”.<sup>9</sup> As the bees use these drops *as wax* for building their combs, a human being may view the wax as a material for sealing envelopes or as an example in a meditation on the immortality of the soul. A child may see a top as a toy and an adult may momentarily use it as a paperweight. Isn't all addressing homonymous then? Aren't beings palimpsests, precisely wax tablets, receptive to all inscription and manipulation? Isn't all standard externally imposed according to the interpretation and power of the viewer? If beings have no specific powers already inherent in them, aren't they potentially anything? What a being can or cannot undergo or do while remaining the very being it is – isn't this question always settled from without, i.e., from the perspective of a human being, a bee or a flower, and not from within the piece of wax? Aren't all possibilities mere possibilities of a purely *extendable* and *flexible* substance void of an inherent determinacy? Aren't we thus back to the Cartesian position according to which, on the one hand, there is a substance with infinite plasticity, a *res extensa*, and on the other hand a purely active mind, the *res cogitans*? Aren't we back to the exclusive options of pure potentiality, and a mind absolutely at work?

What warrants for the inherence of the “*logos* of being”? How are we to establish that *logos* is not yet one external imposition among others?

## 2. Revision of the project.

Why shouldn't we abandon our pursuit of an inherent standard? Why shouldn't we admit with Descartes that “*logos* of being” is no more inherent to beings than any momentary aspect and follow him in his rejection of the Aristotelian metaphysics of his time? Why shouldn't we confess that *logos*, the *causa formalis* and the *causa finalis* are all illegitimate or uncritical impositions on beings which are in fact explainable and predictable in terms of their *causa materialis* and *causa efficiens*? Wouldn't this be more akin not only to Cartesian algebraic geometry, but also to Hobbesian “metaphysics” and the emergent Newtonian quantitative physics that interpret being as matter (*causa materialis*) in motion (*causa efficiens*)?<sup>10</sup>

In the *Phaedo*, Socrates says to those around him “to give little thought to Socrates and much more to truth”.<sup>11</sup> Aristotle is in line with Socrates in the *Nicomachean Ethics* precisely as he distances himself from those “dear men who introduced the forms”: the truth and our close friends “are both dear, but it is holy to prefer the truth”.<sup>12</sup> It is in the same spirit of fidelity and infidelity at once that Isaac Newton, much later, famously writes in his notebook: “Amicus Plato amicus Aristoteles magis amica veritas.” Isn't it somewhat naïve, if not altogether childish, to listen to Aristotle as if science and society in general remained the same during 2300 years?

Indeed we cannot even enter here the full question of the significance of Aristotle's philosophy and science for today, but we must at least touch upon it for the sake of our project's relevance as a whole. In order to be a "friend of truth" as Socrates, Aristotle and Newton all advise us, we must find a way between the dogmatic reverence and uncritical dismissal of Aristotle. As we discussed in the methodological remarks of our introduction, we cannot *begin* our study by presupposing that his philosophy is eternal truth, just as we cannot predetermine his philosophy and science as premodern and therefore "null and void". But even though the suspension of any prejudice is trivially tenable at the beginning of any pursuit, what is the incentive behind the pursuit itself? Why struggle to be a "friend" to the truth concerning *this* matter, Aristotle's concept of *logos*, rather than follow the evolution and development of modern philosophy and science?

In this context the answer is the following: early modern science is characterized by its prioritization of the inorganic over the organic, of application over understanding, and of production over action and contemplation; early modern mathematical physics precisely brackets pretty much all denotations and connotations of the Ancient Greek verb *phuômai* (birth, growth, origination, emergence...), just as Descartes carefully refrains from defining the subject as a human being, a living being, or even a soul (*anima* or *animus*), but considers it as mind (*mens*) or pure thought.<sup>13</sup> When he discovers himself as pure mind and tries to explain it, he explicitly rejects the traditional Aristotelian definition of human being (*homo*) as a "rational animal" because he has not spare time for the "subtleties" inherent to unclear concepts such as animality and rationality: "Sed quid est homo? Dicamne

animal rationale? Non, quia postea quaerendum foret quidnam animal sit, & quid rationale, atque ita ex una quaestione in plures difficilioresque delaberer; nec jam mihi tantum otii est, ut illo velim inter istiusmodi subtilitates abuti.”<sup>14</sup> It is convenient to bracket concepts as complex and unpredictable as “life”, “animality” or “rationality” especially for purposes of certainty and exactness: Newtonian physics is exact in its predictions, and the Cartesian meditation proceeds toward epistemic certainty through “clear and distinct” concepts. But was the thirst for certainty and rigor discovered with the moderns? Does Aristotle not put enough emphasis on certainty in his account of science in the *Nicomachean Ethics*<sup>15</sup>, in his meticulous discussions of the principle of non-contradiction in *Metaphysics* IV, or in his logical works? The prioritization of the inorganic over the organic, of the quantifiable over the qualitative, for the sake of predictability in early modern science may well stem from the prioritization of application over understanding and of production over action and contemplation.

Life, animality and rationality must be bracketed because they are too unpredictable and too vague. But why be this disturbed by the unpredictable and vague? One of the reasons why early modern science is so taken by the need for certainty and predictability may be that it is driven not by the need to “watch” (*theôrein*) and “know”<sup>16</sup>, but by the project of building, manipulating, producing, using and changing. Modern science looks much more like *tekhnê* than like *epistêmê* in that it is motivated by a projected effect whose means it has to predict, and more and more turns away from discussing the nature of that effect. Thus, it is the changeable, the malleable, the ascertainable or at least the predictable that replaces the sense of wonder and puzzlement before nature and life. But how can a rationalism

confess having no spare time for thinking about “rationality” because the latter is a “subtlety”?

Now, this emphasis on application and production in early modern science, which is at the source of the reduction of life, is not necessitated by science itself, but by the potentials of industry and technology. In short, the early modern emphasis on the effects of science is not straightforwardly scientific. The early modern identification of truth and certainty by means of the reduction of life is philosophically debatable and open to criticism. The mind-body problem, solipsism, alienation of labor and the subject-object duality are some of the well-known aftereffects of this unscientific dismissal of *theôria* as fundamentally determined by the “desire to know”<sup>17</sup> and of the structures of life which do not isolate mind and body, or subject and object.

Early modern science and philosophy do not make it superfluous to read Aristotle, they rather call for such a reading in order to be scientific, in order to question itself, in order to be “friends to truth”.

### 3. Return to Aristotle’s example.

In fact, if it is true that our thematization of *logos* as standard in the preceding chapter remains inconclusive, this was not due to Aristotle’s misguidance in the *Categories*. On the contrary, mostly concentrating on our freely chosen examples (a top, a lyre, a piece of wax...), it is *us* who departed from Aristotle’s own examples in the *Categories*: by transposing Aristotle’s examples of animals and humans with

artifacts, we fell into an unwarranted animism, zoomorphism, anthropomorphism. Thus, if we return to Aristotle's examples, we may well find a means to fruitfully pursue our investigation of the meaning of *logos* in the phrase "logos of being".

Aristotle's examples of beings that have a *logos* of being in common were a human being and an ox.<sup>18</sup> Let us briefly return to Aristotle's example of a human being, and ask whether the inherence of a human's *logos* of being, namely "being a living being", is as debatable and relative as the inherence of the standard of being of the piece of wax. To refer to a frequent example in Aristotle, Socrates can become handsome or cultured without ceasing to be.<sup>19</sup> Socrates is also famous for being able to endure cold weather and to handle much wine soberly.<sup>20</sup> In these respects, Socrates resembles the Cartesian substance subtending and surviving changes. However, Socrates is also well known for *not* surviving the hemlock. What happens when Socrates drinks the hemlock such that he no longer underlies change as a *res extensa*, but *passes away*? In Plato's *Phaedo*, Phaedo describes to Echechrates the gradual effects of the hemlock on Socrates as well as his sudden passing away:

"He walked around and when he said that his legs had gotten heavy, he laid down on his back. For the man told him to do so. And with that, the one who had given him the potion laid hold of him and, after letting some time elapse, examined his feet and legs, and then gave his foot a hard pinch and asked whether he felt it; he said no; and after this, his thighs; and going upward in this way, he showed us that he was growing cold and stiff. And he touched himself and said that when it reached his heart, then he'd be gone. At that time

the chill was around his groin, and uncovering himself – since he had been covered – he said what was his last utterance: ‘Crito, he said, we owe a cock to Aesclepius. Pay it and don’t neglect it.’ ‘That,’ said Crito, ‘will be done; but see if you have anything else to say.’ He did not answer this question, but after a little while he moved (*ekinêthê*) and the man [the attendant] uncovered him and his eyes stood still (*estêsen*). And seeing this Crito closed his mouth and eyes. Such was the end, Echecrates...”<sup>21</sup>

We cannot engage in a detailed interpretation of this long quotation which is one of the most famous passages of the history of philosophy. Although the terminology of covering and uncovering, as well as that of motion and rest, may well be highly relevant to our previous discussions, let us focus on our question: How is it that Socrates *cannot* and indeed *does not* underlie and survive a change, while Cartesian *substantia* can and does? How is it that this change fundamentally destroys a determination that is inherent to Socrates’ being, the very *logos* of his being, namely his being alive?

From the very outset, this passage from the *Phaedo* describes Socrates performing all sorts of motions and undergoing many changes: Socrates walks around, then he lays down; his legs become heavy; the attendant holds him, pinches him from his feet up to his thighs; Socrates does not feel the pinches – from this the attendant infers that Socrates’ body is growing cold and stiff; Socrates uncovers himself; Socrates speaks to Crito... Socrates cannot be walking around and laying down *at once*, but he can lay down *after* walking while remaining the same; further,



he can be at once cold and stiff *with respect to* his legs, and yet warm and flexible *with respect to* his upper body. Here he seems as *determinable* and undetermined as Cartesian substance; all these motions and changes do not *really* change him. After speaking to Crito, the latter addresses him, and apparently Socrates *cannot* or at least *does not* hear. Finally, the text says that Socrates “*ekinêthê*”. This latter, *kineô* in the aorist indicative passive, is a verb that does not clarify whether Socrates is actively moving as a living being, or being moved passively as an inanimate object by the attendant. In short, this ambiguous verb seems to denote a threshold: before *ekinêthê*, Socrates *acts and moves*, refuses or fails to move, and undergoes changes as a living being; after *ekinêthê*, the attendant covers him as one would cover a corpse, and Crito closes his eyes and mouth. In the middle, *ekinêthê* stands as a boundary stone.

The reason we are focusing on the text here is because it provides us something deliberately passed over in Descartes’ meditations: life *and therefore* death. The Platonic text shows that here a threshold has been passed in Socrates’ being. Let us remember Descartes’ question after burning the wax: “Does the wax still remain? I must confess that it does; no one denies it; no one thinks otherwise.”<sup>22</sup> In Socrates’ example, however, one would clearly think otherwise and deny that Socrates remains. “Being alive” for Socrates is fundamentally different from what “being cold” was for the piece of wax. And, as the text shows, “being cold” or “being hot” is not unrelated to “being alive”, it is a condition, a symptom, a manifestation of life and death. No longer being alive, Socrates is fundamentally violated in what it is for him to be, so much so that we cannot really say that Socrates undergoes or underlies the process unlike the wax; that is not the kind of underlying being Socrates

is. The *logos* of being that we almost lost sight of may well lie in the difference between Socrates' drinking of the hemlock and the burning of the wax. "Being alive" may well be an inherent determination of Socrates' being. How are we to rearticulate our question concerning the *inherence* of *logos*?

#### 4. Return to *logos*.

Even if in our previous chapter we were imprecise in claiming against Descartes that the wax, as a substance prepared by bees for building honeycombs, does not survive the burning, now that we have returned to Aristotle's own example we are in a better position to claim that Socrates has an inherent standard – being alive. Life seems to be not an external determination or a simple aspect of Socrates, but to partake in his *logos* of being.<sup>23</sup> Cartesian *substantia* is pure possibility somehow facing a pure mind which is at work beyond imagination and sensation. Socrates, however, is not pure possibility since there is something *inherently impossible* for him: to be without also being alive.

Thus, even supposing that the wax is determined externally under the influence of fire, still the question remains whether this fire, this bee and this human being are equally determined from without. Now that we have some hope of fruitfully pursuing the *inherence* of *logos* in Aristotle by taking up his example, we must now conceptualize a position between infinite possibility and pure actuality – not a stage squeezed between the two, but a phenomenon that stretches between them and holds them. To take up a Heraclitean fragment we quoted in our previous chapter, we must

“understand how that which is disrupted has the same *logos* as itself”, “a back-turning harmony”, but not exactly “as in the bow and the lyre”.<sup>24</sup>

One can see here Descartes and we were mistaken: we took up beings as individuals of one *kind*, namely “being”, and thereby allowed ourselves to reflect on one example in order to draw conclusions concerning all beings. And yet, for Aristotle, if being is said in many ways, this is because not all beings are of one *kind*, their being does not take the same *form*, they do not exhibit a similar *logic*. Other than *kinds* or *forms* of being, there are ways of being of one form of being. This is why there is something dramatic in the story of the ugly duckling: ducks and swans are synonymous with respect to being “animals” and even “birds”, but a baby swan is a duckling *only homonymously*; if the latter were always readily what it was to be for her, there would be no drama in the story; but conversely, if she never became what it was to be for her, there would be no drama either. If the ugly duckling were actually not a swan but a wolf, there would be no ambiguity and no drama to begin with. The story is dramatic precisely because it is possible to make a fundamentally *false* assumption. No “stuff” is capable of such *fundamental* falsity.

In short, we were mistaken in assuming that examples taken for “being” are neutral. The implications of some examples are incompatible with those of others. Since there seems to be no way of settling the question of the “*logos* of being” from without, it must be filtered through the plurality of irreducible *ways* of being.

## 5. Return of *logos*.

What are these ways of being? We have already seen one way of being in our previous chapter, that of an aspect: not-being what one is not in any sense, being determined solely in terms of contrariety. To this seems to correspond in Aristotle the two pairs of contraries properties such as *the hot* and *the cold*, *the wet* and *the dry*.<sup>25</sup> These are precisely defined according to the exclusive version of the principle of non-contradiction as two pairs the terms of which exclude one another absolutely. Just as aspects, these properties are unbodily, unitary and pure. They do differ, however, from aspects in that each aspect *is* only at the expense of any other, whereas each property, such *the hot*, preserves an indifference to *the dry* and *the wet* while excluding *the cold*. Thus, these contrary properties exhibit a first way of being, slightly but importantly distinct from that of aspects.

The distinction is important precisely because *the hot*, while excluding *the cold*, in fact can combine with *the dry* or *the wet*, unlike aspects. Thereby a second way of being comes to play: a bodily way of being. It is by means of the four possible combinations of these two irreducible pairs of contraries that Aristotle derives the “simple bodies”<sup>26</sup>, and, sure enough, it is here that the term *logos* reappears:

“[These contraries] have attached themselves according to a *logos* to the apparently simple bodies, fire, air, water and earth; for fire is hot and dry, air is hot and moist (as vapor is air), water is cold and wet, and earth is cold and

dry, so that it is reasonable that the differences be distributed to primary bodies and the amount [*plêthos*] of these be according to a *logos*.”<sup>27</sup>

This way of being, which is primary at least in the context of perceptible beings<sup>28</sup>, then first involves a *logos*: whereas the way of being of *the* hot is simply *not* being cold, fire *is* according to a *logos* in that it necessarily holds together one term from both pairs of contraries: indeed it holds the hot, but also the dry. The simple bodies exhibit a *logos* of being, an inherent standard in the sense in which we delineated the meaning of *logos* in our previous chapter: fire has a way of being by means of holding onto two aspects together without letting one yield to the other (otherwise, say, fire would turn back into the hot or the dry) and without letting one lay aside the other (otherwise there would be no fire, but the hot *and then* the dry). *Logos* reassumes the meaning of a being’s holding on to the spatiotemporal manifold of its aspects without letting one yield to the other: as Socrates dies, a fire can be extinguished.

Whereas at the level of mere aspects *the* hot merely excluded *the* cold and was indifferent to *the* wet and *the* dry, here fire excludes water but preserves its affinity to earth by means of the dry and to air by means of the hot. Aspects here no longer exist in isolation from everything else, but serve as middle terms between simple bodies: instead of simply being a property abstracted from concrete beings, *the* hot is the middle term of two bodies, the articulation of fire (dry and hot) and air (wet and hot). Each of these simple bodies also have a “place” (*topos*) in the cosmos as distinct from the aspects that simply are *away* from their contrary: “Being four, the simple bodies

make up two pairs belonging to two places: for fire and air are carried toward the limit [of the cosmos], while earth and water are so toward the center.”<sup>29</sup>

The transition from the two basic pairs of contraries to the four simple bodies is developed by more complex formations: just as *the* hot, while excluding *the* cold, combined with *the* dry so as to give rise to fire, now fire, while excluding water<sup>30</sup>, combines with air and earth in order to form composite bodies. In fact this is the point we wish to close up this section with: unlike our and Descartes’ assumption that being is an overarching kind, there is an asymmetry between the divisibility of composite beings *into* simple bodies and the possibility of their generation *out of* them. There *is* something called generation and corruption in a strong sense. In distinction both from aspects that simply negate their contrary in all senses, and from contrary properties (*the* hot, *the* wet, etc.) which negate one another and remain indifferent to other pairs of contraries, and from simple bodies that turn into one another, composite bodies<sup>31</sup> exhibit a third way of being that is fundamentally distinct from the previous two: their destruction is such a fundamental violation that it is not on a par with the changing of one of their aspects, just like Socrates’ was not. They are the beings that reveal the inherence of their *logos* of being, of “what it is *for them* to be”, by means of what is inherently impossible *for them* to be.

## B. POTENCY.<sup>32</sup>

We are still trying to warrant for our claim that *logos* means a standard. A standard is necessarily distinct from a state of affairs. This does not mean that a state of affairs cannot meet this standard, but that the standard must be distinct from the state of affairs precisely for the latter to *meet* the former. An inherent standard, on the other hand, is one that is not imposed on or set before a state of affairs. To return to our example, if living is an inherent standard for Socrates' being, then there must be a way in which Socrates is coming or has already come to meet the standard of living. If *logos* is to be an inherent standard, then there must be a way of being that is at work but not as pure activity; a way of being in potency fundamentally different from mere flexibility, malleability and extendability. If there are beings that have an inherent standard, it must be impossible for them to be *in no way* determined as the Cartesian *res cogitans* is, but also to be determinable *in any way* like the *res extensa*.

Are there such beings? We saw above that simple bodies are among them: fire *is* fire at work, but also it *may* be extinguished by water. A more explicit answer is found in *On Interpretation*:

“It is clear from what has been said that the necessary is according to being-at-work, such that if the eternal [beings] are prior, then being-at-work also is prior to potency; and some are beings-at-work without potency, such as the first beings; and some are with potency, these are prior with respect to nature, but posterior in time; and some are never beings-at-work, but potency only.”<sup>33</sup>

It is the beings that are at work *with* potency that will warrant for the inherence of *logos* as standard.

### 1. A trivial concept of potency.

Ontologically prior<sup>34</sup>, being-at-work seems to be experientially the most available way of being of things in everyday life: we feel *the* hot, we see the fire, we move among present, available and ready things. What is less clear is *dynamis*, potency, and Aristotle's concept of being-at-work (*energeia*) takes its force from potency, although this latter is ontologically secondary. Thus when Aristotle engages in a discussion of being-at-work and potency, it is the latter that seems to him to be the real topic of debate.<sup>35</sup> But potency is said in many ways<sup>36</sup>:

“Some potencies are homonymous. For, ‘possible’ is not said simply; [it is said], on the one hand, due to being true at-work, for instance, ‘it is possible for someone to walk because one is walking’, and in general something is said to be possible because it is already at work; on the other hand, [‘possible’ is said] because it *might* be at work [*energêseien an*], for instance it is possible for someone to walk because one might walk [*badiseien an*].”<sup>37</sup>

The aorist optatives “*energêseien*” and “*badiseien*” are hard to translate and the point Aristotle is trying to make lies therein: something already at work is trivially in



potency. While walking I may say *a fortiori* that I can walk; I may say that it is possible for a white door to be white. All these would be, not untrue, but homonymously true. Let us call this a trivial potency.

Trivial potency defers the question of potency. When I say “I can walk” while walking, there is a sense in which I know that it would be slightly more proper or informative to say “I *could* walk”; looking at a man who has already recovered from a disease, one would hardly say “it is possible for him to recover”; this would rather imply that he has *not* recovered, that *actually* he is *not* healthy. While addressing a present actuality, it is trivial to infer the present possibility, and more reasonable to infer a past possibility as in the following exclamation after one’s friend has recovered from a serious disease: “It *was* possible for him to recover!” Thus even everyday speech understands the ambiguous character of trivial potency and tends to correct it by expressing it in the past tense. One can see how this matches Descartes’ radically abstract view of the piece of wax: boiled down to its ultimate substratum, the wax *was* capable of whatever determinations it has *now*. Put in another way, a trivial potency is discovered retrospectively and analytically without any need for a connection or a *logos*: if the event is happening *now*, then by necessity it *was* possible.

## 2. A temporal concept of potency.

The potency as a past state of affairs that is inferred from the present, this conception of potency in terms of temporality, however, conceals a distinction which

will be the object of Aristotle's next step: the distinction between modality and temporality. Hence, there is a sense of potency that is neither trivial nor temporal, and it is this modal concept of potency that will offer us access to *logos* as standard in its very inherence to the being at hand.

As we have said, if *logos* is an inherent standard, there must be a certain distance between the standard itself and that of which it is the standard. Here we are indeed using the words "distance" and "between" metaphorically, since the distinction we are after is not a spatial or positional one. In fact, temporal dimensions are much more promising than spatial ones. And the very discussion of potency arises from Aristotle's discussion of the PNC in the *On Interpretation*: Aristotle argues that positive and negative statements concerning the present and the past are necessarily either true or false.<sup>38</sup> This indeed follows from the PNC: if, according to the "exclusive PNC", it is impossible for an event to be and not be at the same time, and if the truth and falsity of a statement concerning the event depends on the event itself, then by necessity the statement will either hold true or be false. The same reasoning can be made with respect to what we called the "inclusive PNC": if it is possible for an event to be and not be at the same time *and in the same respect*, and if the truth of a statement depends on the event, then by necessity the statement will be either true or false. The PNC as an "ontological" principle extends into "logic", but also into "psychology", since "it is impossible for anyone to suppose the same to be and not be..."<sup>39</sup>

Now, according to Aristotle, statements concerning particulars in the future are *not* necessarily true or false. In order to prove this, Aristotle embarks upon a

*reductio ad absurdum* in chapter 9 of *On Interpretation* where he hypothesizes that statements concerning particulars in the future *are* necessarily true or false, in order then to derive a contradiction from the hypothesis. This hypothetical position is also known as necessitarianism: If it were true that contradictory statements concerning a future event, as well as present and past events, necessarily excluded each other, *until then* we would have to deny both its occurrence and its non-occurrence, “but it cannot be said that neither is true, for instance that it will neither be nor not be. For, first, while the affirmation is false, the negation is not true; and while the negation is false, the affirmation happens to be not true.”<sup>40</sup> According to necessitarianism, just as *now* it is either true or false that it rained *yesterday*, *now* it is either true or false that it will rain *tomorrow*. But then, is it now true that it will rain? No. Is it false? It is not false either. Both horns of the dilemma lead from the *present* denial of contradictory *future* events to the present assertion of contradictories: we are bound to affirm that it will rain (since it is not true that it will not rain) and that it will not rain (since it is not true that it will rain). This is the contradiction that allows Aristotle to infer the untenability of the necessitarian hypothesis:

“If it is true to say that it is white and black<sup>41</sup>, both must be; if both will be tomorrow, both will be tomorrow. If it will neither be nor not be tomorrow, there *would* be no contingency [*to hopoter’ etukhen*]; for instance, a sea-battle. For the sea-battle *would* have to neither happen nor not happen.”<sup>42</sup>

Under the necessitarian assumption, one cannot affirm the event of a future sea-battle, but one cannot deny it either; thus one must respectively deny and affirm its future occurrence.

One possible reply to Aristotle's objection against necessitarianism is an appeal to a view of events *sub species aeternitatis*. All events are necessary from the point of view of a spectator situated in eternity, just as the past is irrevocable for us: it is not true that a sea-battle *will* happen tomorrow, it is not false either, but simply it is neither true nor false *yet*. But this objection defers the problem: if one admits that one does not know whether the sea-battle will happen or not, how can one know that the eternal spectator *will* be right? Instead of asking whether the sea-battle *will* happen or not, here we are simply asking whether the prediction of the eternal spectator *will* turn out to be true or not. To ask whether the prediction that the sea-battle will happen will turn out to be true leads to infinite regress, the question "Will the battle happen?" turns into the following ones: "Will such and such a predication about the battle turn out to be true? Will the prediction that the predication will turn out to be true turn out to be true?" As long as we are confined to the options of mere being and mere non-being, to the options of necessary affirmation and negation, the denied affirmation will contradict the denied negation and we will hit upon a contradiction.

The contingency of future events immediately contaminates even the apparent necessity of the past and present state of affairs. Applied to the past and the present, the very same question takes the following form: "Could a sea-battle have happened yesterday?" or "Could a sea-battle have happened today?" Thus, contingency ends up affecting all three temporal dimensions of time. Although it appears most clearly in

relation to the future, contingency is not a dimension of time. The fact that a sea-battle happened, is happening or will happen, is strictly distinct from the possibility that it may not have happened, may not be happening or may not happen. In other words, Aristotle's argument is not intended to clarify a feature of the future distinguishing it from the past and present; the argument is rather intended to clarify contingency – which is not a dimension of time, but a modality. As modality, contingency may apply to all three dimensions of time.

“It is not necessary that all affirmation and negation of contraries be either true or false; for, the case for those that have the possibility of being and of not being is not the same as for those that are and are not.”<sup>43</sup>

As distinct both from trivial potency inferred retrospectively from a present actuality, and from a potency which is inferred retrospectively from an actuality seen *sub species aeternitatis*, potency presents a modal character. *Logos* as inherent standard will show itself neither in being as such nor in being at a certain time, but in being in a certain way. What way?

### 3. Motion.

The beings that exhibit the inherence of *logos* will be understandable not in terms of the option of being and non-being, but in terms both *being* and *having a*

*standard*. Their actual being will be the actuality of a particular potency. In a word, they will move:

“There is, on the one hand, that which is in being-at-work only, and that which is in potency *and* at-work... A distinction having been made with respect to each kind<sup>44</sup> between the being-at-work and the potency, motion is the being-at-work of that which is in potency as such.”<sup>45</sup>

Moving beings will exhibit *logos* as the very articulation of being-at-work *with* potency. The very end of the above definition of motion emphasizes that the point is to consider not being-at-work as such, but the being-at-work of that which is in potency *as such*. Unlike a *res extensa*, the moving being will be at-work; but, unlike a *res cogitans*, its potency will neither be a trivial potency nor a future being-at-work, but it will exhibit its potency *as potency*.

The inherence of *logos* then depends on, and will be exhibited by motion. But although we have seen examples of potency and distinguished its meanings, what is a potency? According to Aristotle’s remarkably compact definition, a potency is “the source of change in another or as another.”<sup>46</sup> What do these two options (“in another or as another”) mean? And which one is relevant to our case? To use Aristotle’s example, the potency of building a house is a source of change in another, in the material; similarly we already saw the bees’ potency for preparing wax. Here we understand that it is not the wax that we must focus on for finding the source of the process, for finding the *logos* of being, but *the bees*. By preparing wax for building

honeycombs and building them, it is *bees* that exhibit their way of being, what it is for them to be, their “*logos* of being”.

But there is an even more common and inclusive manifestation of potency, not as “a source of change *in* another”, but as “a source of change *as* another”. This latter means that the motion is produced not *in* another, but *in* the mover itself *as* another. The mover and the moved are no longer separate as in the case of bees and wax, they are precisely two ways of being inherent to one and the same being. It is here that being-at-work and potency finally coincide in the same being: the moving being that will exhibit the inherence of its standard of being will be the source of change in itself. That it has an *internal* standard, its *own* standard, will be apparent by its having an *inherent* source of motion.

Nature is such a source: “Nature is a source and cause of moving and resting in that which it is primarily by itself and not incidentally.”<sup>47</sup> What does this latter specification mean? To take Aristotle’s example, it means that a man may *happen to* be a doctor and heal himself, but the source we are looking for does not happen to be inherent, but *is inherent*. We are looking for a healing that does take place not because the healing being *happens to* be a doctor, but because of the very thing at hand. *Logos* will exhibit its inherence not only by any moving being, but by natural moving beings, because the latter contain within themselves the source of their motion, and not incidentally. This is the way we say that the living body *heals* itself, is at once, literally, the patient and the physician. It is because healing is a natural process exhibiting the *logos* of the being involved that Socrates’ death is a violation

of his *logos* of being. Thus, in our next two chapters we shall focus on natural motions for concrete manifestations of *logos* as an inherent standard.

#### 4. Action.

And yet, *On Interpretation* does not simply distinguish the modal concept of potency from the trivial and temporal ones, it also draws a crucial distinction within the modal concept of potency itself. Potency is not only at the basis of Aristotle's concept of motion and generation, but also of action and deliberation. Hence, if the function of rhetoric is "concerned with things about which we deliberate", and if "no one deliberates about things which cannot become, be or hold otherwise"<sup>48</sup>, rhetoric is used with respect to all dimensions of time; in fact, the kinds of rhetoric map onto the three dimensions of time: "a member of the assembly judges about things to come, the dicast about things past, and the spectator about the ability [of the speaker]; so that necessarily rhetorical *logoi* will be three in kind: deliberative, forensic and epideictic."<sup>49</sup>

Our reference to rhetoric here is in no way incidental. Aristotle himself supplies his *reductio ad absurdum* argument against necessitarianism with such empirical remarks: "... [if necessitarianism were true,] it would not be necessary neither to deliberate [*bouleuesthai*] nor to take pains [*pragmateuesthai*] by saying that 'if we will do so and so, then this will be; but if we will not do it, it will not be'."<sup>50</sup> In this last passage, there are two points especially worth noting: on the one hand, Aristotle refutes necessitarianism by stating that contingency exists by necessity.



Secondly, the empirical attestation of the necessary contingency is found in “deliberation” [*bouleuesthai*] and “taking care” [*pragmateuesthai*]. These two are repeated, with a slight but informative modification, in the very next paragraph: “We see that a source of that which will be depends also on deliberating and on some acting [*praxai ti*]...”<sup>51</sup> One can see that Aristotle here substitutes the earlier *pragmateuesthai* with *praxai*. Although the two are etymologically related, the meanings of *pragmateuesthai* can be roughly enumerated as follows: to busy oneself, to be engaged in business, to take in hand, to elaborate... *Praxai*, on the other hand, is the aorist infinitive of the broader verb *prassô*: to pass over, to accomplish, to effect an object, to make, to have to do, be busy with, to manage state affairs, take part in the government, to transact, to practice... In a word, Aristotle seems to have broadened the scope of what he takes to be a “source of that which will be” so as to include not only personal business, but interpersonal enterprises. The broad and politically oriented scope of *praxai* may well be reminiscent of our emphasis in our previous chapter on the word *pragma* as not simply meaning object or mere thing, but also act, deed, work, matter, affair, duty, business, a thing of consequence or importance.<sup>52</sup> In fact, Aristotle’s *Rhetoric* is one of the best texts for finding explicit uses of *pragma* as matter for public discussion.<sup>53</sup>

Acts, decisions and events can always be interpreted *sub species aeternitatis*. This is what early Ancient Greeks meant by *anagkê* and what we simply call “fate” or “destiny”. And yet this interpretation will always be flawed insofar as it will exclude the process of projection, anticipation, deliberation, hesitation, trial and error – in short, it will exclude the realm of things that could have been, could be and can be

*otherwise than they are.* One can always think of the future as that which will have happened, or as that about which what is claimed will turn out to be either true or false. And yet this interpretation presupposes what the “source of that which will be”, instead of explaining it. This is to conceal the distinction between the actual and the possible – whether in the future, past or present.

In conclusion, then, potency is a necessary concept for understanding *logos* as inherent standard because standard and fact are neither identical (as assumed in the trivial concept of potency) nor simply temporally successive (as assumed by necessitarianism). But further, potency grounds human action and deliberation for the very same reasons. It is curious that potency grounds both *logos* as inherent standard, and action. Is this a coincidence?

##### 5. Potency and *logos*.

“We see that a source of that which will be depends also on deliberating and on some acting, and that to be possible and not to be possible are in those that are not always at work, which do admit both being and not being, becoming and not becoming.”<sup>54</sup>

Aristotle clearly states his previous point about potency:

“On the one hand, both [contradictories] admit of happening; on the other hand, whenever one of them is, then the other will not be true. For at the same

time it has the potency of being and not-being. But if it necessarily is or is not, then both will not be possible.”<sup>55</sup>

What is needed is the simultaneous availability of both contraries.

“It also appears that not all that has the potency of being or walking have the contrary potency, but there are some for which this [i.e. not having both potencies] is not true: first, on the one hand, this [i.e. not having both potencies] applies to those that are possible not with respect to *logos*, for instance fire has the potency of heating and has a potency without *logos*; but, then, the potencies with *logos* are potencies of many and of opposites, whereas the ones without *logos* are not all like this; as we said, fire does not have the potency of heating and not heating; but those that are always at work do not have this either. However some that are in potency and are in accordance with potencies without *logos* have the opposite possibilities. But this is said for the sake of the following: not all potency involves opposites.”<sup>56</sup>

*Logos* is an inherent openness to opposite potencies.<sup>57</sup> However, there is something intriguing about Aristotle’s distinctions here: although all potencies with *logos* involve opposites, not all potencies involving opposites are with *logos*. And this is why the two distinctions do not match: Aristotle explicitly leaves room for potencies that, although without *logos*, do involve opposites. In other words, Aristotle does divide beings into those that admit opposite potencies and those that do not; this

divide, however, does not map onto the one between “rational” and “irrational” beings. Aristotle does not divide the world into spontaneously acting free rational beings and irrational beings bound up by necessity. Here, in *On Interpretation*, Aristotle simply mentions the existence of this grey area without giving any example.

This grey area also appears in an even more covert way in the famous discussion of potency in the *Metaphysics*: “All [potencies] with *logos* involve opposites, but those without *logos* involve one [of the opposites].”<sup>58</sup> This quotation and its context consistently generalize the fact that potencies with *logos* involve opposites by the adjective “all” (*pasa*), but do not do so for the claim that potencies without *logos* do *not* involve opposites. Does Aristotle have in mind the grey area more explicitly indicated in *On Interpretation*? It is hard to tell from the context of the *Metaphysics* and *On Interpretation*. We will return to this grey area between *alogos* and *logos* in our discussion of the human soul in Chapter V on the *Nicomachean Ethics*.

However, the discussion in the *Metaphysics* does not simply problematize the distinctions in *On Interpretation*, but also shed light on its context:

“Since some of these sources [i.e. potencies<sup>59</sup>] are inherent in beings with soul, some in ensouled beings and in the part of the soul that has *logos* [*tôî logon ekhonti*], it is clear that some of the possibilities will be without *logos*, and some with *logos*.”<sup>60</sup>

The context of the *Metaphysics* clearly points to something that was implicit in our discussion of *logos* from the beginning: considered either as an inherent standard holding on to the spatiotemporal manifold of the aspects of a being without letting one yield to the other, or as inherent openness to opposites as we saw in this chapter, *logos* will appear in motion in the realm of nature *and* in action in the context of human life and community.

### C. RECAPITULATION AND REORIENTATION.

In this chapter, we first problematized the conclusion of the previous one: How can we possibly justify that a certain *logos* is really inherent to a being? This questioning entailed a revision of our project. But by returning to Aristotle's own examples in the *Categories*, we gathered an attestation of an inherent standard precisely in its violation: that Socrates *dies* means that he no longer *does* or even undergoes or changes himself. *On Interpretation* allowed us to refine our understanding of *logos* as inherent standard: if a being is to have an inherent *logos*, it must hold on to potency in its very being-at-work. After distinguishing the modal concept of potency from trivial and temporal conceptions of potency, we inferred that "holding on to a potency while being-at-work" is nothing but a rough expression of Aristotle's concept of motion. So, *logos* will prove itself to be inherent if the sources of some motions prove themselves to be so. This shall be the topic of Chapters III and IV. *On Interpretation* also drew a distinction within the modal concept of potency itself: potencies with *logos* and those without *logos* – with an ambiguous grey area in between. The examples of the potencies with *logos* were taken from human action and deliberation. Thus *logos* will prove itself to be inherent if the source of actions prove themselves to be so. This is the topic of Chapters V and VI.

As to the overall project of our dissertation, until now we saw *logos* in the sense of inherent standard: a relation between the very being of a being (being-at-work) and its having a claim *for* its being (inherent potency), without letting one yield to or overtake the other.

Our question then is: how does *logos* exhibit its inherence in natural motions, and secondly, in action?

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<sup>1</sup> DK22B84.

<sup>2</sup> *Metaphysics*, IX, 3.

<sup>3</sup> *Metaphysics*, IX, 3, 1047a14-15.

<sup>4</sup> *On Interpretation*, 13, 23a21-22.

<sup>5</sup> For the logical modality characterizing this realm, see our section on the modality of dialectic in our Introduction.

<sup>6</sup> For the fragile sense of divinity *in* or *around* nature, see, most famously, *The Parts of Animals*, I, 5, 645a15-23, and *Metaphysics*, XII, 8, 1074b1-14.

<sup>7</sup> *History of Animals*, VIII, 40 et passim. For the intricacies of comb-building, see especially 623b27ff.

<sup>8</sup> See the pseudo-Aristotelian *Oeconomica*, I, 1, 1343a5-7: “Some of the arts are divided into two, producing (*poiêsai*) and using the product (*khresasthai toi poiêthenti*) do not belong to the same, just as the lyre and the flute...”

<sup>9</sup> *History of Animals*, VIII, 40, 623b27-28.

<sup>10</sup> See especially, Isaac Newton, *Principia*, tr. La Marquise du Châtelet (Paris: Dunod, 2005), pp. 296-297.

<sup>11</sup> Plato, *Phaedo*, 91c.

<sup>12</sup> *Nicomachean Ethics*, I, 6, 1096a13-18.

<sup>13</sup> René Descartes, *Méditations Métaphysiques*, “Meditatio Secunda” (Paris: Flammarion, 1979).

<sup>14</sup> René Descartes, *Méditations Métaphysiques*, “Meditatio Secunda” (Paris: Flammarion, 1979), p. 74.

<sup>15</sup> *Nicomachean Ethics*, VI, 2.

<sup>16</sup> One inevitably thinks of the opening sentences of the *Metaphysics*.

<sup>17</sup> Again we refer to the first chapter of *Metaphysics*, I.

<sup>18</sup> *Categories*, 1, 1a3, 1a8-12; 5, 2a16-18ff et passim.

<sup>19</sup> *Metaphysics*, I, 3, 983b14-15.

<sup>20</sup> See for instance Plato, *Symposium*, 214a.

<sup>21</sup> Plato, *Phaedo*, 117e-118a. See also Jacob Klein, *A Commentary of Plato's Meno*, (North Carolina: The University of North Carolina Press, 1965), p. 148.

<sup>22</sup> René Descartes, *Méditations Métaphysiques*, “Meditatio Secunda”, 29.11-18, (Paris: Flammarion, 1979), p. 82: “Remanetne adhuc eadem cera? Remanere fatendum est; nemo negat, nemo aliter putat.”

<sup>23</sup> Let us note that even here we have not departed from our implicit dialogue with Descartes. In the *Meditations*, one of the things that are explicitly bracketed is the concept of life. Similarly, the concept of soul (*anima*) as a principle of life is bracketed as unclear, and yields to the concept of mind (*mens*) which “distinct and clear” to itself: clear in its immediate self-grasping, and distinct from the body.

<sup>24</sup> Heraclitus, DK22B51. Quotations from Presocratics follow the Diels-Kranz edition. We are following Hippolytus in reading *homologeîn* (“agreeing”, “having the same *logos*”) instead of *xumpheretai* (“bring together), and *palintropos* (“backwards”). Kirk and Raven cite Hippolytus as “the fullest source” in the context of this fragment. (G. S. Kirk, J. E. Raven and M. Schofield, *The Presocratic Philosophers*, (Cambridge: Cambridge University Press, 1983) p. 192)

<sup>25</sup> *On Generation and Corruption*, II, 2, 329b7ff.

<sup>26</sup> *On Generation and Corruption*, II, 2, 330a25-29.

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- <sup>27</sup> *On Generation and Corruption*, II, 2, 330b3-8.
- <sup>28</sup> *On Generation and Corruption*, II, 5, 332a27-28.
- <sup>29</sup> *On Generation and Corruption*, II, 3, 330b31-33; *On the Heavens*, IV, 1, 308a14ff.
- <sup>30</sup> *On Generation and Corruption*, II, 3, 331a2-4.
- <sup>31</sup> See most famously, *Metaphysics*, XII, 3, 1070a10ff.
- <sup>32</sup> In this section, as well as in the rest of our dissertation, we shall make effort to translate *dynamis* and its cognates with “potency” and its variants, and *energeia* with “being-at-work”, and *entelekheia* with “being-at-work-staying-itself”. So when we use “possibility” or “actuality”, we are referring to post-Aristotelian and/or anti-Aristotelian concepts of *dynamis*, *energeia* and *entelekheia*.
- <sup>33</sup> *On Interpretation*, 13, 23a21-26.
- <sup>34</sup> *Metaphysics*, IX, 8.
- <sup>35</sup> *Metaphysics*, IX.
- <sup>36</sup> Of course, this central concept of Aristotelian philosophy is used and thematized in many parts of the corpus. See, most famously, *Metaphysics*, V, 12; *Metaphysics*, IX; *Physics*, III, 1-3.
- <sup>37</sup> *On Interpretation*, 13, 22b7-13.
- <sup>38</sup> Aristotle’s exception is affirmations or negations that are predicated of universals but *not universally*. Aristotle explained this at the end of chapter 8.
- <sup>39</sup> *Metaphysics*, IV, 3, 1005b23-25.
- <sup>40</sup> *On Interpretation*, 9, 18b17-20.
- <sup>41</sup> In some manuscripts the word “*melan*” (black) here appears as “*mega*” (big, large).
- <sup>42</sup> *On Interpretation*, 9, 18b20-25. Emphasis mine.
- <sup>43</sup> *On Interpretation*, 9, 19b1-4.
- <sup>44</sup> The “kinds” (*genê*) here are indeed the kinds of change. (*Physics*, III, 1, 200b33-34).
- <sup>45</sup> *Physics*, III, 1, 200b26-28 and 201a10-12; 28-30..
- <sup>46</sup> *Metaphysics*, IX, 1, 1046a11; V, 12.
- <sup>47</sup> *Physics*, II, 1, 192b21-23.
- <sup>48</sup> *Rhetoric*, I, 2, 1357a.
- <sup>49</sup> *Rhetoric*, I, 3, 1358b.
- <sup>50</sup> *On Interpretation*, 9, 18b31-33.
- <sup>51</sup> *On Interpretation*, 9, 19a7-9: “*horômen gar hoti estin arkhê tôn esomenôn kai apo tou bouleuesthai kai apo tou praxai ti...*”
- <sup>52</sup> See Chapter I, footnote 51.
- <sup>53</sup> The first chapters of the *Rhetoric* may be good examples for the usage of *pragmata* not as “object”, but as “issue”.
- <sup>54</sup> *On Interpretation*, 9, 19a7-11: “*horômen gar hoti estin arkhê tôn esomenôn kai apo tou bouleuesthai kai apo tou praxai ti, kai hoti holôs estin en tois mê aei energousi to dunaton einai kai mê, en hois amphô endekhetai kai to einai kai to mê einai, hôste kai to genesthai kai to mê genesthai.*”
- <sup>55</sup> *On Interpretation*, 13, 22b18-23.
- <sup>56</sup> *On Interpretation*, 13, 22b36-23a6.
- <sup>57</sup> See Ross’ Introduction in Aristotle, *Metaphysics* (Oxford: Clarendon, 1924), cxxvii.
- <sup>58</sup> *Metaphysics*, IX, 2, 1046b5-6.
- <sup>59</sup> These “sources” are clarified in the previous chapter: potency is defined as “a source of change in another or as another”. (*Metaphysics*, IX, 1, 1046a11-12)
- <sup>60</sup> *Metaphysics*, IX, 2, 1046a36-1046b3.



### III. NATURAL MOTION.

#### *LOGOS IN THE PHYSICS.*

“The soul has a *logos* that increases itself”.

Heraclitus<sup>1</sup>

How does the motion of a being exhibit the inherence of its *logos*?

We are still in the quest of an understanding of “*logos* of being” in the *Categories*. In our first chapter, we claimed that *logos* means standard; in our second chapter, we argued that this standard must be inherent and exhibit this inherence in the togetherness of actuality and potency, i.e. in internally motivated beings – natural beings. Thus we are led to Aristotle’s philosophy of nature. In this chapter, we pursue our investigation of the philosophical meanings of *logos* by questioning how *logos* exhibits its inherence in the difference and togetherness of actuality and inherent potency, in natural motions.

In three sections of this chapter, (A.) we argue for the notion of a “theoretical” natural scientist and of a correspondingly “spectacular” nature, then (B.) focus on organic beings, i.e. living beings, and their motions: growth and reproduction. These are two new instances of *logos*: the integration of matter into the “form according to *logos*” either within or outside of the living being’s body. But (C.) not all instances of *logos* integrate matter: sensation and locomotion will be the topic of our next chapter on animal life.

## A. THE NATURAL.

What can *logos* really have to do with nature?

“Nature loves to hide itself.”<sup>2</sup> When we are bitten by a dog or attacked by a crow, when an earthquake destroys houses and crushes thousands of lives, when we are struck by a virus, when we imagine a meteor hitting the Earth, it seems like all this happens amid the terrifying and yet essential ambient silence of the forces of nature. We may well speak about nature, translate, interpret or represent it, voice its claims and defend or subjugate it, but it seems that however much we try, we will always be the ones who lend our own voice to it, who discuss our own interpretation and understanding of it, who defend or reject, not nature’s own demands, but one another’s claim *about* that demand. Aristotle himself most famously proclaims: “Of animals, *only* human being possesses *logos*”.<sup>3</sup> This seems to be the dilemma of the human alienation from nature: either by dominating nature we control a servant indifferent to our command, or else we are subjected to a deaf master that cannot and does not even ask for our obedience. How can we ever approach nature *neither* as the compliant or resistant, but in any case blind, material of human undertakings, *nor* as the merciless and yet irrational avenger of our hubris?

*Logos* is said in many ways. This is obvious from its various translations: “reason”, “discourse”, “proportion”, “argument”, “relation”... But if there is anything common to the various meanings of *logos*, it may be that none is “natural”. We are not unfamiliar with a kind of reasoning according to which nature is fundamentally *alogos* unless *we* find a certain logic to it, unless *we* understand it, unless *we* give

form, voice and meaning to it. In fact, the specifically human vocation may well be thought to be this imposition of meaning on the meaningless. What then does it mean for us or for Aristotle to talk about not only an understanding of nature connected to *logos*, but even a definition of nature in terms of *logos*?

This chapter proposes to offer a solution to both of the questions above. In this chapter we work out two major meanings of *logos* in Aristotle's philosophy of nature: first, *logos* in Aristotle's definition of nature as "form according to *logos*" in *Physics*<sup>4</sup>, and secondly *logos* in his understanding of *organic* nature, i.e. living beings, as a *logos* of growth, in *On the Soul*<sup>5</sup>. We shall show how for Aristotle nature is defined in terms of *logos*, and argue that, according to him, natural beings stretch out to put up their own show and to express their "logic".<sup>6</sup> Before being the dull material of human manipulation or our sublime but mute retaliator, natural beings are essentially "spectacular". Accordingly the natural scientist is neither a voyeur watching nature through a keyhole, nor a crafty experimenter settled in a laboratory registering results. The natural scientist is rather a *theôros*, an envoy sent out of his city to consult an oracle<sup>7</sup>, to ask for a *logos* and to watch rituals, games, tragedies and then perhaps a comedy. Thus, we wish to awaken a sense of the natural scientist as a "theorist" and a listener in the sense that it corresponds to the "spectacular", vociferating character of natural beings.<sup>8</sup>

"In laws, legislators unduly forbid children from stretching and crying, because these are useful for growth since in this way a bodily exercise

happens; for holding breath produces strength against hardships, which is what happens to children when they stretch themselves.”<sup>9</sup>

In this chapter, we shall elaborate the above understanding of nature as stretching out in growth and crying out its growth, and the above attitude of the natural scientist as one that sees wide open mouths in nature, listens to this cry and lets this stretch be.

### 1. The definition of nature.

We must try to momentarily bracket dualities that set up nature against something else such as “human beings”, “history”, “culture” or “nurture”, simply because we do not find them in Aristotle.<sup>10</sup> For, according to Aristotle, nature itself is not a section of beings as opposed to another. Nature is not a *pragma*, it is not even an *on* or an *ousia* in the sense of *tode ti*.<sup>11</sup> To put it in terms foreign to Aristotle, nature is much less a being than the being of beings.<sup>12</sup> Nature is not the totality of natural beings, but precisely the logic that makes this equation useless. If nature appears at all, there is something “else” that appears “besides” nature. Perhaps this is the sense in which it “loves to hide itself”. “Every thing that has a nature is a being, since it is something that underlies, and nature is always *in* an underlying being.”<sup>13</sup> Then nature is never “alone”, never separated, isolated or even isolatable, never clear and distinct. Nature is always *in* something, is essentially the responsible *for* something (*aition*) or the source *of* something (*arkhê*).

This “*in*”, this “*for*” and this “*of*”, all three appear in the major Aristotelian definition of nature: “Nature is a source *of* and cause *for* being moved and coming to rest *in* that to which it belongs primarily...”<sup>14</sup> Nature is the source *of* and cause *for* motion that is *in* moving beings; natural beings, instead of together constituting the realm of nature, are *by* nature and *according to* nature: “*According to* nature [*kata physin*] are both these things [an underlying thing and a being] and as many things as belong to these in virtue of themselves, just as being carried up belongs to fire. For this is not a nature, nor does it have a nature, but is *by* nature [*physei*] and *according to* nature [*kata physin*].”<sup>15</sup> Aristotle systematically and emphatically distinguishes nature itself from natural beings or naturally oriented processes without suggesting that nature is apart and away from them. Whatever the true meaning of this distinction between nature and natural beings, Aristotle’s examples for the latter are: “animals and their parts, plants, and the simple bodies (like earth, fire, air, and water).”<sup>16</sup> Note that natural beings are inclusive of, but not limited to, animals and even ensouled beings (*empsykha*).

For nature is defined not in terms of life and soul, but in terms of motion and rest.<sup>17</sup> If it is possible at all to talk about *logos* in nature, we then must get a hold of Aristotle’s understanding of motion. Motion is not only one of the few central concepts in Aristotle’s philosophy, the Aristotelian concept of motion has been fundamentally modified, if not altogether rejected and abandoned, by early modern science. However counterintuitive it might seem, we must first clarify and undo both post-Aristotelian and post-anti-Aristotelian conceptions of motion.<sup>18</sup> But we cannot simply do away with them, we must understand how they are *post*-Aristotelian and

*post-anti-Aristotelian*. More exactly we must be able to have a sense of the historical sedimentation of the concept of motion in order to work our way through the early modern rejection of Aristotelian physics and cosmology towards that which they duly or unduly rejected. Since this is a task we cannot even claim to attempt in the context of our dissertation, what follows is a sketch of an attempt to undo four interconnected reductions made by early modern science precisely against the Aristotelianism of their time: (a.) the reduction of causality to material causation, (b.) the reduction of *hylê* to matter, (c.) the reduction of motion to locomotion, and (d.) the reduction of *kosmos* to infinite space.

## 2. Undoing physics.

Let us remind the reader that our intention here is in no way to sketch a history of physics or astronomy, but to highlight some features of the early modern scientific revolutions made by Copernicus, Galileo and Newton so as to get better access to Aristotle's understanding of nature as "a source of and cause for being moved".

a. The reduction of causality to material causation: To begin with, Aristotle's word for "cause", *aition*, comes from *aitia* which means "responsibility": it means "guilt, blame, charge, fault" in a bad sense, and in a good sense "credit" or even "reputation"<sup>19</sup>; *aitia* is also used in the sense of "case in dispute", and in the dative it means "for the sake of". The word *aitia* itself comes from the verb *aitiaomai* which

again highlights the pejorative: “to accuse”. In comparison to this semantic field, all mechanical cause-effect relationships appear anonymous, distanced, faceless, uninvolved, impersonal, irresponsible. *Aition* in Ancient Greek has clear ethical and legal connotations and brings to mind the idea of a definite agent who has committed a certain act, an agent who had an intention and who now has a certain face and a name.

The reason why *aition* in Ancient Greek appears much more human, ethical, legal, conscious or responsible than what we understand by the word “cause” is that early modern philosophy has precisely criticized, reduced and finally rejected these connotations. It is precisely by making the concept of “cause” less personal, less idiosyncratic, less capricious, less singular and less interested, and more impersonal, more “objective” and universal that early modern philosophers hoped to make causality a realm of better prediction and higher precision. Of the famous four kinds of causes in Aristotle (first *hylê*, secondly *protê arkhê kinêseôs*, thirdly *eidos* and fourthly *telos*<sup>20</sup>), only the first two are preserved. By reducing or rejecting *eidos* and *telos*, early modern physics deprives causality of the face it had and of the intention that may have subtended it.

b. The reduction of *hylê* to matter: But deprived of *eidos* and *telos*, both *hylê* and *arkhê kinêseôs* come to be fundamentally modified. For instance, although *hylê* did mean “stuff” already in Homer<sup>21</sup> and became a technical philosophical term precisely in Aristotle<sup>22</sup>, *hylê* has never been reducible to “stuff”, to “matter” or to the Latin “*materia*”. In Homer it meant less mere stuff than “the stuff of which a thing is

*made*”, i.e. a material *for* a chair, *of* a spear, a fire or a bird-nest.<sup>23</sup> This is why *hylê* more specifically meant a quite definite kind of material: “wood”, “timber” or “forest-trees” in a striking distinction from *dendra*, “fruit-trees”.<sup>24</sup> But *hylê* also came to mean something in direct opposition to timber-trees prepared for the carpenter: “copse”, “brushwood”, “undergrowth”. Finally, already in Homer again<sup>25</sup>, *hylê* meant “forest”.<sup>26</sup>

Just as the meaning of *aitia* grounds our conception of cause, but is importantly larger, more concrete and more personal, similarly *hylê* offers a wider range of senses than our concept of “matter”. For Aristotle “even *hylê* is a source”<sup>27</sup>, even *hylê* generates and governs beings, even *hylê* is responsible for some beings and their source just like nature is. Just as nature is responsible *for* something, *hylê* is material *for* something. As “undergrowth”, *hylê* is not indeterminate stuff, a pure *res extensa*, but is determined as falling short of the standard of growth because it is thought in terms of growth. *Hylê* is less *undergrowth* than *undergrowth*.<sup>28</sup>

In short, early modern physics understood matter deprived of *eidōs* and *telos* as homogenous. For Descartes, matter is *res extensa*; the *substantia* of his famous piece of wax is not an *undergrowth* at all, it does not have a face, it does not *grow* and is not to have any face itself, but rather, being receptive to *all* possible faces, is exposed to the inspection of the mind alone. Once reduced to matter and deprived of *eidōs* and *telos*, *hylê* is simply inspected without having any look to offer itself, and then shaped in any way the subject may choose. To use the terminology of Hobbes who literally follows the basic meaning of the Ancient Greek *eidōs* and the Latin



*species*, once reduced to matter by early modern philosophy and science, *hylê* offers no “visible shew”.<sup>29</sup>

c. The reduction of motion to locomotion: It is but reasonable that early modern physics understands motion as motion of this matter deprived of *eidos* and *telos*. And whereas we find four kinds of motion in Aristotle (change with respect to being, change of quality, change of quantity, and change with respect to place<sup>30</sup>), in early modern science we see that the reduction of causality and matter entails a reduction of these four kinds of motion:

i. First, deprived of *eidos* and *telos*, matter can no longer change with respect to being (*ousia*), since matter as the eternal underlying thing is neither generated nor perishable.<sup>31</sup> Although this idea had a immense history even before Aristotle, going back to the Atomists and perhaps to Parmenides, its posterity has proven even more fecund: the idea of the permanence of matter was extremely influential, *via* Lucretius, on early modern rationalism and materialism as well as on early modern physics, and even on the tenets of nascent thermodynamics and chemistry: “Nothing is created”, “An equal quantity of matter exists both before and after the experiment.”

ii. Secondly, this ingenerated and imperishable matter can further no longer change with respect to quality either since it is not and cannot be *informed*, but only shaped; in turn, this shape cannot form an intrinsic unity because,

being homogenous, its parts are indifferent to one another: there is no intrinsic difference between one cubical body and many bodies happening to *form* together a cube.

iii. The motion of a piece of matter cannot be a change with respect to quantity for the same reason: there is no intrinsic difference between a body of a certain magnitude and a certain number of different bodies adding up to the same magnitude. The only thing that counts for this body is its mass, but even so, there is no difference between a “body” weighing three kilos and three “bodies” weighing one kilo each. The difference that counts for early modern physics is the one between *one* body weighing three million tons and *one* weighing fifty kilos. But what does “one” mean in terms of the very object at hand? Qualitatively and quantitatively, the whole is nothing more than the sum of its parts – except our own externally imposed conceptions.

iv. Thus, no longer being generated or destroyed, no longer *really* changing with respect to quality or quantity, homogenous matter can only undergo a change with respect to place. And indeed, together with mass, early modern physics is based on “place”, *topos*. But although in fact Aristotle himself proclaims that change with respect to place is the most prominent kind of motion<sup>32</sup>, the early modern notion of “place” looks extremely different than Aristotelian *topos*<sup>33</sup>; for it is not “measured” according to itself, but with

respect to its distance to other “places” which are in fact no more “measured” according to themselves. Finally then we must turn to the reduction of *topos*.

d. The reduction of *kosmos* to infinite space: Early modern physics, and especially the Cartesian coordinate system, substitute the Aristotelian concept of “place”<sup>34</sup> with “position” or “location”, because here “places” are no longer contained within a finite universe (*to pan*) having a certain order (*kosmos*)<sup>35</sup>; all “places” are instead distributed throughout an infinite environment (an oxymoron) and thus are determined only relatively, that is, with respect to other positions.<sup>36</sup> Position and location are truly adequate terms that are to be contrasted with the Ancient Greek *topos* and the Latin *locus* in so far as the former two emphasize the subjective activity of *locating*, *positing* according to its own relative *locatedness* or *positedness*.

Thus, as motion is reduced to locomotion in early modern science, the *loci* of this locomotion also are leveled down to homogeneity. Hence, assuming that there is no gravitational force, a moving body would move indefinitely in the same direction *simply because it is already moving in that direction*; if it is unmoved, it will stay at the same place *simply because it is already there*. In either case, matter has no intrinsic “preference” or inherent claim with respect to its position, location or direction.<sup>37</sup> Just as a body is not intrinsically related to its own parts, it is also indifferent to its environment; homogenous matter moves in a homogenous environment with no “center”, no “periphery”, no “up”, no “down” and no “threshold”. This infinite environment of matter in motion is indeed not a universe or

an “all” (*to pan*) in the sense of a finite and ordered whole (*kosmos*)<sup>38</sup>, but is something that is by definition never an “all”. Thus such an environment is altogether foreign to Aristotelian physics and is designated with a term that has no equivalent there: “space”.

Then if we are to understand motion in Aristotle and thereby find an answer to our question, i.e. the inherence of *logos* in natural motion, we must recall a sense of *aition* as a “responsible” having a certain look (*eidos*) and being motivated by an “intention” (*telos*), we must think of *hylê* as having a certain “directionality” as *undergrowth*. Thus we must see motion and change not as the transitory external modifications of an intrinsically homogenous eternal underlying matter, but as something happening *to* something, something suffering *under* something<sup>39</sup>, and even something done *by* something *to* itself; we must reinstate mortality, earthliness and finitude in the Aristotelian sublunar nature, which are absent from the early modern understanding of nature; finally, we must picture a differentiated, multiple and heterogeneous universe where bodies are in places *not* simply *because* they are there, where bodies are *not* absent from places simply *because* they are *not* there. As prefigured in our previous chapter, we shall see a sense of “stretch” and “tension” become more and more concrete in this chapter, and more and more diverse in the following ones.

For Aristotle, nature as *aition* or *arkhê* is then not an initial push or stimulation, it is comparable to a stretch that from the end (*telos*) of a process reaches back to its beginning and spreads throughout the change; matter is stretched out

toward the mature, multiple and settled life of a forest, fire is stretched away from the center of the universe towards its place. In short, what we must keep in mind is a sense of inherent stretch and strife that pervades nature. There is one idea that is precisely rejected by early modern physics and key for Aristotelian physics: “Place has some power”.<sup>40</sup>

### 3. Everyday “physics”.

Following what may be called the typical Aristotelian directive, if we start with what is clear to us in order to proceed toward what is clearer by nature<sup>41</sup>, we may ask: What is clear to us in the context of causality, matter, motion and spatiality? Perhaps dismantling the early modern reductions brings us less to an even more remote and exotic era of history than to what is already clear to us as living beings and involved human agents. Perhaps as *theôroi* who have left our town, each and every day we *are* in touch with an experiential sense of motion that lies beneath the way motion *may be* measured and calculated from a third person perspective. Indeed, scientific technical concepts such as cause, motion, matter, mass and space, have been historically derived from more concrete human experiences, as can be seen from their etymology, and yet this means that becoming aware of these formalizations and abstractions does not simply lead us further away from our time back to the primitive and prescientific, but rather that such an awareness brings us critically back to our concrete human experience.

What then is our experiential sense of causality, matter, motion and spatiality? We are beings who cause change in the world and that move all our life or necessarily assuming to be doing so. When we move around or cause changes in the world, we very often do so with a certain purpose in mind. When we ask a question such as “Why is the coffeemaker in the bathroom?”, the kind of explanation we expect is *not*: “Because it has been put there.” Such an answer is redundant and uninformative; it is not an answer and hence it would be immediately followed by another question: “Who put it there? Why?” In this process of asking, we are after neither an account of the beginning of motion in the universe as a whole, nor the very last proximate force that finally pushed the coffeemaker to where it is now; rather, we are after the “whole point” that we assume to be subtending the situation, we are trying to see the face of the disfigured situation, we are trying to shed light on a shadow.

Thus, we can keep asking questions, and as long as the answers we get give us more proximate causes of motion, we will be unsatisfied.<sup>42</sup> Our dissatisfaction is due not to the quantitative lack of answers since we may well be given numerous precise answers, but to the *kind* of answers we are getting. In fact, if our interlocutor is expounding on the respective positions of the coffeemaker in space, we are getting some explanation, but no account or justification, no *cause*. We expect neither tautologies (“That’s the way it is”) nor approximate causes (“It is made that way”). In the latter two cases, we would perhaps even suspect our interlocutor of reticence or hypocrisy. When asking about the cause of the coffeemaker’s being in the bathroom, we are looking not for another cause than the ones we are getting, but for another *kind* of cause.

What we are after in our question is the final or formal cause (*telos* or *eidos*); what our reticent interlocutor keeps giving, however, is an impoverished version of the Aristotelian *arkhê kinêseôs*.<sup>43</sup> According to the typical Aristotelian directive, since we must start from our clear sense of causality within everyday life, since in fact we *do* start from the sense of causality that we are already acquainted with<sup>44</sup>, we must also make ourselves aware of the sense of motion and place that prevail in our everyday experience: it is evident that if one is acquainted with a coffeemaker and knows what a bathroom is, one will see the coffeemaker in the bathroom as *out of place*. This is evident from the words we are using: a word like “bathroom” does not supply us spatial coordinates, it does not designate an indefinite anonymous *Raum* or space, neither is it a certain space *plus* certain objects such as a faucet, a tub, towels, nor even is it a certain space *plus* objects *plus* a certain order... One can see how the latter lead to infinite regress or asymptotical approximation, and to that extent are rather a failure to explain. A “bathroom” is precisely a room *for* something, obviously *for* taking a bath. It is the activity of taking a bath that first gives all the previous details a unified aspect or look, because it supplies the connections between them, it provides the lines of force between them, it connects the points that turn out *not* to be points, it sheds light on them no longer as loose objects that have happened to fall together, but as stretched toward one another all along. Thus, the *eidos* or *telos* is not “news”. Understanding the activity of taking a bath sheds light on the bathroom not as a powerful projector would turn and spot objects in darkness, it sheds light on the bathroom as the opening of curtains would reveal an orchestrated show with all the multiple actors and factors it involves. While “out of place”, the coffeemaker is

almost caught red-handed; there it does not have a show, it is not part of that show, but of another: to “make coffee”.<sup>45</sup>

This “experiential logic” of everyday life provides not only conceptions of motion, spatiality and causality that are very akin to what we find in Aristotle’s *Physics*, but also foreshadows the most formal parts of the Aristotelian corpus, namely his syllogistic. For, the connection of the disparate elements of our everyday understanding of a bathroom, the “stretch” between the objects, corresponds to the Aristotelian “middle term” (*to meson*)<sup>46</sup>; and while an unacquainted view of the bathroom roughly corresponds to the dogmatic-sounding, immediate universal statement “Towels and shampoo stay in the bathroom”, our everyday implicit understanding is mediated: “Towels and shampoo are used for *taking a bath*, and *we take baths* in the bathroom, and *that’s why* they stay in the bathroom.”

#### 4. Nature as being-at-work.

Aristotle attempts to view causality and motion “from within”<sup>47</sup>: here cause looks less like an external stimulus or a push than like a “responsible”; places look less like locations with definable coordinates than like homes, hives, nests, territories, rooms, hideouts, yards, roads, detours and resting points; motion looks less like a happening, incidence or occurrence, than an activity, a business, or even an undertaking. This is exactly reflected in the way we would say in English: “What is the coffeemaker *doing* in the bathroom?” To draw from the senses of *pragmateuesthai* mentioned in our previous two chapters, motion takes the form of



concern, labor and care. Hence, for Aristotle motion is grounded on the idea of work (*ergon*) and of an end of that work (*telos*). If Aristotle defines nature in terms of motion, he defines motion in terms of *energeia* or of *entelekheia*: “motion is the *entelekheia* of that which is in potency just as such.”<sup>48</sup>

We are not unaware that natural beings fundamentally differ from artifacts like coffeemakers, and that natural places differ from human space. However one must not exaggerate this difference; in fact, Aristotle emphasizes the parallelism between nature and art than their mutual exclusiveness:

“Each being comes to be from a synonym – natural beings as well as the others; for a being is generated either by art, by nature, by fortune or by chance. Then art is a source in another whereas nature is a source in [the being] itself...”<sup>49</sup>

Unlike the coffeemaker, the source of motion in natural beings is inherent to them. Natural beings move not only because of something they have yet to acquire, but because of something they already have. For Aristotle, natural beings are never objects any more than artifacts are, if by objects we mean unrelated neutral entities; natural phenomena are never facts any more than human action and production are, if by fact we mean an occurrence seen from a third person perspective. Perhaps now have we a better inkling for the way Aristotle understands nature as an inherent source of motion and *logos* as an inherent standard. If so, we can move on and follow Aristotle refining the kind of “inherent source” he takes nature to be.

After defining nature as a source or cause of motion and rest in that to which it belongs primarily<sup>50</sup>, in the famous opening chapter of *Physics*, II, Aristotle first takes up the view of nature as the “first underlying *hylê*”.<sup>51</sup> According to this view, nature is that to which a being boils down. Aristotle exhibits Antiphon’s argument that wood is the nature of a bed, because wood remains even after it loses its shape as a bed. Note how similar this argument is to Descartes’ wax example: just as the *substantia* of the wax was some indeterminate eternal stuff underlying transient sensory aspects, Antiphon takes nature to be an unarranged (*arrythmiston*<sup>52</sup>) underlying being that remains continuous (*diamenei... synekhôs*<sup>53</sup>) and eternal (*aidion*<sup>54</sup>) beneath momentary attributes or affections, conditions and dispositions (*pathê... kai hekseis kai diatheseis*<sup>55</sup>). What Antiphon and Descartes abstract is their own interest in the experiment: wood cannot be the essence of bed for a viewer who is about to sleep, and extension cannot be the essence of the piece of wax for bees. Both experiment and both displace things in their experiment and thus fail to watch what nature may show. Whereas Descartes claims that man is “*maître et possesseur de la nature*”, Aristotle claims:

“If we call wisdom the knowledge of our own interests, there will be many wisdoms, for there will not be one goodness for all animals, but one for each, if there is no one medicine dealing with all beings. If human being is the best of all animals, this makes no difference, for there are many other things that are more divine than human being, for instance, the most apparent one, those out of which the *kosmos* is composed.”<sup>56</sup>

Thus if “*logos* of being” is inherent to the being at hand, if it truly is what it is *for that being* to be, proof of this will be provided by motion, by natural motion, i.e. by motions whose motive forces relies within the moving being.

### 5. *Logos* and nature.

Hence to Antiphon’s account of nature as *hylê* Aristotle responds in the following way: “What is potentially flesh or bone does not yet have its own nature...”<sup>57</sup> What Aristotle does here is to reverse Antiphon’s (and Descartes’) perspective: that which *can* be anything is something that is *not* according to nature; seen as something unarranged that *can* be arranged in any way, the buried bed is indeed not natural. Aristotle seems to invite Antiphon to watch the spectacle a little bit longer: in fact, when the bed is buried, it turns not into indeterminate stuff; having lost the “shape” (*skhêma*<sup>58</sup>), it does not return to disorder, but precisely to another order, its *own* order, its inherent determination, its *eidōs kata ton logon*. Now we can read the whole sentence we partly quoted above:

“What is potentially flesh or bone does not yet have its own nature, until it takes the *eidōs kata ton logon* – that by means of which, in defining, we say what flesh or bone is; and [what is potentially flesh or bone] is not according to nature.”<sup>59</sup>

When the bed is buried and starts to sprout, what happens is that it takes up its own true face, it shows its real look (*eidos*), it puts up its own show instead of that imposed by the carpenter. Buried, it is destroyed only in the eyes of one who needs a bed; seen from within, from the perspective of its inherent *logos*, it is not destroyed, but rather allowed to be on its own, to put on its own show and become “spectacular”. It sprouts and stretches out toward the look of an oak. Even further, it is less the wood that now reaches ahead to the look of an oak, than it is the show of the oak that is at last allowed to stretch back toward to *hylê* and take hold of the undergrowth: “What, then, is it that grows? Not the from-which, but the to-which.”<sup>60</sup> This “tension” starting from the to-which back to the from-which is indeed the link that keeps apart and holds together potency and *energeia*. Instead of burying the bed like Antiphon or burning the piece of wax like Descartes, instead of first stripping beings down or displacing them, Aristotle in a way makes himself a *theôros* by displacing *himself* in order to consult nature, to ask for a *logos*, to watch the spectacle of nature. Aristotle lets natural beings do what they do, look the way they look, show what they have to show. “Just as teachers think they deliver up the end when they have exhibited a student at work, so too is nature.”<sup>61</sup>

To recapitulate, for Aristotle nature is an inherent source of motion – inherent not in the way the unarranged (*arrythmiston*) lies beneath *rhythmos*, or in the way the faceless disorder lies deep beneath superficial order, but inherent as a face waiting to be allowed to appear, as a show waiting for patience, interest, attention and silence from the audience. We add “... and some silence” because just as natural beings are spectacular, their show is not a pantomime, but the articulation of their proper logic,

the expression of what it is *for them* to be. Their face is “the *logos* of what it is for it to be”.<sup>62</sup> It is in this sense that the *inherently* motivated motions of natural beings, most notably growth, attest that which we have been looking for since the beginning of this dissertation: the “*logos* of being”, an intrinsic relation between potency and being-at-work, a genuine claim concerning being coming from the very being at hand, a true standard of being, i.e. an inherent standard.

\*

Out of the four basic meanings of *logos* distinguished in Bonitz’ *Index Aristotelicum*<sup>63</sup>, namely “standard, essence, form”, “proportion”, “reason” and “discourse or language”, we have now come to understand the first one and accounted for its inherence: *logos* as standard.

## B. THE ORGANIC.

Nature then does not exclude *logos* at all, at least in the sense of inherent standard, essence or form: natural beings are characterized by being stretched between mere being and their *logos* as what it is *for them* to be. If it is true that *logos* is inherent and that it is the expression of what it is for natural beings to be, then the meaning of *logos* would not be restricted to “reason”, “discourse” or “ratio” as strictly subjective. Would this natural *logos* be derivative of the *logos* in reason, language and logic? Would the show of natural beings be a ventriloquy, an imposition of our structures of thinking and of living onto nature? In short, how is this first, natural, meaning of *logos* related to the others which seem to be “subjective”?

But, as we suggested, Aristotle’s “logic”, and even the most formal part of it, his syllogistic, seem to be inspired by and derived from the forms according to *logos* in nature: if Aristotelian syllogistic minimally requires one universal premise and one affirmative premise<sup>64</sup>, and if universal predication requires a universal term<sup>65</sup>, these universal and affirmative premises seem to be the result of the *theôria* of the positive regularities in nature: the spectacle of the revolution of stars, the periodical changes of season and weather, the cycles of migration, wind, rain and snow, the growth and reproduction of plants and animals, and the show of the oak that spouts from the buried bed and thus returns to its origin like all acorns.

And yet there is another sense of *logos* that does not apply to the whole range of nature as “standard”. Some natural beings put up a show in a different way and are stretched in a different way than natural beings as a whole. For instance, fire is

certainly a natural being<sup>66</sup>, it is inherently motivated upward or centrifugal motion<sup>67</sup> and has its “place” in the first from last sphere of the universe.<sup>68</sup> And yet, although it has its own *logos* as holding onto *the* hot and *the* dry without letting one yield to or overtake the other, fire is exemplary of beings that are deprived of *logos* in some sense we must now illuminate:

“But to some the nature of fire seems simply to be the cause of nutrition and growth, for it alone of all bodies and elements appears to be nourished and grow; hence one may suppose that this is that which works [*to ergazomenon*] in plants and animals; but it is somehow a concomitant cause, but the cause is not simply [fire]... for the growth of fire is indefinite [*apeiron*] as long as there is something to be burned, whereas of all things composed by nature there is a limit [*peras*] and *logos* of magnitude and growth.”<sup>69</sup>

While fire served us previously as a good example for showing how the Aristotelian concept of locomotion and place differs from early modern notions, something else is going on here: *logos* is said in many ways, and fire has *logos* in one sense, but it does not in another sense. It is “stretched” away from the center of the universe, its *topos*, unlike the early modern concept of matter, and it is “stretched” between *the* hot and *the* dry. But it simply keeps on “stretching” however big or small it is. Although fire is *not* indifferent to its place in the universe but tends away from the center, fire *is* indifferent to its magnitude.

## 1. The soul as *eidōs*.

Fire and nature in general then do not necessarily illustrate *logos* in the sense of a limit of magnitude and growth. What is it that has a “*logos* of magnitude and growth”? Aristotle’s answer is the soul: “But these [limit and *logos*] are of the soul, and not of fire; [they are] of *logos* more than of *hylê*.”<sup>70</sup>

What then does Aristotle mean by soul? After exhibiting, criticizing and synthesizing the views of his predecessors in the first book of *On The Soul*, Aristotle elaborates his own definition of the soul in several steps in the first chapter of Book II. Let us interpret his first sketch as we quote (the text is difficult to translate, thus we expect to be allowed inelegant and ambiguous constructions; the Ancient Greek text is provided in the endnotes):

“One class of those that are, we call being; but of [being], one as *hylê* (which in its own right is not *tode ti*), another as *morphê* and *eidōs* (directly as a result of which something is called *tode ti*), and third that [which comes to be?] out of them.”<sup>71</sup>

This is not new to us who have seen that, insofar as they are *tode ti*, i.e. individual beings that lend themselves to direct perception, even natural beings, are “compound” (*to ek toutôn*); this “*ek toutôn*”, as we also have seen, should be understood not as a “com-position” or “syn-thesis” in the etymological sense of putting *hylê* and *eidōs*



side by side, because such juxtaposition would be precisely missing the point: the inherent stretch between *hylê* and *eidos*. Aristotle continues:

“Now *hylê* is potency and *eidos* is *entelekheia*, and this [*eidos*<sup>72</sup>] in two ways: as knowledge or as contemplating.”<sup>73</sup>

It is all too well known that, for Aristotle, *hylê* and *eidos* map on to potency and *entelekheia*. But this sentence contains a new and crucial distinction: *eidos* or *entelekheia* is either in the way knowledge is or in the way contemplating happens. Aristotle here allows for a mode of *eidos* that is unlike the full being-at-work of contemplation – in a way we must clarify. Aristotle does not dwell on this distinction, and continues:

“Bodies seem to be beings preeminently, and among these the natural ones. For these are the sources of the others. But some natural beings have life, some do not. We are calling life self-nourishing as well as growth and wasting away.”<sup>74</sup>

Then, not all natural beings have a share in life, i.e. in self-nourishing as well as (*te kai*) in growth and wasting away. Then, one characteristic of living beings is their self-nourishing.<sup>75</sup>

“So that every natural body having a share in life would be a being, but being as compound. Since [a living natural body] is such and such a body, the soul would not be body. For the body is not *tôn kath’ hypokeimenou*, but rather as *hypokeimenon* and *hylê*.”<sup>76</sup>

Aristotle seems to think: if life is characterized by self-nourishing and growth, then all living beings must have a body because self-nourishing and growth obviously require and involve a body; but since not all bodies nourish themselves and grow, then all living natural bodies must have “something more”, and this is the soul. If the body is that which is *said* to be living and not the other way around, then body would correspond to *hylê* of the compound, and soul to the *eidos*: “Therefore it is necessary that the soul is being as *eidos* of a natural body having life in potency.”<sup>77</sup>

At first glance, this convoluted piece of reasoning seems less to give us information about the soul, than to impose a meaning to it: the soul is life, and soul as life is the *eidos* of a body already having life in potency. Bodies that have life in potency look a certain way, perform a certain work, put up a certain show. And the soul or living is that show. What is this show? “Self-nourishing as well as growth and wasting away.” To say the least, this first and “most comprehensive”<sup>78</sup> definition of the soul is so worldly and bodily that it immediately disappoints and exasperates any reader assuming the soul to be something aloof, disincarnated and otherworldly. Eating is a sufficient condition for having a soul and a sufficient enactment of it.<sup>79</sup> If we are at first disappointed by this minimal enactment, it is perhaps not only because

we “overestimate” the value of the soul, but because we “underestimate” the significance of nutrition.

This “definition” of the soul, however, does not help us distinguish the natural beings that have a share in life from those that do not. Soul is defined as an *eidos*, but so was nature.<sup>80</sup> Self-nutrition, the work minimally required for having life, may well be interpreted as a change with respect to quantity originating from the being itself. Since we saw that, for Aristotle, fire grows as much as trees and animals do, how are the latter ensouled bodies distinct from the soulless former? Since elements can turn into one another<sup>81</sup>, why cannot we say that, when rain falls, water is growing, just as we say that a watered plant does? Don’t we feed fire as we feed our pets? How are the shows of nature as a whole and of the living any different? Don’t each exhibit their inherent logic? Why did Aristotle suggest that the growth of fire has no limit and *logos*?<sup>82</sup>

## 2. The soul as *entelekheia*.

Aristotle does not call the account of the soul we read above a “definition” (*horos*, *horismos* or *logos*); despite the presence of the “therefore” (*ara*), it does not finish anything; it is rather the first step of his dialectical reasoning in this first chapter of Book Two. In this first step, what we learned is that soul and life and self-nourishing are coextensive. Aristotle continues:

“Therefore it is necessary that the soul is being as *eidōs* of a natural body having life in potency. But being is *entelekheia*; therefore [the soul is] the *entelekheia* of such a body [i.e. a natural body having life in potency]. But *entelekheia* is said in two ways: first as knowledge, and then as contemplating. Thus it is clear that [the *entelekheia* characterizing the soul] is as knowledge.”<sup>83</sup>

This point about *entelekheia* was already made in the context of *eidōs*.<sup>84</sup> This point that here seems redundant is in fact the central insight to life and the major way in which the show and logic of life and soul is distinct from the spectacle of nature. Let us follow Aristotle’s recurrent example: the way the soul is the *entelekheia* or *eidōs* of the body is similar to having knowledge as distinct from the contemplation of that which one knows. To say that one *knows* Latin does not require that one speaks, writes, reads, studies and thinks about Latin all the time. On the contrary, to *know* Latin is to be able to *stop* putting to use one’s acquisition, to have “internalized” or “digested” it. Latin is indeed an interesting example in the context of soul and *life*, because Latin is precisely a *dead* language: that a language is dead does not mean that no one in the world ever actually writes, reads, speaks, understands and studies it; what it means is that no body is able to *stop* putting their knowledge of Latin to use without immediately starting to lose it. Learning dead languages is often comparable to the labor of Sisyphus: how ever much one puts it to use, it does not quite stick, but rather regresses as oblivious as a rock rolling back to the center of the universe. People quite often have to learn dead languages over and over again. Generating a

sentence in a dead language is like building a castle out of dry sand, and its maintenance is like the constant anxiety of keeping a pyramid of play cards straight. On the other hand, learning a living language leaves one enough room, energy and time for playing with it, distorting it, being creative with it, or even forgetting about it. Knowing a living language is thus similar to life: if it slumbers, this does not mean that it is dead, it means its alive. Hence, in explaining the kind of *entelekheia* and *eidos* that characterize the soul Aristotle interestingly explains his example of knowledge and contemplation with yet another example he takes precisely from the realm of the soul: sleep and waking. Waking and contemplating are similarly distinct from sleep and “dormant” knowledge.

Aristotle is *not* simply using his classical distinction between potency and being-at-work: it is *not* true that knowledge of a language and sleep are states of mere potency and privation, because the requirements for sleep or the possession of some knowledge are results of prior preparation, products of long and hard work. Only knowing beings can contemplate, only sleeping beings wake up, only immature beings can ripen. Or else we are meaning something different by these words: if fire or a rock contemplates at all, it contemplates without ever having known; its awakeness does not emerge out of, and fall back into sleep; it is ever complete (*telês*) without having matured at all. To speak the same – inadequate – language, fire is fixated in its contemplation, it is a narcoleptic, it is a grown up child or an adult who has not lived a childhood. Indeed a rock can be big, but not ripe; there are small pebbles, but no immature ones.

This is why Aristotle suggested, as we quoted above, that the growth and magnitude of fire has no limit or *logos*: being a natural body, the locomotion of fire has a definite inherent directionality away from the center of the universe<sup>85</sup>; but if the fire has a regularly recognizable “look” (*eidos*), its pointy shape is determined not by its growth into a *telos*, but by its inherent locomotion just as the spherical shape of the earth; the shape of fire is rather a byproduct of its natural upward impulse; hence, once it reaches that sphere of the universe, it no longer has the same shape.<sup>86</sup> The ensouled, on the other hand, presents a growth and completion we do not find in all nature, an instantiation of *logos* beyond the stretch between factual being and inherent standard. Not that the soul is more complete than nature; in fact, one might say that fire is *too* complete to have a soul.

This completion that distinguishes the soul from nature in general is then the achievement of an “unachieved” state. There is an important sense in which ensouled beings are completely “incomplete”. Beyond the fire’s stretch out toward the completion of what it is for it to be, the soul is stretched between the completion of its *past* development and its *future* exercise of vital function. The show of the soul is the show both of a “look” toward the past (its preparedness) and a “look” toward the future (performance). The soul is characterized by being *ready*.

This is perhaps why, while nature in general was akin to *logos* as “form according to *logos*”<sup>87</sup>, the soul is also “a being according to *logos*”.<sup>88</sup> The *entelekheia* that characterizes the soul then requires a state of growth between potency and *entelekheia* as such. The soul is either a second potency, or as Aristotle puts it

immediately after his example of knowledge and contemplation, “the first *entelekheia* of a physical body having life in potency”.<sup>89</sup>

### 3. The organic.

By being the “first *entelekheia* of a natural body having life in potency”, the soul is a detour between mere potency and *entelekheia*; what distinguishes the show of the soul from that of natural beings is that ensouled bodies precisely put this very detour “on stage”. Ensouled bodies exhibit their soul or complete “incompleteness” by the way its body has life in potency: while the immediacy between the potency and *energeia* of fire is reflected in the indifferent identity of its parts, the intermediate state of the soul is reflected in their interrelated differences. They are neither fused with one another nor indifferent to one another, but exhibit at once an achievement taken one by one and a project of cooperation; they are not at-work (*energeiai*), but as yet for-a-work. Fire *does* its work; soul *has* (*ekhein*) a work.

This is why, on the one hand, watching the spectacle of fire is somewhat similar to watching a chess game: by missing the beginning of the show, one no less understands it than one who has followed the game from the beginning and is no less excited by it. On the other hand, the show of living beings is rather comparable to a thriller: missing the first scene where the murder is committed, or the last scene where the murderer is revealed, or misunderstanding the development that leads to the revelation – this is *not* to have really seen the movie. The parts of the life of the ensouled being are spectacularly complete and “incomplete”.<sup>90</sup>

As the soul is thus determined by *ergon* as much as by *energeia* pure and simple, the parts of the body of the ensouled being are characterized by having a work (*ekhein ergon*), and the Ancient Greek adjective for having a work is *organikon*: “The soul is the first *entelekheia* of a physical body having life in potency – but such will be any body that is organic.”<sup>91</sup> The wholeness of fire does not come out of its working parts; its pointy top, its bright body, its sparkles, its flames are not qualitatively differentiated for a work, they are equally and similarly determined by the upward motion of fire as such. It is no coincidence that the word “pyramid” comes from the Ancient Greek *pyr*, “fire”, for a pyramid is precisely a shape determined by its upward orientation. The natural determination of fire does not offer a stage of relative indetermination such that it may then determine itself.

Let us emphasize this remarkable and surprising claim: for Aristotle, the soul does not show itself beyond the body; the soul does not show itself simply in every part of the body taken in isolation; it rather shows itself in the body *as a whole*: “The parts of the plants are organs too, though altogether simple ones; for instance, the leaf is the covering for the peel, and the peel for the fruit, while the roots are similar to the mouth, for both take in food.”<sup>92</sup> To find the soul of living beings, Aristotle looks at their parts. The stretch that characterizes the soul in its “look” toward the past (preparedness) and the future (performance) is seen in the way the parts of a living body is at once developed wholes and purposeful parts. To see the soul is to “understand how that which is disrupted has the same *logos* as itself: a back-turning harmony as in the bow and the lyre”.<sup>93</sup>



That Aristotle considers the parts of an organic body as developed wholes can be seen from the fact that he takes the parts to be exemplary of the things that exist by nature as much as whole animals.<sup>94</sup> That he deems the parts of animals as prepared together in order to put up a show or to exhibit a *logos* may be why *Parts of Animals* contains so many fundamental insights into his understanding on nature and life. For instance the following:

“... one should not recoil childishly from the examination of the humbler animals. For in every realm of natural beings there is something wonderful. And as Heraclitus, when strangers who wanted to meet him saw him warming himself at the furnace and stopped, is said to have demanded them not to be afraid to come in as even there the divine was present, so should one go on to study each animal without distaste as in every being there is something natural and beautiful.”<sup>95</sup>

Then, as distinct from mere nature as such, living beings will also exhibit a meaning of *logos* other than “inherent standard”: they will do so by the way in which their parts have work, i.e. are organized.

#### 4. Nutrition.

What is the work of the soul, what is it that in view of which organs are arranged? What is *logos* here *logos* of – since it is not “*logos* of being” pure and

simple? Just as, according to Aristotle, the magnitude and growth of fire lacks limit and *logos*<sup>96</sup>, the first “logic” of the soul will show itself in an inherently motivated motion and rest with respect to quantity – i.e. in growth. Yet another view Aristotle seems to share with Heraclitus: “the soul has a *logos* that increases itself”.<sup>97</sup>

Since the organic being is determined not by a percentage of raw elements, but by its irreducibility to any collection of elements, its self-nourishing and growth are not reducible to the reception and accumulation of one or several elements:

“Empedocles has not spoken in a beautiful way in adding to this that growth happens to plants when they take root downward because earth moves that way by nature, and when [they spread] upward because fire moves that way... what is it that holds the fire and earth together when they move in opposite directions? For, if there is nothing to prevent this, they will be torn apart; and if there is [something to prevent this], it is the soul and it is the cause of growth and feeding.”<sup>98</sup>

The growth of organic bodies cannot be reduced to an accumulation of elements according to *any* percentage, since although a percentage is an account of the respective amounts of the ingredient, no percentage accounts for the very fact of their togetherness, i.e. for the very stretch that characterizes a vigorous body: “for [plants] do not grow up and not down, but equally in both directions, and in every direction.”<sup>99</sup> Within a living body, this inclusiveness of contrary directions (up *and* down) comes from the inclusiveness of different elements (fire *and* earth). Plants do

not *fall* not as *plants* but precisely as *earth*. Nutrition then is a processing and informing as much as an undergoing or receiving. If eating involves the disintegration of a being's *eidos* into its elements, it also requires the subsequent reintegration of the elements in the *eidos* of the living being. It is not sufficient to say that nutrition is a reception of a being's *hylê* without its *eidos*; nutrition is no more reception than digestion, i.e. no more an accumulative process than the formative (or reformative) process of bringing together the formerly contrary elements within the new *eidos*.<sup>100</sup>

It may be necessary to illustrate Aristotle's conception of nutrition by stating what would *not* count as nutrition, since beings such as us humans that have other powers of the soul necessarily modify nutrition according to those other powers (hunting, tasting, gastronomy, fasting, feasting, snack, diet...) and thus are susceptible of concealing it. For instance, in English "emptiness" and "fullness" are precisely inadequate concepts for expressing nutrition, because the absence of matter in the body is by itself insufficient for explaining hunger and thirst, just as its mere introduction is for nutrition.

The growth of no plant ever requires water *as such*, precisely because a plant is *not* water; watering a plant rather takes a certain form precisely because a plant *is* a certain form. Similarly, taking a medicine involves a specific mode of delivery of chemicals, an exact amount, a certain diet, a certain timing, a rhythm of sleep and ultimately a certain *form* of life. Adding water to water, flesh to flesh, blood to blood, hair to hair, is precisely failure to nourish. Similarly, merely mixing water to earth, blood to flesh or olive oil to hair is the same failure to nourish as long as the quantity of mixture alone is considered. Nutrition is not a transition from emptiness to

fullness, it is not a delivery of matter, it is a specific answer to a specific question, a small-scale rebirth of a whole form of life. Digestion is not becoming full, but preparing matter, integrating it: “cooking” or “concocting” (*pepsis*).<sup>101</sup>

A new logic, a new *logos* and a new kind of “stretch” thus emerges with nutrition: whereas natural beings are inherently motivated to hold on to what they are *and* what it is for them to be (*logos* as “standard”), here living beings do so by holding on to contrary elements according to what it is to be for themselves. It is precisely because living beings hold together the elements to their own *eidos* that contrary elements coexist within living bodies instead of one knocking down the other. This is the second sense of *logos*: proportion, ratio, percentage. But just as we did with *logos* as “standard”, here too we must try to understand this second sense of *logos* from within Aristotelian texts.

Besides, doesn’t Aristotle himself object to Empedocles’ theory that the soul is a *logos* or harmony in Book I?<sup>102</sup>

“They say that harmony is a blend [*krâsis*] or *synthesis* of contraries and that the body is composed of contraries. However, harmony is some *logos* of those that have been mixed [*tôn mikthentôn*] or a composition [*synthesis*], and the soul cannot be of these.”<sup>103</sup>

When Aristotle articulates his criticism, his object is clear: for him the soul cannot be a harmony understood as blend (*krâsis*) or composition (*synthesis*) – a “*logos* of those that have been mixed (*tôn mikthentôn*)”, or “*logos* of those that are mixed (*tôn*

*memigmenôn*)”.<sup>104</sup> And in the following paragraph he insists that the soul cannot be the “*logos* of mixture” (*logos tês mixeôds*).<sup>105</sup> Aristotle’s claim is that if the soul were a harmony or *logos* of mixture, in short, a percentage, then there would be many souls each time there is a new percentage of elements in the body, for “the mixture of elements for flesh and for bone do not have the same *logos*”.<sup>106</sup> Aristotle is arguing here against the idea that the soul is a *logos* of mixture.<sup>107</sup> If soul has to do with *logos*, this will not be a number or percentage, because, however precise and many, ratios of ingredients will not account for their unity, for the “stretch” between them, for what makes them one show.

The *logos* of growth is not proportion of ingredients: “The *logoi* of mixtures are in the relation [*prothesei*] of numbers, and not in numbers, for instance three in relation to two [*tria pros duo*] and not three times two.”<sup>108</sup> This explains how Aristotle can explicitly agree with Empedocles in the opening book of the *Metaphysics*: “Even Empedocles says that the bone is by virtue of *logos* – which is ‘what it is to be’ and the being of the thing.”<sup>109</sup> If life and nutrition stretch out to exhibit a *logos*, this show is understandable *neither* by means of its elements *nor* by their proportion. If *logos* here means “ratio” or “proportion”, we must keep in mind the fact that it is so not as a number, but as a relation between numbers, i.e. as holding on to its different constituents and their magnitude without letting one take over the other or lay indifferent to them. Hence this sense of *logos* is perhaps better rendered by the word “relation” (*pros ti*) or even “arrangement” than “ratio” or “percentage” of a certain amount of different elements. “For a tragedy and a comedy come into being out of the same letters.”<sup>110</sup>

## 5. Reproduction.

In this last sentence, *On Generation and Corruption* may be providing us a clear attestation of the spectacular character of nature and life in Aristotle's philosophy; the same text also explicitly identifies the work of the natural scientist as *theôrein* in the sense of watching: for those who argue that all change happens between like beings and those who argue that it happens between unlike beings, "the cause of their opposition is that, while it is necessary to watch (*theôrêsai*) a whole, they happened to express a part."<sup>111</sup>

Both in the case of nutrition and of reproduction, an ensouled being strives for the perpetuation of itself or of its "look" (*eidōs*) by integrating contrary *eidê*. What reproduction teaches us is that, just like an adequate understanding of nutrition requires that we consider the parts of animals (the elements contained in them) not as starting points, but as products<sup>112</sup>, we can be spectators of the show of living beings only when we take account not of one arbitrarily chosen segment of their life, but of their life as a whole. In other words, the squirrel indeed exhibits its own logic, i.e. what it is for a squirrel to be, not in its tail or claws taken as ends in themselves, but as *incomplete* completions, as organs; in the same way, a squirrel shows off what it is for a squirrel to be along a lapse of time and events that stretch beyond its maturity, even before its birth and after its death. The *eidōs* of a squirrel comes to appearance neither in the parts of its body nor in those of its lifespan taken by themselves: just as

its claws relate back to its spine, its climbing a tree refers back to its birth and nutrition and forward to its project of reproduction.

Natural beings exhibit their show and logic not in the way objects around us seem to be constantly available to our look, but in the way a war or an artwork comes into existence: the date of the birth and death of a squirrel, and even everything in between, can be recorded, but *its life* extends even beyond its life and death, and demands a spectator and a scientist that in fact mimic the historian and art critic who are patient enough to tolerate the indeterminacy of the improbable influences and fortuitous circumstances that end up having a major contribution to the creation, execution and posterity of an artwork or to the inception of a war, to its battles, strategies and consequences.

But *On the Soul*, which does not expound on nutrition, seems to leave the topic of reproduction to *Generation of Animals* – except in the following crucial passage:

“... we must talk about food and reproduction; for the nutritive soul belongs to the others as well [to living beings other than humans], and is first and most common potency of the soul in virtue of which living belongs to them all. The works [of the soul] are reproduction and the use of food, for the most natural work for living beings, if it is full-grown and not defective or does not have spontaneous generation, is to make another like itself: an animal making an animal, a plant a plant, so that they may partake (*metekhôsin*) in the eternal

and divine in the way they can. For all things desire (*oregetai*) that, and do everything they do by nature for the sake of it.”<sup>113</sup>

Thus, reproduction as the integration of the living being’s form into the material of another body, and nutrition as the integration of the material of another body into one’s own form are two facets of the same most natural work: *oregesthai* for partaking in the eternal and the divine. Aristotle is quite explicit that the most natural appearance of life takes the form of *oregesthai* – whose first meaning is “to reach out” and “to stretch out for”. Until now we used “stretch” as a metaphor in our dissertation; but here *oregesthai* literally means “to stretch”, and only metaphorically “to yearn for” or “to desire”<sup>114</sup>:

“Every artist loves its own work more than it would be loved by the work if it were ensouled. Perhaps this happens especially in the case of poets, for these loves their poems excessively, being attached to them as to their children... The reason of this is that all things desire and love to be; and it is at-work, in living and acting, that we *are*; and, being at work, the maker is in a way the work; so he loves the work and thereby loves to be.”<sup>115</sup>

We have showed that the spectacular character of natural beings and the spectatorship of the natural scientist are textually grounded in Aristotle’s work. Here we see that *On the Soul* supports our claim that natural beings are not simply “programmed” to exhibit their logic, but that they stretch out for this. As to the



natural scientist or the *theôros*, the explicit textual confirmation of his own natural *oregesthai* for watching this show of natural beings is found not in *On the Soul*, but in the first sentence of the *Metaphysics*: “All human beings by nature stretch themselves out toward having seen”.<sup>116</sup>

### C. RECAPITULATION AND REORIENTATION.

So far as this chapter is concerned, we have seen how Aristotle's understanding of nature demands a conception of motion that is at once very foreign to us because of the early modern rejection of the Aristotelian physics of their time, but also quite familiar to us insofar as it lacks the abstractions and technicalities of modern sciences: Aristotle's concepts of motion and, consequently, of nature are fundamentally "spectacular", oriented toward the appearance of an *eidos* and the articulation of a *logos*. And hence the natural scientist for Aristotle is a spectator, an explorer, a traveler, a *theôros* with a question, with an openness for the improbable show of natural beings. This pervasiveness of watching, of exhibition and expression of *logos* may suggest that it is because natural and organic beings stretch out toward showing *themselves* that "nature loves to hide itself".<sup>117</sup>

As to our overall project, we have first seen that the *inherence* of the *logos* as "standard" is warranted by the *inherently* motivated motions in nature. Secondly, in the life of the soul, we have seen that the growth and reproduction of living beings are made according to *logos* as "proportion": *logos* as holding onto previously contrary elements within the body, in the case of nutrition, or within another body, in the case of reproduction. One can see that the two senses of *logos*, "standard" and "proportion" are not simply unrelated: they both refer to a relation that holds on to its terms (potency and being-at-work in the first case, and contrary elements in the second) without letting one take over or lay indifferent to the other.

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Living beings are then minimally determined by two natural motions: nutrition and reproduction. Of Aristotle's four kinds of motion, the latter are change with respect to being and change with respect to quantity. What about the other two motions: change with respect to quality and place? Aristotle himself seems to almost contradict our claim that plants as ensouled bodies integrate contrary elements, in that he says that plants are of earth (*gês*)<sup>118</sup> and that they have no mean condition (*mesotêta*).<sup>119</sup> The plants' accomplishment of integrating and reforming *hylê* is also their limitation: plants have "no source of such a kind as to receive the *eidê* of sensibles – they absorb them together with their *hylê*."<sup>120</sup> Thus, our investigation of nature and life in Aristotle leads us to natural changes with respect to quality and to place. These two natural motions correspond to sensation and locomotion. Their show and their *logos* are even more explicit than elements and plants. These beings change and move in new ways. These beings are animals.

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<sup>1</sup> DK22B115.

<sup>2</sup> Heraclitus, DK22B123.

<sup>3</sup> *Politics*, I, 1, 1253a10-11. Emphasis is ours.

<sup>4</sup> *Physics*, II, 1, 193a31, 193b3.

<sup>5</sup> *On the Soul*, II, 4, 416a10ff.

<sup>6</sup> This point is expressed, although not developed in Sparshott, Francis, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 44.

<sup>7</sup> One clear instance of this meaning of *theôros* is found in *King Oepidus* when Oedipus asks where Laius was killed. Creon answers that he was *theôros*, "went to consult the oracle". (v. 114)

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<sup>8</sup> Aristotle clearly calls physics (*physikê*) an *epistêmê theôrêtikê*. (*Metaphysics*, VI, 1, 1025b27.) See *Eudemian Ethics*, I, 5, 1216b11ff; *Parts of Animals*, I, 5, 645a8-11, the whole passage puts clear emphasis on the “theoretical” aspects of natural science. But also compare *Parts of Animals*, I, 1, 640a1ff.

<sup>9</sup> *Politics*, VII, 15, 1336a34-39.

<sup>10</sup> That *physis* is less determinable and yet perhaps wider than our concept of “nature” can be seen in its uses in early Greek thinkers such as Heraclitus and Empedocles. It is true that medieval and modern philosophy has thought in terms of dualities that set up nature against history, production, spirit, nurture, culture, divinity, etc. (See Martin Heidegger, *On the Essence and Concept of Physis in Aristotle’s Physics B*, 1, tr. Thomas Sheehan, in *Pathmarks* (Cambridge: Cambridge University Press, 1998), pp. 183-185.) Aristotle does admit that there is at least one other *aition* or *arkhê* of coming-to-be. (*Physics*, II, 1, 192b8-9: “For beings, some are *physei*, some are through another cause...”.) And Aristotle does name these *aitia* or *arkhai* in the *Metaphysics*: “After these, that each being (*ousia*) comes to be from a synonym [i.e., something whose name and *logos tês ousias* is common] – natural beings (*ta... physei ousiai*) and the others; for [a being] is generated by art (*tekhnêi*), by nature (*physei*), by fortune (*tykhêi*) or by chance (*automatôi*). Then art is a source (*arkhê*) in another whereas nature is a source in [the being] itself (for a human being begets a human being), and the other causes (*aitiai*) are privation of these.” (*Metaphysics*, XII, 3, 1070a4-9)

One can see that, although *tekhnê* is named as a source of generation besides nature, its opposition to nature is much less emphatic than their structural parallelism (see also *Parts of Animals*, I, 1, 639b15-30): Aristotle’s main point remains that *ousia* is generated from a synonym – whether the source of generation is outside of it (*tekhnê*) or inside it (nature). In the *Physics* again, he insists that *tekhnê* imitates nature and that, just like it is obviously absurd to think to the *hylê* without any *eidos*, this is because it is equally absurd to think of nature as mere *hylê* as Empedocles and Democritus have. (*Physics*, II, 2, 194a19-28) But even this explicit subordination of *tekhnê* to nature has been questioned: some have claimed that Aristotle in fact tailors nature on the model of *tekhnê*. The reverse might be defended as well – but not in the context of our dissertation.

<sup>11</sup> “That which comes from these [*morphê* and *eidos kata ton logon*], such as a human being, is not *physis*, but *physei*.” (*Physics*, II, 1, 193b6-7)

<sup>12</sup> “According to nature are both these and as many things as belong to these in virtue of themselves, as being carried up belongs to fire. For this is not a nature (*touto gar physis men ouk estin*), nor does it have a nature (*oud’ ekhei physin*), but it is by nature (*physei*) and according to nature (*kata physin*).” (*Physics*, II, 1, 192b35-193a2)

<sup>13</sup> *Physics*, II, 1, 192b33-34. Emphasis is ours. For Aristotle analysis of “being-in”, see *Physics*, IV, 3.

<sup>14</sup> *Physics*, II, 1, 192b21-23. Emphasis is ours.

<sup>15</sup> *Physics*, II, 1, 192b35-193a2. Emphases are ours.

<sup>16</sup> *Physics*, II, 1, 192b9-11.

<sup>17</sup> Since we cannot presuppose any concept of motion without plunging into the later books of the *Physics*, we cannot justifiably decide here whether Aristotle thinks nature in terms of motion or motion in terms of nature. Although the latter question is thought-provoking and productive in terms of the relations between Aristotelian physics and early modern physics, we cannot but limit ourselves here to clarify some aspects of the genealogy of later – modern – concept of motion in order to undo it and open the access to that against which it is established.

<sup>18</sup> It is thought-provoking to note that, although we claim in this chapter that Aristotelian physics can be accessed by a dismantling of modern physics, some claim the opposite: it is the Aristotelian physics that constitute “the physics of commonsense”. See Jean Rosmorduc, *Histoire de la physique et de la chimie*, (Paris: Seuil, 1985), cited in *Histoire des sciences*, ed. Philippe de la Cotardière (Paris: Tallandier, 2004), p. 111n5.

<sup>19</sup> See the “*aitia*” article in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

<sup>20</sup> *Physics*, II, 3; *Metaphysics*, V, 2.

<sup>21</sup> Homer, *Odyssey*, V, 257.

<sup>22</sup> See the “*hylê*” article in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

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<sup>23</sup> See the “*hylê*” article in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

<sup>24</sup> One explicit example of this usage of *hylê* is even found in *On Generation and Corruption*, I, 10, 327b12.

<sup>25</sup> Homer, *Iliad*, XI, 115; *Odyssey*, XVII, 316.

<sup>26</sup> See the “*hylê*” article in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

<sup>27</sup> *Metaphysics*, IX, 1, 1046a24.

<sup>28</sup> “In the context of nature, [one must consider] the composite and the whole *ousia*, and not that which never occurs apart from their *ousia*.” (*Parts of Animals*, I, 5, 645a35-37)

<sup>29</sup> Thomas Hobbes, *Leviathan*, (New York: Penguin, 1968), p. 86.

<sup>30</sup> *Physics*, III, 1, 200b33-34. These four kinds of motion, in turn, are derived from the categories that do admit of being otherwise. (*Metaphysics*, XI, 12; *Physics*, V, 2) One can see here why Aristotle spends so much time discussing whether a given category admits of contraries in the *Categories*. (For instance *Categories*, 5, 4a10-4b19; 6, 5b11-6a18; 7, 6b15-26) One can also see that the paradigm shift in early modern physics has its roots in a paradigm shift in metaphysics.

<sup>31</sup> Again, the idea that matter is not generated and does not perish is found in, and fundamental to Aristotelian metaphysics and physics. See *Generation and Corruption*, I, 4, 320a2 and *Metaphysics*, VII, 7, 1032a17. For Aristotle’s discussion of such theories, see *Metaphysics*, I, 3-4 and *Physics*, II, 2-4.

<sup>32</sup> *Physics*, IV, 14, 223b21-22; VII, 2, 243a11; VIII, 7.

<sup>33</sup> See, for instance, *On the Soul*, III, 9-11.

<sup>34</sup> *Physics*, IV, 4.

<sup>35</sup> *Physics*, IV, 5, 212b16-17: “Besides the all and whole (*pan kai holon*), there is nothing outside of the all.” We must point out here the informative etymology of *kosmos* which makes the word “cosmetics” intelligible: *kosmos* means order in a strong sense, both physically and almost aesthetically. This sense of *kosmos* is by no means obsolete at the time of Aristotle. See for instance *Meteorology*, I, 1 338a23, and other instances of *kosmos*, *kosmopoia*, *diakosmein*, *diakosmêsis*, *kosmein*, *kosmêsis*, etc. in Bonitz’ *Index Aristotelicum*, (Graz: Akademische Druck und Verlagsanstalt, 1955).

<sup>36</sup> Compare *Physics*, IV, 5, 212b20-24: “The earth is in the water, and the water is in the air, and the air is in the aether, and the aether is in the heaven, but the heaven is no longer in anything else.”

<sup>37</sup> One can see here the early modern breakdown of the Aristotelian distinction between natural motion and forced motion. See for instance *On the Heavens*, I, 2, 269a7.

<sup>38</sup> *Physics*, IV, 5.

<sup>39</sup> For the meanings of *pathos* and *pathein*, see *Metaphysics*, V, 21.

<sup>40</sup> *Physics*, IV, 1, 208b10-11. Descartes ironically claims that the essence of bodies is extension precisely as he understands space as *partes extra partes*: if space is defined by the mutual exclusiveness of its parts, what does it mean to say that a body is defined by its occupying various parts of space at once? What prevents the subject from thinking that the parts of the body are as mutually exclusive as the parts of Cartesian space?

<sup>41</sup> See *Physics*, 184a16-22, *Nicomachean Ethics*, 1095b1-5, *Metaphysics*, 1029b3-12, *et al.*

<sup>42</sup> This example, although unelegant, shows how Aristotle objection to infinite regress in physical causation (*Physics*) and in demonstration (*Posterior Analytics*) are the two sides of the same problem. Under the Zenonian hypothesis, just as the arrow never touches its target, demonstration and explanation never come to closure.

<sup>43</sup> It is indeed an *impoverished* version of it, because the source of motion that is a kind of cause for Aristotle is the *first* source of motion (*protê arkhê kinêseôs* or *metabolês*) and certainly not the immediate source such as a moving hand.

<sup>44</sup> *Posterior Analytics*, I, 1, 71a1ff: “All teaching and intellectual (*dianoêtikê*) learning comes to be out of preexistent acquaintance (*ek proiïparkhousês... gnôseôs*)...”

<sup>45</sup> One objection may be that in different cultures houses and objects are organized in different ways. But this in fact is not an objection, because our point here is not that all houses have bathrooms and all bathrooms are organized a certain way that excluded coffeemakers. Our point is not that human

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places are organized *in this or that way* and by means of *this or that object*, but precisely that human places are *organized*. And it is only as *organized* places that different spatialities in different cultures comes to be apparent in their very difference.

<sup>46</sup> See especially, *Posterior Analytics*, II, 2, 3.

<sup>47</sup> “It is ridiculous to judge from outside.” (*On Breath*, 9, 485b4)

<sup>48</sup> *Physics*, III, 1, 201a11-12. This is why it is not easily decidable whether Aristotle sees *physis* through the lenses of motion or motion through the lenses of living work.

<sup>49</sup> *Metaphysics*, XII, 3, 1070a4-8.

<sup>50</sup> *Physics*, II, 1, 192b21-24.

<sup>51</sup> *Physics*, II, 1, 193a28-29.

<sup>52</sup> *Physics*, II, 1, 193a12.

<sup>53</sup> *Physics*, II, 1, 193a17.

<sup>54</sup> *Physics*, II, 1, 193a26.

<sup>55</sup> *Physics*, II, 1, 193a25-26.

<sup>56</sup> *Nicomachean Ethics*, VI, 7, 1141a30-1141b3; *Politics*, I, 1, 1253a32-38.

<sup>57</sup> *Physics*, II, 1, 193b1-2.

<sup>58</sup> *Physics*, II, 1, 193b9.

<sup>59</sup> *Physics*, II, 1, 193b1-4.

<sup>60</sup> *Physics*, II, 1, 193b18-19. Here I am following Joe Sachs’ translation in Aristotle, *Physics* (New Brunswick: Rutgers University Press, 1995).

<sup>61</sup> *Metaphysics*, IX, 8, 1050a18-19.

<sup>62</sup> *Physics*, II, 3, 194b27-28; *Categories*, 1, 1a5, 11.

<sup>63</sup> Hermann Bonitz, *Index Aristotelicum* (Graz: Akademische Druck und Verlagsanstalt, 1955), pp. 433-437.

<sup>64</sup> *Prior Analytics*, I, 24, 41b7-8.

<sup>65</sup> *On Interpretation*, 7.

<sup>66</sup> *Physics*, II, 1, 192b11, 36.

<sup>67</sup> *On the Heavens*, I, 8, 277a12-277b9.

<sup>68</sup> *Physics*, IV, 4; IV, 5; *Meteorology*, I, 3, 340b24-341a9; I, 4, 341b13-24.

<sup>69</sup> *On the Soul*, II, 4, 416a10-18. “Fire exhibits differences with respect to more and less.” (*On Breath*, 9, 485b18.)

<sup>70</sup> *On the Soul*, II, 4, 416a19. See also the un-Aristotelian *On Breath*, 9, 485b7-10: “The arts use [fire] as an instrument (*organôî*), nature [uses it] also as *hylê*. Indeed this is not a difficulty (*khalepon*), [the difficulty lies] rather in the fact that nature, which uses [the fire], itself thinks (*noêsai*), also providing at the same time the *rhythmos* to sensible affections (*hêtis hama tois aisthêtois pathesi kai ton rhythmon apodôsei*.)” It is unclear to us why W. S. Hett translates as “capable of assigning to objects their proper form, as well as sensible affections.” (Aristotle, *On the Soul, Parva Naturalia, On Breath*, tr. W. S. Hett, (Cambridge: Harvard University Press, 1957) p. 513.)

<sup>71</sup> *On the Soul*, II, 1, 412a6-9: “*legomen dê genos hen ti tôn ontôn tèn ousian, tautês de to men hôs hylên, ho kath’ hauto men ouk esti tode ti, heteron de morphên kai eidos, kath’ hên êdê legetai tode ti, kai triton to ek toutôn.*”

<sup>72</sup> The text is “*to d’ eidos entelekheia, kai touto dikhôs, to men... to de...*”, thus the antecedent of *touto* and the following two *to*’s is *to eidos* and not *entelekheia* – which is feminine. A little bit later Aristotle will make the point with respect to *entelekheia*: “*toioutou ara sômatos entelekheia. Hautê de legetai dikhôs, hê men... hê de...*” (*On the Soul*, I, 1, 412a22-24)

<sup>73</sup> *On the Soul*, II, 1, 412a9-11: “*esti d’ hê men hylê dynamis, to d’ eidos entelekheia, kai touto dikhôs, to men hôs episteme, to d’ hôs theôrein.*”

<sup>74</sup> *On the Soul*, II, 1, 412a11-15: “*ousiai de malist’ einai dokousi ta sômata, kai toutôn ta physika. Tauta gar tôn allôn arkhai. Tôn de physikôn ta men ekhei zôên, ta d’ ouk ekhei. Zôên de legomen tèn di’ autou trophên te kai auxêsin kai phthisin.*”

<sup>75</sup> Later in this second book of *On the Soul*, Aristotle implies that there is an exception to this requirement: “This [potency to absorb food] can exist apart from the others, but the others cannot [exist apart] from this *in mortal beings*.” (*On the Soul*, II, 2, 413a31-33) Emphasis is ours. See also the famous passage about the immortal and everlasting in book three. (*On the Soul*, III, 5, 430a23)

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<sup>76</sup> *On the Soul*, II, 1, 412a15-20: “*hôte pan sôma physikon metekhôn zôês ousia an eiê, ousia d’ houtôs hôs synthetê. Epei d’ esti soma toionde, zôên gar ekhôn, ouk an eiê to soma psykhê. Ou gar esti tôn kath’ hypokeimenou to soma, mallon d’ hôs hypokeimenon kai hylê.*”

<sup>77</sup> *On the Soul*, II, 1, 412a20-22.

<sup>78</sup> *On the Soul*, II, 1, 412a6.

<sup>79</sup> See also *Parts of Animals*, II, 10, 655b32-33.

<sup>80</sup> *Physics*, II, 1, 193a31, 193b2.

<sup>81</sup> *On Generation and Corruption*, II, 1, 329b1.

<sup>82</sup> *On the Soul*, II, 4, 416a10-18.

<sup>83</sup> *On the Soul*, II, 1, 412a20-24.

<sup>84</sup> *On the Soul*, II, 1, 412a10-11.

<sup>85</sup> *On Generation and Corruption*, II, 3, 330b33.

<sup>86</sup> For the relation between the locomotion and shape of fiery beings in the sublunar sphere, see *Meteorology*, I, 4.

<sup>87</sup> *Physics*, II, 1, 193a31, 193b3.

<sup>88</sup> *On the Soul*, II, 1, 412b11.

<sup>89</sup> *On the Soul*, II, 1, 412a28-29.

<sup>90</sup> *Metaphysics*, VII, 16, 1040b5ff.

<sup>91</sup> *On the Soul*, II, 1, 412a29-412b1. We are well aware that we have skipped one step in this development from basic properties to elements, and from elements to organs: the distinction between uniform and non-uniform parts. (See for instance *Parts of Animals*, II, 2ff.) We allow ourselves this because the introduction of this distinction does not contribute to our main goal: to understand the inherence of *logos* first in nature as such, and now, more specifically, in living beings.

<sup>92</sup> *On the Soul*, II, 1, 412b1-4.

<sup>93</sup> Heraclitus, DK22B51. Quotations from Presocratics follow the Diels-Kranz edition. We are following Hippolytus in reading *homologeîn* (“agreeing”, “having the same *logos*”) instead of *xumpheretai* (“bring together), and *palintropos* (“backwards”). Kirk and Raven cite Hippolytus as “the fullest source” in the context of this fragment. (G. S. Kirk, J. E. Raven and M. Schofield, *The Presocratic Philosophers*, (Cambridge: Cambridge University Press, 1983) p. 192)

<sup>94</sup> *Physics*, II, 1, 192b9.

<sup>95</sup> *Parts of Animals*, I, 5, 645a14-22.

<sup>96</sup> *On the Soul*, II, 4, 416a10-11..

<sup>97</sup> DK22B115.

<sup>98</sup> *On the Soul*, II, 4, 415b28-416a9.

<sup>99</sup> *On the Soul*, II, 2, 413a28-29.

<sup>100</sup> *Metaphysics*, VII, 16, 1040b5-16.

<sup>101</sup> For the relation, or almost identity, between concocting, digestion and growth and even maturing, see *Generation of Animals*, I, 1, 715b24; II, 6, 743a31ff; I, 12, 719a34.

<sup>102</sup> *On the Soul*, I, 4; *Parts of Animals*, I, 1, 621a138-144. For the genesis of the Aristotelian idea that the soul is a harmony, see Werner Jaeger, *Aristotle: Fundamentals of the History of His Development*, tr. Richard Robinson (Oxford: Clarendon, 1950), p. 39ff.

<sup>103</sup> *On the Soul*, I, 4, 407b30-34. It is not entirely clear whether *toutôn* refers to “*logos* and *synthesis*” or is an apposition to “*tôn mikthentôn*”. This will not affect our argument, since we will argue that if the soul is a *logos*, it is not a *logos* as the quantitative percentage or proportion of ingredients, but as that which holds the ingredients together.

<sup>104</sup> *On the Soul*, I, 4, 408a9.

<sup>105</sup> *On the Soul*, I 4, 408a14, 15, 18, 28.

<sup>106</sup> *On the Soul*, I, 4, 408a15-16.

<sup>107</sup> Of course, Aristotle’s major text on mixture is *On Generation and Corruption*. See especially I, 10 and II, 6, but also I, 5-6 and II, 6-7. In I, 10, Aristotle resolves problems arising from explaining change (including, but not limited to, the growth of natural and living beings) by appealing to the distinction between action and passion, and potency and *energeia*: “Neither the art of healing nor health makes health by mixing with bodies.” (328a22-23) For Aristotle’s criticism and agreement with Empedocles concerning *logos*, see also *Metaphysics*, I, 10, 993a17ff.

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<sup>108</sup> *Metaphysics*, XIV, 6, 1092b32-33. For flesh as *logos*, see also Averroès, *L'intelligence et la pensée*, tr. Alain de Libera (Paris: Flammarion, 1998), pp. 91, 249.

<sup>109</sup> *Metaphysics*, I, 10, 993a17-19.

<sup>110</sup> *On Generation and Corruption*, I, 2, 315b14-15.

<sup>111</sup> *On Generation and Corruption*, I, 7, 323b18-19.

<sup>112</sup> *Metaphysics*, VII, 16, 1040b5-10.

<sup>113</sup> *On the Soul*, II, 4, 415a23-415b2; see also *Metaphysics*, XII, 7, 1072b3, 26, *On Generation and Corruption*, II, 10, 336b25-337a7, and *Eudemian Ethics*, I, 5, 1216a11-14: "Now they say that Anaxagoras was questioned with respect to such problems and asked for the sake of what one should choose to be born rather than not, he said 'for the sake of *theôrêsai* the heaven and the order around the whole *kosmos*'."

<sup>114</sup> Our claims concerning *orexis* are in line with Jean-Louis Barrière, *Langage, Vie Politique et Mouvement des Animaux*, (Paris: VRIN, 2004), p. 179.

<sup>115</sup> *Nicomachean Ethics*, IX, 7, 1167b34-1168a9.

<sup>116</sup> *Metaphysics*, I, 1, 980a21.

<sup>117</sup> Heraclitus, DK22B123.

<sup>118</sup> *On the Soul*, III, 13, 435b2.

<sup>119</sup> *On the Soul*, II, 12, 424b1.

<sup>120</sup> *On the Soul*, II, 12, 424b2-3.



IV. ANIMAL MOTION:  
*LOGOS IN ON THE SOUL.*

“Come in, be brave, for there are gods even here.”

Heraclitus.<sup>1</sup>

After nutrition and reproduction, what are the other two natural changes that exhibit the inherence of *logos* of a being?

We are trying to understand *logos* as it appears in the *Categories* in the form of “*logos* of being” of a being as its standard, and then in *On Interpretation* as intrinsic relation of its potency and actuality. In our previous chapter, we saw how *logos* exhibits this inherence in inorganic nature as a “form according to *logos*” and in organic nature also as a *logos* of growth and reproduction holding onto formerly exclusive elements. So far, the philosophical meanings of *logos* each time referred to the preservation of difference, to a relation that precisely does not let one term yield or remain indifferent to the other. Thus, the overarching sense of *logos* is comparable to what Aristotle calls a “stretching out (*oregesthai*) toward the eternal and the divine”<sup>2</sup>: neither inorganic nor organic nature *simply exist* – the former is stretched between its potency and actuality, the latter is also “tended” between the developed state of its parts and the functions they are developed *for*, most notably nutrition and reproduction. Thus, the stretch of fire away from the center of the universe, the reproductive urge to integrate its form into the material of other bodies, or the strife of

nutrition to integrate their material into its own form, are facets of the same stretch or desire, *orexis*.

These three however are not exhaustive forms of desire. Some natural beings interact with beings in ways other than integrating their own form into other bodies. Some beings are receptive to *others' form*. Although, unlike fire, plants integrate bodies with contrary natural impulses, they are also limited to nutrition<sup>3</sup> and thus are precisely impermeable to forms, as the complete destruction of the latter is precisely the mark of successful nutrition and reproduction. “The nutritive potency must by necessity be in all that grow and decay. But sensation is not necessarily in all that live. For those whose body is simple do not have touch, nor can those that are not receptive to the forms without the material.”<sup>4</sup>

In this chapter, we investigate two last instantiations of *logos* in nature, two last answers to our initial question as to how natural beings exhibit the inherence of their “*logos* of being”: how is it that Aristotle comes to the conclusion that “sensation is *logos*”<sup>5</sup> and considers locomotion as a *sylogismos*?

## A. SENSATION.

What can we learn from animals?

The elemental and the inorganic exert a certain charm on us: the height of mountains, the constancy of stars, the roar of the ocean, even the look of a campfire or a snowflake seem as models to covet as much as sources of the feeling of sublime. Everybody now and then may aspire for the solidity of rocks, the immensity of icebergs, the raw power of storms or the transparency of still water... Plants too contribute to this fantasy with the fertility or size of trees or the beauty of flowers: a life confined to nutrition and reproduction alone. Nevertheless, we are far more likely to yield to this nostalgia while contemplating a landscape by Turner or Caspar Friedrich than while steering a ship in storm, or while driving a powerful truck on a clear sunny day than while changing a tire on a rainy highway at night... Thus, this nostalgia for the elemental and the vegetative seems to reflect an aspiration for an opaqueness and determination excluding possible hesitation and necessary care. Hence all these elemental or vegetal fantasies remain inspirations and aspirations. To epitomize nutrition and reproduction for a human being is and always remains an aspiration, an endless task to fulfill, an abstraction, a pleasant imagination of *not* having to do things.

Insofar as both elemental and vegetal fantasies, and the distortions that they either motivate or are motivated by, find their source in a denial of a life beyond mere being, beyond nutrition and reproduction, our investigation of animality may be expected to conceptualize how nutrition and reproduction are only “parts” of our soul

as conceived by Aristotle. When Aristotle invites us not to skirmish from studying the most humble animals, quoting Heraclitus who, warming up at the stove, calls his guests to “come in, be brave, for there are gods even here”<sup>6</sup>, perhaps what is at issue is less our human contempt for “lowly” animals than our unwillingness to leave elemental and vegetal fantasies for the cares and hesitations of animals life.

What then can we learn from animals? We can learn the life of sensation and motility.<sup>7</sup>

### 1. Affection.

In fact, with sensation we enter the animal world: “Although the animal as animal cannot fail to live, as living it is not necessary that it be an animal, since although plants live, they do not have sensation and the animal is distinguished from that which is not animal by sensation.”<sup>8</sup> In this section devoted to Aristotle’s concept of sensation and the function of *logos* therein, we are motivated by what can be called the paradox of sensation: *I* perceive objects and yet sensation seems to take place *over there*. In our attempt to develop this paradox, we shall elaborate three concepts: affection, alteration and completion, and discuss Aristotle’s three examples all of which are becoming leitmotifs in our dissertation: fire, wax and the lyre.

Let us first open up what we mean by the paradox of sensation: the experience of sensation indissolubly suggests distance and penetration. For Aristotle too, sensation is a kind of motion, namely a change with respect to quality, and thus seems much more remote and superficial than nutrition and reproduction; it seems to be

even weaker than a change with respect to quality properly speaking, because the sentient is not really changed by its object, but rather gathers a faint echo of it. On the other hand, Aristotle first defines sensation as *alloiôsis tis*<sup>9</sup> – as “a kind of alteration” or “becoming other”. It is with sensation that the animal soul becomes open to the world instead of simply imposing itself: “In a way the soul is all beings.”<sup>10</sup> While it seemed superficial and distant before, now sensation appears to be a penetration into the world incomparably deeper than reproduction, and a receptivity incomparably wider than nutrition.

Aristotle begins his discussion of sensation in *On the Soul* with a reference to a discussion of “affection” (*pathos*) in *On Generation and Corruption*<sup>11</sup>, which puts the paradox of sensation in the form of a dilemma borrowed by his predecessors: “Is like affected by like, or unlike affected by unlike?” According to Aristotle, the view that affection happens between unlike beings<sup>12</sup>, and Democritus’ view that “the agent and the affected are the same and alike”<sup>13</sup> form a false opposition, just as our paradox is a false one: “the cause of their opposition is that, while one must watch (*theôrêsai*) a whole, they happened to say a part.”<sup>14</sup> What is this view of the whole such that it abolishes the apparent opposition between activity and passivity, between a “subjective” perspective on sensation and an “objective” one?

According to his typical strategy of dialectical synthesis of his predecessors’ views by means of the multivocality of words<sup>15</sup>, Aristotle states: “It is necessary that the agent and the patient be somehow the same, and somehow different and unlike one another.”<sup>16</sup> The necessity of this middle way, the inclusion of the middle here impose themselves by the impossibility of an exclusive adoption of the

horns of the dilemma. Thus, on the one hand, a being cannot be affected by a being that is altogether similar and indistinct from it, since the same being would also be constantly affected by “itself” and there would be no distinction *away from which* affection would happen; but, on the other hand, a being cannot either be affected by a being altogether different from it, since then there would be no common ground *upon which* affection would happen. Aristotle attempts to solve the dilemma by stating that “it is necessary that the agent and the patient be similar and same in kind, but unlike and contrary in form.”<sup>17</sup> This body can affect another *body*; this color can affect another *color*, etc. Thus, if sensation is an affection, it will involve two beings similar on a general level, and dissimilar on a relatively lower level.

But is sensation an affection to begin with? How does this idea of affection apply to sensation, if at all?

Concerning one horn of the dilemma, the identity of agent and patient in sensation would imply the self-affection of both, and thereby destroy the active character of the agent as well as the passive character of the patient. The sheer identity of the sensible and the sense would imply that the sense constantly senses itself such that it would not be open to any external object. Thus, if earth is perceived by earth, why wouldn't the “earth” of my palm always sense the “earth” of my wrist and knuckles? Why wouldn't I hear the air in my ear? Since the parts of my eyes, mouth, nose and skin are made out of the same elements just like the bodies around me, why doesn't one part sense the other parts of my body? Why don't I feel that my blood is wet and warm, that my heart is elastic? Why don't I distinctly feel my inner organs, the curves of my brain, and my veins?

But some people *do* feel their organs – not when they are healthy, but precisely when they feel bad, or rather they feel bad when they feel their organs. A liver is sick when it is an object of sensation. Ache is self-affection, and disease is dis-ease in the sense that the senses cannot *fail* to feel themselves, and no longer exhibit the ease, the relative potency, and the readiness that characterizes the living body as we saw in our previous chapter. A healthy living body is a body whose parts are at once *fully* developed and *completely* open. Properly speaking, feeling well for an animal is to feel *the world*, and not to defensively hold on to an inner state of well-being or self-sufficiency. One can here see how Aristotle’s conception of sensation is already sketching out an opposition to the “nostalgia of the elemental”: to feel well is less to *feel* well, than to feel *well*, to do well the work of feeling. It is to be altogether ready for and open to the world. Feeling well is in this sense being perfectly “ec-static”.<sup>18</sup>

As to the other horn of the dilemma, Aristotle claims that sensation can no more be a transition of a contrary by, and into, a contrary. This is because merely contrary things cannot get into any contact. Even if they did, sensation would be mere transformation, the sensing animal would *become* its object, it would be *eaten* and *digested* by its object. The whole point of sensation is that it is not mere reversal of properties or transmission of matter. Sensation must allow a difference between the agent and the patient, but also the possibility for the sentient to hold onto the sensible. However negatively, this already foreshadows how sensation is *logos* as implying the preservation of difference without yielding or remaining indifferent to its object.

## 2. The fire example.

Aristotle overcomes the apparently contrary perspectives of his predecessors by introducing the distinction between *genos* and *eidos*. The problem is that what Aristotle says about affection is in no way reserved to sensation, but rather common to all change whatsoever, as can be seen in the last chapters of *Physics*, I, as well as elsewhere: "... change proceeds from opposites or intermediates – not however from all opposites (for voice is not white)..."<sup>19</sup> What distinguishes sensation from any kind of affection? How is vision different from reflecting light, hearing from vibrating, feeling warmth from becoming warm? How are animals "touched" such that it is irreducible to the way inanimate objects or plants are?

Aristotle develops the distinction between *genos* and *eidos* by introducing the concept of potency, indeed, in relation to *energeia* or *entelekheia*: "that which can sense is not in *energeia*, but only in potency."<sup>20</sup> Follows the example of fire: "So it is like the combustible which does not burn by itself without something setting fire to it; for otherwise it would burn itself and would not need any fire that is in *entelekheia*."<sup>21</sup> Although Aristotle's recourse to potency and his example helps us clarify what sensation cannot be (namely, affection of like by like), they do not help us understand what sensation *can* be. Since a dark wall is bright in potency as much as the eyes of a sleeping animal has sight in potency, how does potency help us distinguish what happens when light reaches the eyes of the animal as distinct from what happens when the wall is illuminated? The reversal (*metabolê*) from sensation in potency to sensation in *energeia* seems to be the same thing as the change from dark



to bright and the change from burning in potency to actual ignition. Note again that these examples are still in line with the paradigm of nutrition and reproduction: fire “feeds itself” by burning a combustible, light illuminates the dark surface. What is the difference between the potency of the eye for sight and the potency of a wall for being bright or the potency of a combustible to burn? The structure of assimilation can be applied to any change or affection, and although it helps Aristotle criticize and synthesize his predecessors’ views, it does not tell us what sensation is. Similarly, the example of the fire is helpful in understanding the specific way the agent and the patient are related, but does not shed light on the form this relation takes in sensation – precisely because the combustible does not *feel* the fire.

### 3. Alteration.

And yet the concept of potency is central. In the rest of his thematization of sensation, Aristotle simply refines the kind of potency at stake. Just as the growth of plants was distinguished from the growth of fire by its developed organic character, i.e. its being a first *entelekheia*<sup>22</sup>, the sensation of animals is distinguished from change or affection in general by its being a first *entelekheia* or a second potency, a developed potency. The potency of an animal’s sensation is a result of a development just as the potency of a plant’s nutrition was. Thus, the key to understand sensation is found back in the definition of the soul. Right after the example of fire, Aristotle reintroduces the distinction between knowing and contemplating we have seen in our previous chapter:

“But since we speak of perceiving in two ways (we say for that which hears and sees in potency that it hears and sees – even if it happens to be asleep – as well as for that which is already at work), so sensation would be said in two ways: one the one hand as in potency, and on the other as *energeia*.”<sup>23</sup>

When Aristotle engages into his positive account of sensation, he stops illustrating animal sensation with such an inorganic growth of fire, and takes up the example of knowing and distinguishes three stages and two transitions:

a. First potency: A human being has a first potency to know just by belonging to a *genos* that has the potency to know.<sup>24</sup>

b. Second potency or first *entelekheia*: A human being may have a second potency or a first *entelekheia* for knowing by *having* knowledge (say the knowledge of grammar) and *can* contemplate this knowledge.<sup>25</sup>

c. Second *entelekheia*: A human being may finally already be contemplating in *entelekheia*, in which case she would be knowing in the governing sense (*kuriôds*).<sup>26</sup>

The transition from the first potency to the second is a process of “changes by means of learning and frequent change from contrary conditions”.<sup>27</sup> In the case of sensation, this process is that of the development of the sense organs themselves. But the transition from the second potency to *entelekheia* is not a change: it is a transition from this inoperative (*mê energein*) possession of sensation or grammar to *energein*, being-at-work.<sup>28</sup> The key to understand sensation is to understand the difference between these two transitions: the first is a reversal, such as the transition from not-fire to fire, the wall’s turning from dark to bright, the ignorant person’s learning grammar, becoming other by no longer being itself; but the second transition “is rather the preservation [*sôtêria*, literally the “saving”], by the being that is in *entelekheia*, of something that is in potency and is like it in the way that a potency is like its *entelekheia*.”<sup>29</sup>

A hand on a warm radiator touches it precisely in so far as it has already integrated the elements into a settled equilibrium so that it can then accomplish the second transition: it can now *refrain* from *only* turning from cold to warm.<sup>30</sup> A dog hearing a bell hears it precisely in so far as it is *not simply* moved by the vibrations in his ear and does not simply reflect or transmit them as vibrations, however sophisticated this process may be. Sensation is a becoming other that is not only an undergoing. Unlike inorganic bodies standing apart from one another in their natural places or moving in contrary directions toward them, unlike plants striving to replenish their *eidos* by perfectly destroying other *eidê*, animals are ready to *become* that which is unlike them without for that matter ceasing to be what they are. They are not only ec-statically tended between their actual being and their inherent

standard, they not only hold the contrary tendencies of the elements within their organism together under their own *eidos*, they themselves are “saved” and completed by being altered. The fabric of all the physical-mechanical interactions in the world is subtended here and there by oases of sensation: “in a way the soul is all beings.”<sup>31</sup>

This is what the animal is: “in a way” all beings. And “is” here should be taken seriously: the being of the animal is saved by, “in a way”, being all beings. Being-other, alteration here is synonymous with being saved in its being.

#### 4. The wax example.

It is the second transition, from the developed sense organ to its being-at-work, that explains the “paradox of sensation”: “The sentient is potentially like what the sense object is in actuality. Thus, it is affected while being unlike, but, once affected it is like its object.”<sup>32</sup> An account of sensation must allow for potency, but, most crucially, for a concept of second potency or first *entelekheia*, i.e. for preparedness, readiness, expectation, intermittence, sleep. In other words, an account of sensation must be able to distinguish between mere incapacity and inoperativeness. Just as the growth of a plant was fundamentally different from the growth of fire, sensation cannot be reduced to mere *energeia* – sensation must allow for brewing as well as for burning.<sup>33</sup>

“In all the respects in which the inanimate is altered, the ensouled is also altered; but all inanimate beings are not altered in all the respect in which the

ensouled are, for [the inanimate] are not altered with respect to sensations, and while that which is undergone is unnoticed [*lanthanei*] by the latter, it is noticed [*ou lanthanei*] by the former.”<sup>34</sup>

The difference between the animal and the plant can be seen in that the former can *fail* to perceive in a way the latter cannot. Sensation is a realm of interrelation of *lanthesthai* and *ou lanthanesthai*.

Again it is the sense of stretch that governs Aristotle’s account of life and animality: opposites are maintained as opposites without one being collapsed to the other. For the animal, to perceive is neither to massively remain what it is, nor to become what it is not. It is in this sense that sensation, for Aristotle, is a quite special kind of becoming other: a becoming other without ceasing to be itself, a becoming other that is the preservation (*sôteria*) and completion of an animal’s being itself.

At the final chapter of Book II of *On the Soul*, Aristotle recapitulates his previous account of various senses and media, and illustrates his conclusion by means of an example that is as familiar to us as the fire:

“But concerning sensation as a whole, one must grasp that sensation is that which is receptive to the *eidê* of sensibles without their *hylê*, just as the wax receives the sign of a ring without the iron or the gold, and takes up the golden or bronze sign but not as gold or bronze; similarly sensation of each thing is also affected by that which has a color or a flavor or a sound, although not as that which is said of each...”<sup>35</sup>

As the fire example, this wax example is no less problematic than suggestive and famous – again because the impressed wax is no more sensitive to the impression as the combustible is to fire. Aristotle’s point is that sensation is precisely irreducible to a transfer of matter – which characterizes half of the process of nutrition and growth –, but the example falsely suggests that sensation is an external impression of a shape. The reason is that the eye stretches out toward sight in a fundamentally different way than a piece of wax is “receptive” to shapes. The piece of wax, in Descartes as well as here in Aristotle, is precisely not stretched toward this or that form, and for this reason it is an inadequate example for nature and life. In Aristotelian terms, as we emphasized in Chapter I, it is rather a substance produced by bees, whose consistency is right between that of earth and water: it yields like water, but it stays put like earth. For this reason wax is precisely *chosen* by humans for inscribing letters or impressing signets. The wax is not completed at all by being impressed. Sensation is fundamentally different from any kind of inscription or impression. In fact these two, just like the fire example above, are among the inorganic or elemental metaphors used for natural or animal processes: taken literally, they are essential falsifications, misrepresentations, abstractions, derivations.

Just as the fire example helped us solve the dilemma of affection of Aristotle’s predecessors while remaining fundamentally inadequate for illustrating the whole phenomenon of sensation, here again the wax example, while helpfully suggesting that the potency of the sentient is not *any* potency but a specific one, constitutes only another step toward a well-founded conception of sensation that explains it instead of

simplifying it. And yet there one last concept and one last example in the account of sensation in *On the Soul*.

#### 5. The lyre example.

This last concept is *logos*. Aristotle continues: "... the sensation of each thing is also affected by that which has a color, flavor or sound, although not as that which is said of each of these, but as being such and such (*hê toiondi*) and according to *logos*."<sup>36</sup> This complex sentence makes a surprising or counterintuitive claim: we do not sense colors, sounds, smells, etc. Sensation is not affected by a color *as color* or by a sound *as sound*. An animal neither senses color as the genus of white, red and green, nor does it sense redness; it rather senses red "as being such and such", i.e. the red of something, a red that is subtended by pleasure and pain, in a word, *something* red. If the agent and the patient of sensation share the same *genos*, this means that animals sense things, and not neutral anonymous disinterested stimuli. In other words, sensation is to get a reply to a prior expectancy, an answer to a prior question, the question of desire. Sensation, which is of particulars<sup>37</sup>, is not derivative of universals; sensation is not deduction but induction; it is rather the universal that emerges out of repeated sensations.<sup>38</sup>

But how is sensation affected by the sensible *according to logos*? Aristotle continues:

“The sense organ is first of all that in which such a potency is; thus in one way they [the organ and the potency] are the same, in another way they are different; for that which senses would be a magnitude, but indeed neither *the* being of sensitive nor sensation are magnitudes, but rather some *logos* and a potency of it [of that which senses].”<sup>39</sup>

What makes a sense organ, which is extended, is “some *logos*”, which is not extended. This *logos* is the configuration of the sense organ, the relationship between extended things, and “hence it is clear why excesses in the sensibles sometimes destroy the sense organs; for if the motion of the sense organ is too strong, the *logos* (which is sensation) is destroyed.”<sup>40</sup>

If the sense organ exists according to *logos*, and if the power of sensation is precisely this *logos*, sensation requires that the sense organ hold on to a certain equilibrium between contrary qualities. This functional account of sense organs allows prostheses to be “hands” in a much more fundamental way than the hands of statues. It is the *logos* that preserves the sense organ: while feeling warmth, also holding on to its prior equilibrium.

Sensation must thus involve a minimal act of “remembering” or “comparing”, a maintained “backward stretch”; too strong a stimulus makes the animal “forget” its prior condition. It is the holding together of both states that explains why sensation is *logos*. An eye is fundamentally incomparable to fire, to a piece of wax, and even to a final product of the animal’s growth: the physiological development of the eye has indeed a *logos* of growth, but this is only a transition from the first potency to the



second, it is a reversal (*metabolê*): food “forgets” what it was to be for itself, food is *transformed*; but this perspective misses the “transition” from the second potency to full actuality: the sense organ is made *ready*, already prepared for exercise.

The last example of Aristotle’s account of sensation is a lyre:

“[Excess destroys the *logos* that characterizes sensation] just as the *symphônia* and tone of a lyre is destroyed when the strings are struck hard. And [it is also clear] why plants do not sense although they have one part of the soul and are affected to a certain extent by tangibles – for they become warm and cold. The reason is that they have no mean (*mesotêta*), neither any such principle such as to be receptive to the *eidê* of sensibles, but rather are affected with the *hylê*.”<sup>41</sup>

This example can support our recurrent use of the idea of stretch, crucial to *logos*, as well as our quotation from Heraclitus at the very beginning of our dissertation: “They do not understand how that which is disrupted has the same *logos* as itself: a back-turning harmony as in the bow and the lyre”.<sup>42</sup>

But how does the lyre or the bow illustrate well the second potency which is the crucial point in sensation? The strings of lyres and bows are indeed stretched, and this stretch is determined neither by the string itself nor by its being attached to one extremity; the stretch is a function of the nature of the string *and* of the distance between its extremities. While objects seem to us to be massive or subtle, hard or soft, the lyre and the bow are good examples for those objects that are determined not by

their opaque materiality, but by their involving a *relation*. And this idea of harmony being a result of opposition was indeed not alien to Aristotle's contemporaries since the relational character of harmony was a great source of inspiration for the Pythagoreans as well as for Plato. Both Heraclitus and Aristotle too seem to develop this intuition: *logos* as ratio is not simply an independent value on its own, but also a relation between two numbers which can be reproduced infinitely by any other two numbers; *logos* as a note is not only *this* note played on *this* string of *this* lyre, but a result that can be attained, *mutatis mutandis*, on other strings of other lyres or even other instruments such that it possible to play together; finally, *logos* as sensation is a system interrelating the sense organ and the sense object such that one may sense the same heat as long as the relation between the heat of the organ and that of the object remains the same. Sensation is sensation of that which is "hotter" than my hand, "stronger" than the air in my ear, "sweeter" than the state of my mouth. *Logos* involves differences in their difference.

Developed organs are already stretched between contraries: this sense of *logos* is familiar to us from our discussion of growth in the previous chapter; but this stretch is no longer an end for *sense* organs: they also stretch out to the world for being completed. For animals, being in the world is reception as much as confrontation or assimilation. This certainly does not mean that sensation is *added* on to nutrition and reproduction; it simply means that nutrition and reproduction for animals is sensitive nutrition and sensitive reproduction. From the point of view of growth, plants are indeed internally differentiated: they have organs; but from the perspective of sensation they simply *become* hot or cold. They do not exhibit the sense of stretch

sensation is: they do not possess a range, a mean (*mesotêta*), in which they hold themselves and the *eidê* of their object. That is why every stimulus is “excessive” for plants such that none really is, whereas “sensation is *logos*, but excess hurts or destroys.”<sup>43</sup> Sensation always implies compositeness, and this compositeness always implies plurality of elements, i.e. a mean by which they are held together in their difference, but also the plurality of its objects: “Touch is like a mean of all tangibles, and its sense organ is receptive not only of all the differences of earth [*diaphorai gês*], but also of hot and cold and all other tangibles.”<sup>44</sup> With sensation, we are dealing with a phenomenon that is no longer reducible to a form of integration, but one that constitutes a contact with the world.

To conclude then, sensation is *logos* in its second sense, “proportion”, but in an even more subtle way than the “proportion” of growth and reproduction: sensation as *logos* holds on no longer to the formerly exclusive elements within its own *eidos*, sensation rather holds on to the *state* of the sense organ and the *state* of its object. Whereas the awareness of difference was a sign of a failure in the assimilation process of nutrition and reproduction, sensation is awareness of difference, discrimination (*krisis*):

“To sense is some kind of being affected such that that which an object makes like itself is such already in potency. This is why we sense not what is as hot, cold, hard or soft as ourselves, but what is more so; thus, sensation is like a mean between contraries of sensation. For this reason the mean distinguishes [*krinei*] the sensibles.”<sup>45</sup>

Elemental and vegetal fantasies are disrupted by this *krisis* animals are capable of.

## B. LOCOMOTION.

Our analysis of locomotion will bring to conclusion one of the two questions that we came across in the elaboration of the *logos* of being in our first two chapters: after nutrition, reproduction and sensation, it will provide the fourth answer to our question concerning the ways in which natural beings, and especially animals, exhibit the inherence of their *logos* by *changing*.

### 1. “Transperception.”

Natural beings have an inherent source of motion and rest; organic bodies integrate the *hylê* of contrary bodies into their own *eidos*, and finally the animal is receptive to the *eidê* of bodies without their *hylê*. For Aristotle, however, some animals do more than receiving the *eidos* of contiguous bodies – which happens with touch, and its subspecies taste<sup>46</sup> – they also receive the *eidos* through something else (*di’ heterôn*<sup>47</sup>). These animals have smell, vision and/or hearing.<sup>48</sup> Some animals perceive, but they also perceive through a medium, i.e., to introduce a necessary neologism, they “transperceive”.<sup>49</sup>

Here we are in a higher level of complexity: the animal is not only holding together the *logos* of its sense organ and the *logos* of its object without letting one yield to the other, it is also doing so while also holding the medium *as medium*. Not only is the animal holding together and yet distinguishing the *hylê* and the *eidos* of a contiguous object, it holds together and distinguishes the *eidos* of the object from the

medium. The animal not only perceives an object, but perceives it *through something else* – it at once holds the object and the medium together and keeps them apart. As long as the medium is sensed, it is no longer a medium and there is no longer distant sensation. Then if an animal is capable of transperception, it should “read” the object “off of the medium”. Instructive in this respect is Aristotle’s account of memory, since just as transperception is the sensation of an object *but also* of its distance, “whenever both the motion of the thing *and* that of time happens at the same time, then [the animal] is at work with respect to its memory [*energei têi mnêmêi*]”.<sup>50</sup>

Just as in contiguous sensation the animal feels the warmth of water *without* simply becoming warm, in transperception the animal hears the bell *beyond* the vibrating air that carries the sound and strikes the ear. But as distinct from contiguous sensation, in the latter case the animal senses and holds its real object (“the bell”) not only as distinct from itself, but also as beyond itself, apart and away from itself, at a distance, separated by the medium which *is* next to it. By using the medium as a medium, by sensing something through something else precisely as something *else*, the animal perceives the *over there*. To follow Aristotle who explicitly compares transperception and memory:

“all internal [objects of sensation] are smaller, and as it were analogous to the external ones. Perhaps just as another [being] takes something in itself analogically with *eidei* [in sensation], something similar happens with distances.”<sup>51</sup>

For an animal that has only immediate touch and taste, beings are indeed revealed as something *else*, but only for an animal having sight, hearing and/or smell are beings revealed as *elsewhere* – although the possibility of a tactile or gustatory transperception is not ruled out. Thus, although an animal with immediate touch only has a sense of itself as distinct from the thing it is touching, it is only an animal capable of sensing something *through* something else that has a sense of *here* in distinction from *elsewhere*. A similar argument can be made with respect to memory: only an animal capable of sensing something *without* collapsing the time elapsed can have a sense of *now* in distinction from *then*. Only thus are the sparse oases of immediate sensation extended into often immense expanses and spans of awareness in animals.

Transperception requires a sensation of spatial distance<sup>52</sup> (the use of the medium as a medium), as memory requires a “sensation” of time:

“it is necessary to become acquainted with magnitude and motion by means of that by which one is also aware of time, so it is clear that the image is an affection [*pathos*] of common perceiving power. Thus it is clear that the acquaintance of these is by means of the primary power of perception.”<sup>53</sup>

Aristotle defends at length that there is a primary perceiving power for common attributes<sup>54</sup>, and claims that there is a “sensation of time”.<sup>55</sup> These sensations present the form of *krisis* or *logos* or *mesotês*, but in a more complex way than the five senses: the *eidos* sensed through five senses is held together and distinguished by a

distance in space or in time. Aristotle explicitly uses the term *syllogismos* for recollection:

“recollecting is like a kind of *syllogismos*; for one who recollects reasons out [*syllogizetai*] that one saw or heard or had some such experience before, and this is a certain sort of inquiry. And this belongs by nature only to those in whom a power of deliberation is also present, since deliberating is also a certain sort of reasoning.”

Deliberation<sup>56</sup>, search, distant sensation and memory are all analogous capacities: a holding together of something actual (a goal, an object sought for, a present sensation and a past sensation) together with an awareness of the medium (the way to reach the goal, the absence of the object sought for, spatial or temporal distance). Thus, the animal capable of memory and transperception is no longer merely a fundamentally sensitive living being, but an animal capable of proportioning or comparing (*syllogizesthai*) the immediate into the mediate, an animal of times and distances.

## 2. Locomotion.

Apart from these analogous capacities of the soul, transperception as access to *here* and *there* most crucially coimplicates locomotion.<sup>57</sup> In other words, when we are talking about sight or hearing, we are necessarily dealing with bodies that can move. This is not as straightforward as it may at first seem to be, since we mostly conceive



of sensation as apart from locomotion, taking place in the eyes, the ears or in the head; apart from touch, sensation is for us humans an almost cerebral activity taking place at the upper extreme of the body, whereas for Aristotle the seat of sensation is in the center of the body, in the heart.<sup>58</sup> Further, the relation between sensation and locomotion is somewhat loose for us. Having potencies with *logos*<sup>59</sup>, we seem think: indeed sensation and locomotion *may go together*, but it is not immediately clear why they would *implicate* one another. But here we may see why they would: transperception requires the use of a medium, which itself requires a comparison or proportioning, an awareness of the *elsewhere* beyond the medium. But the *elsewhere* is nothing but a virtual *here* that would actually become *here* by pursuit or pull, and the *here* is a virtual *elsewhere* that would become *elsewhere* by flight or push.<sup>60</sup>

But why would an animal pursue or flee something contiguous or distant? Because “that which have sensation also has pleasure and pain, and the pleasant and painful, and that which has these has appetite; for appetite is desire for the pleasant.”<sup>61</sup> That sensation and locomotion are subtended by desire should not surprise us, first because, as we quoted in our previous chapter, “all things desire [*oregetai*] [the eternal and the divine], and for the sake of it do everything they do by nature.”<sup>62</sup> Thus just as we should primarily think of sensation not as a cerebral process but as fundamentally *incarnated*, not as tranquil but as fundamentally *moving*, similarly we must conceive of this motion as fundamentally *interested*. One can see in each step of our argumentation a factor that is abstracted in Descartes wax example: for Descartes, the sensation of the wax is precisely *uninterested* activity that does *not* move the subject – which ends up being nothing but the *mind*.<sup>63</sup>

For Aristotle, sensation and locomotion are not only subtended by desire like all faculties, in fact they are joined or articulated by it.<sup>64</sup> For sensation divorced from desire is not only an abstraction, it does not entail locomotion even in the form of imagination (*phantasia*)<sup>65</sup>, knowledge (*epistêmê*)<sup>66</sup> or *nous*<sup>67</sup>, since neither sensation or imagination of a fact, nor knowledge of a fact and its cause on their own go any further than stating a fact or cause: “this is such and such”, “this is water”, “this is moving in this way”, “this is this big”, “the moon is eclipsed because of the interference of the earth”, “one side of a triangle is necessarily shorter than the sum of the other two because...” None of these have any moving force or practical implication without desire or interest, a way out of the animal returning to it. Hence, involvement with disinterested facts are abstractions within the context of the interested beings animals are. The disjunct between locomotion and sensation or imagination is a “later” and more complicated phenomenon that we shall have to address in our next chapter.

For Aristotle, the cause of locomotion is thus *both* the universal desire for being and some form of receptivity to particulars: perception, thinking or imagination.<sup>68</sup> This latter is characterized in almost complete opposition to what we understand from imagination today; far from being a capricious, uninterested, arbitrary or creative fancy of the mind, *phantasia* here is fundamentally interested; it is primarily fused with desire.

Thus we are starting to see that the fourth natural motion, after nutrition, reproduction and sensation, is locomotion: transperception fused by means of desire. The act of proportioning or comparing of transperception is fundamentally coupled

by a premise of desire. We are not abusing the terms “premise” or “proportioning” here, since Aristotle analyzes locomotion as the result of a certain reasoning, a certain relating of two terms without simply epitomizing one of them, a certain *logismos*.<sup>69</sup>

What kind of *logismos* are we dealing with?

### 3. The “practical syllogism”.<sup>70</sup>

Any predication like “this is such and such a thing”, “this is such and such an action” or even “I am such and such” is in itself insufficient for animal locomotion without desire.<sup>71</sup> Aristotle construes locomotion as a result of a *logismos* that takes the form of an inner *legein* between appetite and sensation: “My appetite says (*legei*) ‘I must drink’; ‘this is drink’ says sensation or imagination or intellect, and one immediately drinks.”<sup>72</sup> More emphatically, Aristotle’s conceptual reconstruction of locomotion in *On the Soul* takes the form of what is later to be known as the “practical syllogism”:

1. If such a human being must do such and such a thing, (the universal)
2. and if this is such and such a thing and I am such a human being, (the particular)

---

3. then I must do this.<sup>73</sup>

But, in *On the Soul*, Aristotle offers this *logismos* in parentheses, and does not dwell on its character as a syllogism or even *logismos*. Such a parallelism between the

scientific and the practical syllogisms, however, is explicit in *On the Motion of Animals*, and followed by a wealth of examples.

There Aristotle's major question is as follows:

“But how is it that *nous* sometimes acts sometimes not, sometimes moves and sometimes not?<sup>74</sup> What happens seems parallel to the thinking-through and making a *syllogismos* about the immovable. But there the end is the thing contemplated (for when one thinks two premises, one thinks and puts together the conclusion), but here out of the two premises comes to be a conclusion which is an action.”<sup>75</sup>

Follows examples that we will try to reconstruct somewhat formally<sup>76</sup>:

1. Whenever one thinks that all humans must walk, (the universal)
  2. and that he himself is a human being, (the particular)
- 
3. then he immediately (*euthus*) walks.

Aristotle's second example is of the stopping:

1. Whenever one thinks that no human must walk, (the universal)
  2. and that he himself is a human being, (the particular)
- 
3. then he immediately (*euthus*) stops.

The third example is taken from *tekhnê* and therefore<sup>77</sup> the minor is no longer the agent, but an object envisaged:

1. [Whenever one thinks] “I ought to produce some good,” (the universal)
  2. [and that] “a house is a good,” (the particular)
- 
3. then he immediately (*euthus*) produces a house.

Aristotle’s fourth example conjoins two syllogisms:

1. [Whenever one thinks] “I need some covering,” (the universal)
  2. [and that] “a coat is a covering,” (the particular)
- 
3. then [one thinks] “I need a coat”.
  4. [Whenever one thinks] “I must make what I need,” (the universal)
  3. [and that] “I need a coat,” (the particular)
- 
5. then “I must make a coat.”

The reason why Aristotle gives the latter example could be that he wants to suggest that these *syllogismoi* can be concatenated at length so as to compose more and more complex sets of locomotion involving more and more sophisticated and extended spatiotemporal patterns. The minor premises of all the above *syllogismoi* show why locomotion entails the use of the “common perceptive power” (*koinê aisthêtikê*): transperception, memory, imagination, a sensation of time, and even the use of a medium as a medium... The various combinations of the minor premises

provided by this “set” of powers give rise to diverse kinds of animal locomotion such as migration, hunt, escape, search, etc., all reducible to pushing and pulling<sup>78</sup>, or fleeing and pursuing.<sup>79</sup>

What is at stake here is not an intellectual conception of animal motion, but rather a reminder that the disjunct between sensation and desire is secondary, i.e. it is explained by further factors. For now, what is emphasized is the immediacy (note the recurrent adverb “*euthus*”) between universal desire and the perception of particulars. In short, coupled with desire, all sensation involves pushing and pulling while all transperception is flight or pursuit.

#### 4. A middle term.

The middle term (*meson*) of the practical syllogism in animal locomotion is precisely the relevance of the object sensed or imagined. Since sensation does not by itself provide a universal<sup>80</sup>, the minor premise is bound to be particular, and that is why it results in a particular locomotion as opposed to what can be conceived as the “universal locomotion” of the elements.

It is the middle term that answers Aristotle’s initial question: “How is it that *nous* sometimes acts and sometimes does not, sometimes moves and sometimes does not?”<sup>81</sup> If one momentarily disregards the fact that all sensation is particular, the answer can be derived from the results in the *Prior Analytics*: if in every syllogism at least one premise must be affirmative, and if no two affirmative premises result in a negative conclusion, then all negative conclusions require one negative premise. If

the major premise is negated then the “syllogism” takes a form comparable to a Camestres, if the minor is negated then it takes the form of a Cesare.

As can be seen, we are not totally against the comparison between the “practical syllogism” and the *syllogismos* in the strict sense, precisely because Aristotle is not against it. This being said, we should indeed emphasize that this comparison is heuristic, and should not be taken literally in order to envisage animal locomotion as a result of cognitive faculties. In fact, Aristotle too is aware of this misunderstanding and emphasize “immediate” character of the conclusion. The comparison, if taken as a comparison, is instructive not only in terms of animal locomotion, but also in the context of *syllogismos* in the strict sense. A *comparison* already excludes mere difference, but also the identity of the terms compared, and thereby informs both. In the following section we will dwell on the very difference between the “syllogism” that results in animal locomotion and the *syllogismos* in the strict sense it assumes in the *Prior Analytics*. Most specifically we shall see how the premises in *syllogismoi* involve a level of generality that all “practical syllogism” necessarily lacks, and which faculties come into play beyond memory, habit, desire, perception, and even beyond “transperception” and experience. For the time being, we see that mediated sensation (transperception or memory or imagination) *spills into* an immediate locomotion.

In our first section, we saw that “sensation is *logos*” in the sense of special kind of “proportion” that, unlike any numerical ratio, holds on to its different constituents without letting one yield to the other (in which case, there is no sensation, but the sense organ is precisely unaffected or destroyed). Here we see that

a similar proportioning is at work, although in the more complex form of a *sylogismos*: Aristotle insistently uses *sylogismos*, *syllagesthai* and *logizesthai* for the “argument” abstracted from locomotion.<sup>82</sup> And in fact what explains animal locomotion is neither the universal premise of desire (common, as we have seen in Chapter III, to all nature) nor a disinterested perception (which we have yet to see), but precisely a middle term, a particular provided by receptivity, that “matches” them, holds them together without letting one yield to the other.

Put negatively, rocks simply fall, i.e. tend toward the center of the universe regardless of where they are; fire is pulled outward regardless of where it is; they move “universally”. Animal locomotion, on the other hand, holds this “universal” impulse together with particulars received through perception or remembered or anticipated. An animal *never* falls as an animal; an animal lays down here, but “here” in a strong sense, in the sense of “*this* place rather than that other”; unlike the stars, a bird flies while attending to the difference of heat, season, hour or humidity that its perception “tells”.

Hence both sensation and locomotion are instances of *logos* in the sense of “proportion”. But here in locomotion, Aristotle often uses verbs like *legein*, *eipein* and *phanai* for the way the premises are supplied<sup>83</sup>, and *logos* itself for the premises.<sup>84</sup> Perhaps the animal soul prefigures an environment of *logos* neither in the sense of “standard” nor “proportion” but in the sense of “discourse”. This prefiguration of *logos* as discourse in animal locomotion should not be exaggerated, but neither underestimated nor forbidden: *logos* and *legein* in animal locomotion is precisely that which will link our discussion to the human world. Universal desire is



no longer fulfilled by motion, but needs to move in a certain way (“such and such a place”), toward a certain object (“such and such a thing”), and hence minimally “listens” to what perception or imagination have to say.

## 5. Beyond locomotion.

Again let us emphasize that the premise of sensation is particular, “*This (tode ti)* is such and such”, and that the premise of desire is universal. This necessary particularity of the sensed object negatively sheds light on the theoretical, apodictic or scientific syllogism, in that the latter will involve not simply sensation nor even memory and habit, but the emergence of an *eidos* (“this kind of thing”) out of particular experiences, thereby making possible *syllogismos* in the strict sense, and experience in a narrower sense:

“While, then, other [animals] live by impressions and memories, they have a small share in experience; on the other hand, the human race also lives by art and reasoning *logismoi*. In humans, experience comes out of memory, for many memories of the same thing brings to completion [*apotelousin*] a potency for one experience... But art comes to be whenever out of many conceptions [*ennoêmatôn*] from experience arises one universal judgment [*katholou hypolêpsis*] about similar things. For, whereas to have a judgment that this thing was beneficial to Callias when he was sick with this disease, and to Socrates, and one by one in this way to many people, belongs to

experience. But the judgment that it was beneficial to all such and such people marked out as being of one kind, when they were sick with this disease (such as sluggish or irritable people when they were feverish with heat), belongs to art.”<sup>85</sup>

Just as sensation involves a kind of *eidos* and forms a certain *logos*, and then, coupled with universal desire forms a certain *sylogismos*, this famous passage also suggests that human phenomena entails a yet different kind of *eidos* and *logos*. Animal locomotion differs from mere desire and from mere sensation by forming a *sylogismos* by means of a middle term that provides the relevance of sensation to desire; but animal locomotion also differs from art, *logismos* and scientific *sylogismos* by lacking the formation of an *eidos* beyond mere perceptions, memories, imaginations and habituation (the “small share in experience”). As can be seen from the quotation above, this *eidos* humans have access to falls between the particular and the universal such that the particular sensation is no longer simply subsumed under the universal premise of desire.

This explains exactly why, in the examples of the practical syllogism, Aristotle insistently uses the structure “whenever... then immediately...”: as involving distant sensation and the sensation of time, animal locomotion is predicated on temporal relations: *this*, then immediately (*euthus*) *that*... One can understand the limits of these relations since, taken exclusively, these relations are precisely conducive to the *post hoc ergo propter hoc* fallacy: to use the example of house building, the particular premise, “a house is a good”, holds immediately true because

houses have been *followed* by survival either naturally or experientially. Think of the impossibility of understanding a lunar eclipse by means of merely temporal relations: sensation may provide perfect information concerning the shaded look of the moon and the oblique rays of the sun, but nothing concerning the middle term, the earth itself, the observer herself.<sup>86</sup>

Then not all relations are spatial or temporal and not all *logismoi* take the form “whenever... then immediately...”. According to the rest of the quotation above, it is the possession of *logos*, this time in its human form, that gives humans access to causal relationships of “if... then...”, and this, not immediately (*euthus*), but according to a deliberation over contradicting interpretations of the relevance of the object sensed or imagined: “Is heat good *in this particular situation?*”, “Is marble good in the context of *this particular statue* to be erected on this particular occasion?”, “Is defying an enemy good in the context of *this* particular front of a battle in *this* particular political context?”, “Is it good to reject my friend *now?*”... Human action is irreducible to animal locomotion in that it not only *searches* by means of sensation and indeed subordinated locomotions, but also in that from the outset human action *interprets* the sensible and *searches by interpreting*.

Human *logos* is certainly not a superpower of humans at all, it does not even guarantee *any* success in practical affairs; if *logos* is a key, it is one that opens doors no more than the ones it can lock.

“For practical purposes, experience does not seem to differ from art; but we even see that the ones who are experienced are more successful than one who

have *logos* without experience. The reason is that experience is acquaintance of particulars, and art is of universals, whereas all actions and productions are concerned with the particular... So if one has *logos* without experience, is acquainted with the universal, but does not know the particular within [the universal], one will fail in one's treatment. For it is the particular that must be treated."<sup>87</sup>

With human beings the practical syllogism will become genuinely oriented toward action (*praxis*) instead of locomotion (*phora*): it will become practical in the literal sense, but also unimaginably impractical.

### C. RECAPITULATION AND REORIENTATION.

So far as this chapter is concerned, we have argued that sensation and locomotion exhibit the inherence of *logos* as “standard” by means of another sense of *logos*: “proportion”. Sensation “proportions” by holding on to the state of the sense organ together with that of the sensible object in their very difference: the sensing body is a body that takes note of things by discriminating them, a body in *krisis*. In “transperception”, this body senses distances by using mediums *as mediums*; in locomotion, it uses intermediaries *as intermediaries*, i.e. as middle terms that proportion or match or correlate transperception with desire. By means of sensation and locomotion, animal life exhibits that which elemental and vegetative fantasies try to repress: care, the sense of something *making a difference*.

As to the overall project of this dissertation, we started out with an investigation of the sense of *logos* as “standard” in the *Categories*, and claimed that its inherence is to be found in *inherently* motivated motions, i.e. natural motions: nutrition, reproduction, sensation and locomotion. In our previous chapter and in this chapter we have argued that all four lead us to a second sense of *logos*: “proportion” in a special sense we each time clarified. These four exhibit this inherence by precisely differing from mere growth, mere coming to be, mere alteration and mere change of place. Thus, nutrition “proportions” in the sense that it consists of holding on to formerly exclusive elements according to its own *logos* within the living beings body; reproduction is the same thing made this time inside the body of another; sensation “proportions” in the sense that it requires that the state of organ and that of

the object be held together in their relative differences; and finally, locomotion “proportions” universal desire with the particulars of the sensible world.

Thus, within our discussion of *logos* as “standard” or “essence” or “form”, we have seen another sense of *logos* at work: *logos* as “proportion” or “ratio”. We now offer a provisional conclusion concerning the meanings of *logos* in Aristotle: both of the latter uses refer to a common meaning: whether between “being” and “what it is for the being to be”, or between potency and being-at-work, or between contrary elements, contrary states, or between particular sensibles and the universal premise of desire, these uses of *logos* refer to a preservation of difference as difference, i.e. without collapsing one term to the other.

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What about the other two senses of *logos*: “reason” and “discourse”? Our following two chapters are devoted to these two meanings respectively. For here we are at the beginning of a story as much at the end of one. As we have seen in *On Interpretation*, there are beings whose motions are “the actualization of a potency as such”<sup>88</sup>, but their potencies are of a different kind, they are potencies according to *logos*.<sup>89</sup> We shall see that these beings are “slow deliberators” because their desire is problematic, for instance they can deliberately wish for impossible things; they are “sophisticated communicators” because they communicate more than they experience, have experienced or may experience first hand; and finally these beings

are “great hesitators” because they are not only sensing bodies in *krisis*, they move according how they *have* already interpreted or *do* interpret their sensations.

Hence these motions are more strictly called actions (*praxis*); and indeed these beings are humans. Now it is time to approach the human, and to start to understand better the way in which “the human being alone among animals has *logos*”.<sup>90</sup> As we shall see, this is best done, not by immediately singling out *logos* as “reason” and “discourse”, but by understanding how human *logos* holds on to desire and thought without letting one take over the other term, how humans are a source – “either thought infused with desire or desire fused with thinking.”<sup>91</sup>

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<sup>1</sup> DK22A9 from Aristotle’s *Parts of Animals*, I, 5, 645a22-23.

<sup>2</sup> *On the Soul*, II, 4, 415a23-415b2.

<sup>3</sup> *On the Soul*, II, 2, 413a26-413b1.

<sup>4</sup> *On the Soul*, III, 12, 434a26-30.

<sup>5</sup> *On the Soul*, III, 2, 426a8, 426a28ff. See also *On Sense and Sensible Objects*, 7, 448a9-13.

<sup>6</sup> DK22A9 from Aristotle’s *Parts of Animals*, I, 5, 645a22-23.

<sup>7</sup> As will be seen in what follows, indeed vegetal life (reproduction and nutrition) and animal life (sensation and motility) are certainly not exclusive options: all are forms of a life of desire. But reproduction and nutrition for animals are always possibilities involving and in fact mostly motivating sensation and locomotion, so that, although the ultimate purpose may be the same according to Aristotle, there is a fundamental difference between the nutrition of a plant and that of an animal.

<sup>8</sup> *On Sense and Sensible Objects*, 1, 436b10-12; *On Youth and Old Age*, *On Life and Death*, 1, 467b23-26; *On the Soul*, II, 2, 413a21ff; *Parts of Animals*, II, 10, 655b28ff.

<sup>9</sup> *On the Soul*, II, 5, 416b35. For the sake of clarity, we shall translate *allôiosis* by “alteration” and *pathê* by “affection”.

<sup>10</sup> *On the Soul*, III, 8, 431b21-22.

<sup>11</sup> *On the Soul*, II, 5, 416b35-417a1.

<sup>12</sup> *On Generation and Corruption*, I, 7, 323b3-11.

<sup>13</sup> *On Generation and Corruption*, I, 7, 323b11-16.

<sup>14</sup> *On Generation and Corruption*, I, 7, 323b18-19.

<sup>15</sup> For examples of Aristotelian synthesis of his predecessors views, see *Physics*, I, 2-6; *Metaphysics*, I, 3-10; or even the first book of *On the Soul*. Emblematic of this view of truth, not as exclusive of others’ views, but as inclusive of them, is the crisp statement at the beginning of

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*Metaphysics*, II: “The contemplation of truth is in one way difficult, but in another way it is easy. This is shown by the fact that neither can anyone touch it adequately (*axiōs*), nor can we miss it altogether.” (993a30-993b1) It is in fact this view of truth that entails the equally Aristotelian and more recurrent strategy of laying out the various meanings of words as they are used by his contemporaries, and as they were used and explained by his predecessors. Aristotle was no less in dialogue with his predecessors than his successors will be with him.

<sup>16</sup> *On Generation and Corruption*, I, 7, 324a3-5.

<sup>17</sup> *On Generation and Corruption*, I, 7, 323b32-34.

<sup>18</sup> For *logos* as “health”, see Nussbaum, Martha C., *The Therapy of Desire* (New Jersey: Princeton, 1994), p. 49ff. Compare Polyphemus’ “remedy” in our conclusion chapter.

<sup>19</sup> *Metaphysics*, XII, 1, 1069b4-6.

<sup>20</sup> *On the Soul*, II, 5, 417a7-8.

<sup>21</sup> *On the Soul*, II, 5, 417a8-10.

<sup>22</sup> *On the Soul*, II, 1.

<sup>23</sup> *On the Soul*, II, 5, 417a10-14.

<sup>24</sup> *On the Soul*, II, 5, 417a23-25.

<sup>25</sup> *On the Soul*, II, 5, 417a25-28.

<sup>26</sup> *On the Soul*, II, 5, 417a29-30.

<sup>27</sup> *On the Soul*, II, 5, 417a31-33.

<sup>28</sup> *On the Soul*, II, 5, 417a33-417b2.

<sup>29</sup> *On the Soul*, II, 5, 417b3-5.

<sup>30</sup> Franz Brentano, *The Psychology of Aristotle*, tr. Rolf George (Berkeley: University of California Press, 1977), pp. 54-55.

<sup>31</sup> *On the Soul*, III, 8, 431b21-22: “*hê psychê ta onta pôs esti panta.*”

<sup>32</sup> *On the Soul*, II, 5, 418a3-6.

<sup>33</sup> For Aristotle’s classical refutation of the Megaric view that reduces all potency, see *Metaphysics*, IX, 3.

<sup>34</sup> *Physics*, VII, 2, 244b12-15.

<sup>35</sup> *On the Soul*, II, 12, 424a17-24. For another instance of wax being used as a metaphor of receptivity, see *On Memory and Recollection*, I, 44931-450b1.

<sup>36</sup> *On the Soul*, II, 12, 424a25.

<sup>37</sup> *On the Soul*, II, 5, 417b23; *Posterior Analytics*, I, 31.

<sup>38</sup> *Posterior Analytics*, I, 31, 88a3-5; II, 19; *On the Soul*, II, 5, 417a30-417b2; perhaps also *Metaphysics*, I, 1.

<sup>39</sup> *On the Soul*, II, 12, 424a25-28.

<sup>40</sup> *On the Soul*, II, 12, 424a29-32.

<sup>41</sup> *On the Soul*, II, 12, 424a32-424b3.

<sup>42</sup> Heraclitus, DK22B51. Quotations from Presocratics follow the Diels-Kranz edition. We are following Hippolytus in reading *homologeēin* (“agreeing”, “having the same *logos*”) instead of *xumpheretai* (“bring together), and *palintropos* (“backwards”). Kirk and Raven cite Hippolytus as “the fullest source” in the context of this fragment. (G. S. Kirk, J. E. Raven and M. Schofield, *The Presocratic Philosophers*, (Cambridge: Cambridge University Press, 1983) p. 192)

<sup>43</sup> *On the Soul*, III, 2, 426b7-8.

<sup>44</sup> *On the Soul*, III, 13, 435a22-24.

<sup>45</sup> *On the Soul*, II, 11, 424a3-7; III, 2, 426b10-23; III, 3, 427a17-21; III, 9, 432a15-17; *Posterior Analytics*, II, 19, 99b35; *On the Motions of Animals*, 6, 700b20. See also Michel Nancy, “Krisis et Aisthesis”, in *Corps et Âme – Sur le De Anima d’Aristote*, ed. Cristina Viano (Paris: VRIN, 1996), pp. 239-256.

<sup>46</sup> *On the Soul*, III, 12, 434b18.

<sup>47</sup> *On the Soul*, III, 12, 434b15.

<sup>48</sup> *On the Soul*, III, 12, 434b15-16.

<sup>49</sup> We risk this neologism, “transperception”, because “distant perception”, which would be a more obvious rendering of the phenomenon at hand, in fact misses what is crucial to it: indeed “transperception” is the sensation of a distant object, but it is the mediation that is crucial and not



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simply the distance. Distant perception too easily takes us to the realm of the visual in which mediation is least obvious.

<sup>50</sup> *On Memory and Recollection*, 2, 452b23-24.

<sup>51</sup> *On Memory and Recollection*, 2, 452b15-17.

<sup>52</sup> The terms “distant sensation” and “sensation of time” are not stretches of the Aristotelian terminology. He in fact name this anticipatory sensation “*proaisthêsis*” (*On Sense and Sensibles*, 1, 436b21), and insists, as we shall see, that some animals have a “sensation of time” (*On the Soul*, III, 10, 433b8; see also *On Memory and Recollection*, 2, 452b8) – all functions of the “common sensory power”. (Cf. Jean-Louis Barrière, *Langage, Vie politique et Mouvement des animaux*, (Paris: VRIN, 2004), pp. 179-180.)

<sup>53</sup> *On Memory and Recollection*, 1, 450a9-13.

<sup>54</sup> *On the Soul*, III, 1, 2.

<sup>55</sup> *On the Soul*, III, 10, 433b8.

<sup>56</sup> *Nicomachean Ethics*, III, 5, 1112b20.

<sup>57</sup> *On the Soul*, III, 12, 434a34-434b9; 434b25-30.

<sup>58</sup> *Parts of Animals*, II, 10, 656a27-28; *On Sense and Sensible Objects*, 2, 439a2-5; *On the Motions of Animals*, 11, 703b22-23.

<sup>59</sup> See Chapter II, second section.

<sup>60</sup> *On the Soul*, III, 10, 433b26; *On the Motions of Animals*, 10, 703a19-20

<sup>61</sup> *On the Soul*, II, 3, 414b4-7; also see II, 2, 413b24-25; III, 9, 432b29-30.

<sup>62</sup> *On the Soul*, II, 4, 415b1-3.

<sup>63</sup> René Descartes, *Méditations Métaphysiques*, “Meditatio Secunda”, 29.11-18, (Paris: Flammarion, 1979), p. 80: “Idem denique ego sum qui sentio, sive qui res corporeas tanquam per sensus animadverto: videlicet jam lucem video, strepitum audio, calorem sentio. Falsa haec sunt, dormio enim. At certe videre videor, audire, calescere. Hoc falsum esse non potest; hoc est proprie quod in me sentire appellatur; atque hoc praecise sic sumptum nihil aliud est quam cogitare.”

<sup>64</sup> Appetite without sensation is here out of the question since this is the case of plants which we dealt with in our previous chapter.

<sup>65</sup> *On the Soul*, III, 10, 433a20-21: “Imagination too, whenever it moves, does not move without appetite.”

<sup>66</sup> *On the Soul*, III, 9, 433a3-6: “As a whole we see that the human being that has the healing art does not heal, so that there is something else that governs the making according to knowledge, but it is not knowledge itself.”

<sup>67</sup> *On the Soul*, III, 10, 433a23-24: “Now, *nous* does not appear to move without appetite.”

<sup>68</sup> *On the Soul*, III, 10, 433a10-13.

<sup>69</sup> *On the Soul*, III, 10, 433a14-15.

<sup>70</sup> Let us note that this famous expression is not found in Aristotle. See Jean-Louis Barrière, *Langage, Vie politique et Mouvement des Animaux*, (Paris: VRIN, 2004), p. 195ff. See also Pierre-Marie Morel, *Aristote* (Paris: Flammarion, 2003), pp. 80-89.

<sup>71</sup> For the “universal premise of desire” see also Martha C. Nussbaum, *The Therapy of Desire* (New Jersey: Princeton, 1994), p. 81.

<sup>72</sup> *Movement of Animals*, 7, 701a32-33; *On the Soul*, III, 11, 434a17-22.

<sup>73</sup> *On the Soul*, III, 11, 434a18-20.

<sup>74</sup> The reason why Aristotle puts the question of motion and action in terms of the continuity and intermittence of *nous* is presumably that he has in mind views, such as Anaxagoras’, according to which *nous* would be the *arkhê* of all. See, indeed, *Metaphysics*, I; *Physics*, I; *On the Soul*, I.

<sup>75</sup> *On the Motions of Animals*, 7, 701a7-13.

<sup>76</sup> *On the Motions of Animals*, 7, 701a13-19.

<sup>77</sup> *Nicomachean Ethics*, VI, 4, 1140b3-5.

<sup>78</sup> *On the Soul*, III, 10, 433b26.

<sup>79</sup> *On the Soul*, III, 9, 432b29-31.

<sup>80</sup> *On the Soul*, II, 5, 417b2022-23; III, 11, 434a16-21; *Posterior Analytics*, I, 31, 87b28ff; *Nicomachean Ethics*, VII, 5, 1147a25-26.

<sup>81</sup> *Movement of Animals*, 7, 701a6-8.

<sup>82</sup> *Movement of Animals*, 7, 701a9, *On the Soul*, III, 11, 434a7-10.

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<sup>83</sup> *On the Soul*, III, 11, 434a18; *Nicomachean Ethics*, VII, 3, 1147a27, 35; *Movement of Animals*, 7, 701a32, 33.

<sup>84</sup> *On the Soul*, III, 10, 433b6; III, 11, 434a17; *Nicomachean Ethics*, VII, 3, 1147b1ff.

<sup>85</sup> *Metaphysics*, I, 1, 980b26-981a13.

<sup>86</sup> We are indeed combining the recurrent examples of Aristotle in the *Posterior Analytics* and the “cave allegory” in Plato’s seventh book of the *Republic*.

<sup>87</sup> *Metaphysics*, I, 1, 981a12-23.

<sup>88</sup> *Physics*, III, 1, 201a11-12, 200b27-28.

<sup>89</sup> *On Interpretation*, 9, 13; *Metaphysics*, IX, 2, 5.

<sup>90</sup> *Politics*, I, 1, 1253a10-11.

<sup>91</sup> *Nicomachean Ethics*, VI, 2, 1139a36-1139b7.

## V. HUMAN ACTION.

### *LOGOS IN THE NICOMACHEAN ETHICS.*

“Character is human being’s *daimon*.”

Heraclitus.<sup>1</sup>

How is the inherent *logos* of humans instantiated, no longer in natural and animal motion, but in specifically human action?

In our argumentative survey of the usages of *logos* in Aristotle’s philosophy, we inquired into the meaning of “*logos* of being” in the *Categories*, put forward the question of its *inherence* in the context of *On Interpretation*, and in our last two chapters exhibited how Aristotle’s *Physics* and *On the Soul* answer this question by means of internally motivated motions in natural and animal life respectively. We tried to show concretely how the two major senses of *logos* in these contexts, namely “standard” and “proportion” refer back to one focal meaning: a relation between terms that until then were exclusive of or indifferent to one another. We have yet to see the last two senses of *logos* in Aristotle: “reason” and “discourse”.

“The human being alone among animals has *logos*”.<sup>2</sup> Of the three components of this definition, namely, *zôion*, *ekhein* and *logos*, we developed the first in our last chapter, this chapter shall be devoted to the second, and our final chapter to the third, to human *logos* as such. What does *ekhein* mean in the famous Aristotelian definition of human being? In what sense does the human being *have logos*? Why is it that

Aristotle defines human beings not as animals that *do* something or *are* such and such, but *have* something? What are the missing links between *ekhein* and *êthikê*?

In this chapter, we shall take up three cognates of the verb *ekhein*: *ethos*, *hexis*, and *êthos*, in order to gradually narrow down the scope of the human relation to *logos*. The following passage from the *Nicomachean Ethics* on human desire will be our guiding text:

“The appetitive part or the desiring part in general somehow partakes [in *logos*] insofar as it listens to and can obey it in the sense in which we say ‘taking account [*ekhein logon*] of both one’s father and one’s friends’.”<sup>3</sup>

## A. *ETHOS*.

For Aristotle nature is governed by desire, the desire for reproduction, for being a parent:

“the most natural work for living beings... is to make another like itself: an animal making an animal, a plant a plant, so that they may partake in the eternal and divine in the way they can. For all things desire that, and do everything they do by nature for the sake of it.”<sup>4</sup>

In compensation for the limitations and mortality in the sublunar region, the most profound natural satisfaction is to reproduce and thus to *be in* another.

The same holds true in humans, except that humans manage to *be in* another not by simply bringing an offspring to life, but by continuously *acting, making* and *doing* things to their offspring long time after they are born<sup>5</sup>; for them, giving birth is only the beginning of giving life, and “reproduction” is coupled with a subsequent and lengthy “production” of the self-sufficient and mature human individual. Hence human attachment to their children is an attachment not only to something they simply *are at work in*, not only to their chance for eternity, but also to a product *and* a project they *work at*:

“Every artist loves its own work more than it would be loved by the work if it were ensouled... The reason of this is that all things desire and love to be; and

it is at-work, i.e. in living and acting, that we *are*; and, being at work, the maker is in a way the work; so he loves the work and thereby loves to be.”<sup>6</sup>

As to the perspective of children, on the other hand, being “objects” of such profound love, “products” of such long effort and “projects” involving such continuous care, they take on not only the look of their species and of their parents, but also their invisible aspects: their values, their emotions, their behavior, their accents and even their unrealized potentials. Parents then may well succeed in *being in* their offspring and *speak from within* their children even the words they were unsuccessfully looking for all their life. This inheritance is so immediate that it can be recognized by children neither as an *inheritance*, nor as *an* inheritance among possible others.

But there is a twist, at least for Aristotle. Paradoxically it is precisely when parents finally *are in* their offspring, precisely when they speak and act *from within* their children that the latter begin being what they were supposed to be all along: self-sufficient and independent mature beings; not only bundles of natural and environmental effects and internalized *habits (ethos)*, but *characters (êthos)* with balanced ways of *bearing themselves* in relation to different situations (*hexis*) – not only the heirs of their parents, but friends to others in much larger contexts and projects than that of the household. The children’s desire fulfills itself not simply by keeping on *being* what they already are, namely products of the desire of their parents, but by *no longer being with them*, by being with others, by being exposed to a realm of experiences and perspectives they never had first hand, by listening to

others and by *earning* recognition from them. It is this development of human desire through her familial circle into a necessarily *open* environment that we shall explore in this chapter.

### 1. An unpractical syllogism.

Somehow, human desire can “listen” in the sense of “taking account” (*logon ekhein*). Since we shall see only gradually what this listening may involve in this and the following chapters, for now let us make a textual remark concerning the way this listening and taking account takes place in our focal passage from the *Nicomachean Ethics*: *houtô dê kai tou patros kai tôn philôn phamen ekhein logon*.<sup>7</sup> We translated this ambiguous clause as “[the desiring part of the human soul listens to *logos* and can obey it] in the sense in which we say ‘taking account [*ekhein logon*] of both one’s father and one’s friends’”. We did so in order to emphasize what appears to be an emphatic conjunction (*kai... kai...*) unlike other translators who disjoin the two and thus render the conjunction unemphatic<sup>8</sup> or even render it as a disjunction.<sup>9</sup> As arguing for a focal meaning of *logos* characterized by its inclusiveness, we shall show that this apparently local ambiguity has significant implications insofar as it allows us to negotiate between an uncritically “rationalistic” definition of human beings by *logos* and an understanding of humans as “either thought infused with desire or desire infused with thinking through”.<sup>10</sup>

Insofar as it can “listen”, human desire is then infused with thinking through (*dianoêtikê*), or conversely, its sensation, imagination, memory or thinking in general

is infused with desire (*orektikos*). In either case, the human soul is defined as inclusive, as an infusion and even perhaps a certain confusion. Hence, whereas the so-called “practical syllogism” applied to animal locomotion involves the subsumption of the particular premise of sensation under universal premise of desire by means of a middle term as we have seen in our last chapter, in the case of the human soul the particular sensuous premise is fundamentally complicated in that humans are capable of a certain hearing, that they are in a position both to *interpret* and to *have interpreted* the particular situations in contrary ways. Instead of being a univocal object of pleasure and pain, one and the same particular *may well* be conducive to good *as well as* to bad in the eyes of human beings, and conversely the human good is such that it *may well* lie in this particular action *or* in its contrary.

In Chapter II, we saw that Aristotle specifies these potencies as “potencies with *logos*”.<sup>11</sup> Regardless of whether we here translate and interpret *logos* as “reason”, it is no coincidence that these potencies instantiate the central meaning of *logos*: the human soul not only holds together the universal and the particular in order to literally spill into locomotion, but it also holds possible contrary interpretations of the particular sensible or imagined object, and thus exhibits not only a motion or change, but action. “We see that the source of that which will be is also something relying on deliberation and action.”<sup>12</sup> The practical syllogism of animal locomotion takes the “unpractical” form of *praxis* in the human realm. To understand human action, we indeed must first take a look at the specificity of the human soul it results from.<sup>13</sup>



## 2. A tripartite soul.

No wonder that Aristotle's account of the soul *in general* in *On the Soul* breaks off abruptly with a cryptic mention of "hearing" and an undeveloped concept of "tongue": "[The animal has] hearing so that it something may be signified to it, and a tongue so that it may signify something to another."<sup>14</sup> For, his account of the specifically human soul waits indeed for the *Nicomachean Ethics*.

In the *Nicomachean Ethics*, Aristotle's criterion for dividing the human soul is no longer different forms of inherently motivated motions<sup>15</sup>, but directly *logos* itself: "one part is *alogos*, while the other has [*ekhon*] *logos*."<sup>16</sup> Remembering the famous exclusive attribution of *logos* to humans in the *Politics*<sup>17</sup>, one may infer that the human being is distinguished by *logos* not only from other animals, but also within its own soul. For the time being, it seems as if both the world and the human soul are somehow infused with *logos*, but neither is so through and through.

The analysis of the human soul however necessitates a distinction besides the one between the *alogos* and *logos*. For, whereas nutrition and growth (activities of sleep at least as much as of waking, nutrition being the cause of sleep<sup>18</sup>) are simply *alogos*<sup>19</sup>, there is another part between this *alogos* part of the soul and the one that has *logos*: "some other nature that, while being *alogos*, in a way partakes [*metekhousa*] in *logos*."<sup>20</sup> This relation to *logos* can be seen from its lack, when this part "fights against and resists *logos*".<sup>21</sup> Since one can fight or resist only that to which it is neither identical or indifferent, there must be an intermediary part distinct both from the vegetative part and the part of the human soul that has [*ekhon*] *logos*.<sup>22</sup>

If there is an intermediary part of the human soul between the *alogos* and *logos* such that this intermediary part “has” *logos* and can resist and fight it, this “having” (*ekhein*) cannot take the form of *syn-ekheia*, of mere continuity or coherence. But further, if this *ekhein* takes the form of *metekhein*, of “partaking in” in the two quotations Aristotle insists that this is not exact or clear enough (“in a way”, “somehow”).<sup>23</sup> How does this intermediary part *have logos* such that this relation is neither mere fusion nor external and intermittent participation? What is this *ekhein* that is neither *syn-ekheia* nor exactly *met-hexis*?<sup>24</sup>

Although Aristotle explicitly leaves open the nature of the distinction between the “parts” of the soul<sup>25</sup>, it is clear that the human soul can be neither monolithic nor simply heteroclitite. In other words, it can be neither the Cartesian *res cogitans*, nor indeed a *res extensa*, nor a conjunction of the two.<sup>26</sup> For, in the first case there is nothing to resist or adhere to *logos*, in the second case there is no *logos* to resist or adhere to, and in the third case the two parts, somehow adjacent, have nothing to do with one another. The Cartesian mind and body are “metaphysical neighbors” in comparison to the Aristotelian tripartite model of the human soul: they are born so far from one another that they are certainly not relatives, and they live infinitely far from one another that they never come across one another and become friends or enemies. To put it in another way while using this time a Hobbesian terminology, if human action is a result of a process of resistance or adherence, fight or concordance, this implies that action can be reduced neither to an involuntary motion, nor to a voluntary motion which are the “psychic servants” of the former.<sup>27</sup>

In Aristotle, if the human soul has parts, these are not put side by side, but set in tension *against* one another: “while we see the erratic member [in a spasm] in bodies, we do not do so in the case of the soul”.<sup>28</sup> This tripartite structure makes it such that the human soul is capable of a special kind of spasm, an “invisible” stretch different from the kinds of stretch we noted in our previous chapters on nature: here the stretch takes the form not only of tension, but of explicit resistance, obstinacy and fight, or explicit adherence and consonance. And even these latter terms are inadequate because they are supposed to explain human phenomena by means of physical phenomena, suggesting that the intermediary part sticks to or echoes *logos*. To use an etymologically more accurate term, the intermediary part is “obedient” to *logos*, in the sense of “hearing it out”: the intermediary part is not simply determined by *logos*, but rather gives ear to it, and precisely so as to be able to resist it. This is resistance, and not friction; it is fight, and not clash. My gluttony with regard to sweets disobeys *logos* in a way fundamentally different way from the consistency of my bones and sinews; conversely, my eating habits are obedient to *logos* in a way fundamentally distinct from the way the furniture in my apartment yield to my arrangement. This “tension” results from the intermediary part’s “attention” to *logos*.

If then the intermediary part obeys *logos*, it is not because it yields to it, but because it has “given ear” to it. The relation between obedience and audience is not only etymologically found in Latin, but emphasized in many Aristotelian texts as well as our focus text:

“At least the [intermediary part] of the self-restrained person obeys [peitharkhei] *logos*, and then that of the temperate and brave is best-hearing [euêkoôteron], for all harmonize [homophônei] with *logos*. It appears that the *alogos* [part in the human soul] is twofold. For the vegetative part does not share in *logos* at all, whereas the appetitive part or the desiring part in general somehow partakes [in *logos*] insofar as it listens to [katêkoon] and can obey it [peitharkhikon] in the sense in which we say ‘taking account [ekhein *logon*] of both one’s father and one’s friends’.”<sup>29</sup>

Our translation tries to render the strong emphasis on the argumentative, almost forensic and political environment of the human soul, because we are trying to highlight the fact that, for Aristotle, the human soul is distinguished from the animal soul *neither* by being simply rational, *nor* by having a rational and an irrational part that lay side by side or are mixed indifferently, but by its inclusion of an explicit relation between its parts, of a realm where they confront one another, where they may well explicitly resist and fight one another, make compromises or come to a consensus. As distinct from dualistic or monistic conceptions of the human soul, Aristotle’s tripartite human soul resembles an agora.

Whereas animal sensation is subtended by intermediary *degrees* of pleasure and pain, the human soul then has an intermediary *part*. Human receptivity of particulars entails an act of questioning, a task of interpretation, and thus an environment of negotiating. A knife, a retreat in battle, a glass of wine, a payment, lumber, hemlock: the sensation, memory or imagination of these particulars does not

necessarily spill into an immediate evaluation as to the *degree* of pain and pleasure they may entail and a consequent motion, they also trigger what Aristotle compared to the attention one lends both to one father or friends. Hindering the smooth and immediate functioning of the so-called “practical syllogism” of animal locomotion, it is this possibility of attention of the intermediary part that will assume a central function in the emergence of human action.

### 3. A kind of learning.

What then is “in” the intermediary part? Potencies? No. In chapter III we saw how the soul is an *already developed state* of a body having life in potency and how it is indeed by nature that the human soul has these potencies ready to work:

“Whatever grows by nature in us is bestowed on us first as potencies, we display their being-at-work later. This is clear with the senses: we did not acquire the senses by repeatedly seeing or hearing, but the other way around: having them, we used them; we did not get them by using them.”<sup>30</sup>

Besides the vegetative part, human action and life are characterized by the two other parts, and as Aristotle continues we see that their development involves an almost opposite process:

“[*These*] perfections, we acquire by first putting them to work (*energêsantes*), just as we do other arts. For the things that one who has learned them needs to do, we learn by doing, just as house-builders become so by building houses or harpists by playing the harp.”<sup>31</sup>

Whereas one becomes capable of sight through an embryonic development of *not seeing at all*, one becomes a harpist *by playing*.

If not potencies, what then “is” in the intermediary part? Habits.<sup>32</sup> Perhaps the intermediary part is somehow habituated by *logos*, and this relation of *ekhein* is reflected neither in *synekheia* nor in *methexis*, but in the Ancient Greek word *ethos*. Where do habits come from? The name Aristotle gives to the process of acquiring habits by first being-at-work is also stated right out: the verb *manthanesthai*, or the noun *mathêsis*, “learning” in a loose sense that we must specify. Habits are “put” in the intermediary part by some kind of learning.

What kind of learning? For, to say the least, other animals partake in learning according to Aristotle:

“By nature, then, all animals have sensation; from this, some acquire memory, some do not. Accordingly the former are more intelligent and more capable of learning [*mathêtikôtera*] than those that cannot remember; those animals which are not capable of hearing sounds [*tôn psophôn akouein*], such as the bee and any other similar kind of animal, are intelligent but lack learning

[*aneu tou manthanein*]. Whatever animal has this sense besides memory learns [*manthanei*].”<sup>33</sup>

The hierarchy between sensation and memory is clear: memory implies sensation, not the other way around; further memory enhances intelligence and indeed the capacity to learn. But the capacity to learn, unlike intelligence, also requires what Aristotle calls the “hearing of sounds” besides memory. In short, this sense of learning requires both memory and the “hearing of sounds”.<sup>34</sup> This is why bees, which for Aristotle have a share in the divine<sup>35</sup>, are unable to learn.

Which animals then are capable of “hearing sounds” and thus of being taught and of learning, and thereby of being formed by habits? One answer is found in the *Parts of Animals*: “all [birds] use their tongues also as a means of interpretation [*proshermêneian*] with one another, and some to a larger degree than other, so that there even seems to be learning among some.”<sup>36</sup> A more specific answer is found in the *History of Animals*:

“Among small birds, while singing some utter a different voice than their parents if they have been reared away from the nest and have heard [*akousôsin*] other animals sing. A hen nightingale has before now been seen to teach [*prodidaksousa*] her chick to sing, suggesting that song does not come by nature as *dialektos*<sup>37</sup> and voice does, but is capable of being shaped [*plattesthai*].”<sup>38</sup>

As a process of acquiring habit, the emphasis in learning here seems to be the fact that it is acquired in relation to the animal's environment and not necessarily from its natural parents. The intermediary part of the human soul then includes habits, and these latter are generated not as natural potencies are, but they are shaped or formed by the environment. And "hearing sounds" is precisely hearing them for the sake of not only remembering them, but repeating them.

#### 4. A kind of imitation.

One can see the extent of learning in the sense of acquiring habits: it is imitation. The *Generation of Animals*<sup>39</sup>, the *Rhetoric*<sup>40</sup>, even the non-Aristotelian *On Things Heard*<sup>41</sup> support this interpretation as the *Poetics* does:

"Generally there seems to be two causes of the poetics, both natural: for imitation is innate to human beings beginning from childhood (and humans are distinguished from other animals because it is most imitative and does its first learnings through imitation) and all like imitations. A sign of this is what happens in the facts: for we take pleasure at watching the most precise images of things which we would look at with pain, such as the looks of most ignoble beasts and dead bodies. The reason of this is that learning [*manthanein*] is most pleasurable not only to the philosopher, but also to all others – although not much is common between them. Thus the human being likes to see images



because while watching they happen to learn [*manthanein*] and to infer [*sylogizesthai*] what each one is, such as this one is so and so.”<sup>42</sup>

This informative passage is also ambiguous, although Aristotle explicitly says that the causes of poetic activity are two: on the one hand, there is a natural inclination in human beings to imitate, which constitutes their “first learnings”; on the other hand, there is an equally natural liking of the *sight* of imitations, of the information it provides and of the syllogism it triggers (we would rather call this an *analogy*): this two dimensional image has a snub nose and a such and such forehead and beard, Socrates has the same features, therefore this is an *image of Socrates*, homonymously this *is* Socrates...<sup>43</sup> But the difference between the two cases is crucial: the second case is a more or less disinterested sensation of a representation which, as disinterested, requires the awareness of representation as the representation it is, in order to provide the middle term of the above mentioned syllogism: it is the *commonness* of the nose’s shape, and not its selfsameness, that implies that the image is *not really* Socrates himself.

In the first case, which is our object, the awareness of the representational character of the representation is not necessary, since this first natural tendency Aristotle mentions is to imitate and imitation does *not* require the awareness of something as being *represented*. Imitation may well be mere immersion, and seems to always start out by being so for Aristotle. The bird that imitates the song she hears does not do so *as* an imitation. She mirrors rather than she represents; she repeats rather than she forms an analogy; she echoes rather than she infers. Note that the

*natural* inclination to imitate brings it about that humans, but also small birds, are *naturally* inclined to acquire and reproduce behavior that are *not* innate to them. Here is prefigured a natural tendency to precisely transform the “innate”.

### 5. The limitation of *ethos*.

Where then do habits come from, unlike the innate potencies of the vegetative part? From the environment. The acquisition of habits takes the form of a learning through mere imitation. While the vegetative part of the soul at birth is ready to do its own work, the intermediary part is naturally ready to do what others do. While nature takes care of the reproduction of the life form and the corresponding development of the vegetative faculties, after that, nature leaves the care of the “reproduction” of the rest to the living being’s environment: “a human being generates a human being” by nature, but it is by learning that a certain song survives across generations.

In a way the tendency to imitate is the reversal of sensation: instead of *receiving* the form of external objects in sensation, the imitating animal is “impregnated” by them, she “reproduces” them in her body, she “becomes” them. Imitation is almost a regression from sensation back into nutrition and reproduction: in fact children’s surprising capacity of remembering and their short but intense attentiveness to the world are often likened to the sucking capacity of a sponge, a fertile soil. This is why “whether one is habituated from childhood this way or that way makes no small difference, but rather a great difference, or rather all the difference.”<sup>44</sup> Between nature and *logos*, then, the intermediary part acquires habits

by means of learning, which takes the form of imitation or immediate repetition. Between *alogos* and *logos*, the intermediary part then seems to be the part that is trained and habituated by *logos*.

Should we then understand the way in which human beings *have (ekhei) logos* as habit (*ethos*)? But habit does not quite match the kind of taking account (*ekhein logon*) of *both* one's father *and* one's friends.<sup>45</sup> As we saw, the bird can learn the songs she hears other birds no less than from her natural parents. The bird's habituation preserves the difference between parents and others much less than its renders it gratuitous: she adapts herself to other birds regardless of whether they are her parents and her "friends". If we took account of others in the sense of imitating what they do, Aristotle would not insist that our desire "gives ear" to *logos*; and if we take account of anybody, regardless of whether they are our fathers *or* friends, then Aristotle would not mention the latter two, but say "others" as in the end of *On the Soul*.<sup>46</sup> Is it exact to say that, to return to Aristotle's examples, house building and harp playing are *habits*?

The kind of *ekhein* which characterizes our having *logos* as humans and our taking account of our fathers and friends does not seem to be fully captured by *ethos*. Habit allowed us to move beyond the fulfillment of simply innate potencies into the intermediary part of the human soul, and yet it does not appear to be the form of having that lends insight into the way humans have *logos*.

## B. *HEXIS*.

### 1. A new kind of listening.

If not *ethos*, then what is the way in which humans distinctively have (*ekhei*) *logos* in the sense that human desire listens to *logos* “in the sense in which we say ‘taking account [*ekhein logon*] of both one’s father and one’s friends’”?<sup>47</sup> Besides the above quoted passage from the *Metaphysics* that enables us to distinguish human beings and some other animals from, say, bees, by the criterion of “hearing sounds” (*tôn psophôn akouein*) and habituation and learning, we now need to make a further step in order to gain insight into specifically and essentially human growth. We shall do so by introducing here a passage from the *Politics* which brings together the concepts we introduced such as hearing, obeying, persuasion, harmony, learning and habit, but also brings up questions opening up a new perspective:

“There are three things by which human beings are made good and serious; these three are nature, habit and *logos*. For first one must be born [*phynai*] a human being and not any other animal, thus must have a certain body and soul. But there are some qualities that are of no use to be born with, for our habits make us revert them; in fact by nature some are liable to become for the worse or for the better by habits. So other animals mostly live by nature, some do so to a small extent by habits too; but the human being lives by *logos* as well, for only the human being has *logos*. So that these [three] must be

harmonized [*symphônein*]. For human beings often act [*prattousi*] contrary to habituation and nature because of *logos*, if they are persuaded [*peisthôsin*] that some other way of acting is better. Now, we have already delimited the natural property of those who are to be amenable to the hand of the legislator. The work left to do is education, for humans learn some things by being habituated, others by listening [*akouontes*].”<sup>48</sup>

We shall return to this passage at the end of our next chapter. For the time being, the very end of this passage introduces the questions that will allow us to make a step forward: What is this latter and specifically human kind of listening or hearing that is distinct not only from hearing as mere sensation (*akoê*), but also from the “hearing of sounds” (*tôn psophôn akouein*) that characterizes learning and habit? Is it the kind of hearing we have encountered in our focal text that claims that human desire listens to *logos* “in the sense in which we say ‘taking account [*ekhein logon*] of both one’s father and one’s friends’”?<sup>49</sup>

Let us start out by negative results that may narrow down the field of our research: according to this passage from the *Politics*, the intermediary part of the human soul is not simply a receptacle of natural potencies and habits. For Aristotle, the human soul is not a blend of innate motions and environmental stimuli. The Aristotelian tripartite human soul is no more divided between the *a priori* and the *a posteriori* than between desire and thought<sup>50</sup>; the human soul is no more split between nature and nurture than between the rational and the irrational. Just as the latter dichotomy lacks the intermediary part, the former eliminates *logos* all together;

the second omits “childhood” as the second omits “maturity”, thus both omit the difference between the two and disable us from understanding the life of a soul having both aspects.

Thus, it is exactly here that we shall see the function of *logos*: “For human beings often act contrary to habituation and nature because of *logos*, if they are persuaded that some other way of acting is better.”<sup>51</sup> If there is to be *both* a childhood *and* a maturity, *both* the development of the intermediary part *and* that of the part having *logos*, the human soul cannot be analyzed into acquired habits and natural impulses all the way down. Habits cannot remain quantifiable atomic stimuli and thus be simply contrasted to innate “faculties”; habits cannot be simply accumulated; there must be something formed out of habits.

What then does human action involve that is irreducible both to motion and to passively undergoing and repeating? Natural potencies of the soul are reserved to the vegetative part and, as we have seen in Chapter III, these are developed organs ready for work; on the other hand, habits as passive exposure (*paskhein*) to and immediate repetition of environmental *pathê* cannot resist or obey *logos*, it repeats without listening or taking account (*logon ekhein*). What then does emerge in the intermediary part? What does human education involve that is neither a potency actualized at birth, nor internalized first hand experience?<sup>52</sup> If it is neither *syn-ekheia*, nor *met-hexis*, nor even *ethos*, then what is the substantive form of *ekhein* in relation to *logos* that makes sense of being compared one’s taking account of “both one’s father and one’s friends”?

## 2. *Hexis*.

The answer is *hexis*, which we shall translate as a “positive state”.

“In a word, from similar activities [*energeiôn*] positive states come to be. Hence it is necessary to make our activities to be of certain sorts, for the positive states follow from the differences among these.”<sup>53</sup>

Positive states are the basic constituent of the intermediary part of the human soul; beyond habit, positive states build up human character (*êthos*). Neither nature (*physis*), nor environment (*ethos*), but positive states make up human *êthos*, the real *daimôn* of human life according to Heraclitus.<sup>54</sup> And the *Nicomachean Ethics* is Aristotle’s “book of positive states” as much as his *Physics* is his book of motion and rest.

“There are three things that come to be in the soul: feelings [*pathê*], potencies and positive states... By feelings, I mean desire, anger, fear, confidence, envy, joy, affection, hatred, yearning, jealousy, pity, and generally those things which are accompanied by pleasure or pain. By potencies, [I mean] those things in accordance with which we are said to be apt to undergo [*pathêtikoi*] these, such as those by which we can feel anger or be annoyed or feel pity. By positive states, [I mean] those things in accordance with which we bear ourselves well or badly toward feelings [*kath’ has pros ta pathê exomen eu ê*

*kakôs*]; for instance, in relation to being angry, if we are that way violently or slackly, we bear ourselves badly, but if in a measured way, we bear ourselves well, and similarly in relation to other feelings.”<sup>55</sup>

This crucial passage gives us a clue as to why Aristotle defines humans as animals that neither *are* of a certain kind, nor *do* certain things, but *have* (*ekhei*) something, because this passage introduces a sense of *ekhein* and *hexis* that is not emphasized in other analyses of these terms in the Aristotelian corpus.<sup>56</sup> Aristotle here defines *hexis* as “those things in accordance with which we bear ourselves well or badly toward feelings”, *kath’ has pros ta pathê exomen eu ê kakôs*. Human beings do not simply undergo (*paskhein*) fear or confidence, they are not only influenced by (*hypo*) them, they maintain a relation to (*pros*) them; human beings neither simply act (*prattein*) in fear or confidence, nor even *are* they (*einai*) simply afraid or confident; human beings bear themselves well or badly in relation to these feelings. If humans are defined neither by something they *are* nor by something they *do*, but by something they *have* (*ekhein*), this may well be because *hexis* is irreducible to something humans simply *are* or *do*.

Human beings feel anger in a way fundamentally different than a combustible set on fire: however trivial it may be, it is important to highlight that for Aristotle humans never really *burst* in anger, fear never literally *consumes* their heart, the human soul is never literally *set on fire* by love.<sup>57</sup> There is an aspect of the human soul *in which* it *undergoes* pleasure or pain (all sensation entails pleasure or pain<sup>58</sup>), but also *out of which* it *bears itself* toward these feelings. This is why positive states



can neither be substituted by or to habits, feelings and natural potencies; they grow *out of* them. Human growth is such that it requires this *other* growth. For Aristotle, *hexis* is the proper subject matter of ethics, and this is why the *Nicomachean Ethics* is far more deeply related to the *Politics* than to *On the Soul*.

### 3. Freedom.

Let us flesh out *hexis* by distinguishing it from *ethos* in our previous examples. Is there a strong sense in which harp playing (a positive state) is distinct from the singing of a bird (a habit)? Both are indeed examples of those apparently paradoxical activities that we become capable of by precisely exercising; they both illustrate the way habits *stick* by means of repetition in distinction from natural potencies: “Being carried down by nature, a stone cannot to habituated to be carried upwards even if one were to habituate it by throwing it upwards ten thousand times; nor can fire be habituated to be carried downwards...”<sup>59</sup> How then does harp playing differ not only from the falling of a stone or the burning of fire, but also from the singing of a bird?

How does one become not only someone who plays the harp, but a *harpist*? To be even more concrete, let us ask not how, but *when* one becomes a harpist. When she is capable of perfectly repeating what the teacher plays? It is rather when the student *no longer needs* to imitate the teacher, when the student *no longer needs* to immediately remember all the particular instructions and all the past experiences. One becomes a harpist when one *no longer needs* to follow or to be pushed by their

master, but “walks her own walk”. This is when one becomes a harpist even while not playing one. Similarly a house builder is someone who *does not have to* imitate her master, but who in fact *must* be able to go beyond her master in order to improvise on the particular means, materials, workers, budget, geography, etc. in order to build the each time particular, therefore unique, house.

The emergence of a positive state is a process of freedom: to put it in anachronistic terms, not a freedom from playing certain notes, but the freedom of being able to play others instead. Not a freedom from building walls in a certain way, but a freedom to build them from different materials if need be. The freedom of differing without contradicting. A positive state is a *result* of the activities that we become capable of by exercise. Indeed, a harpist is not *only* a harpist, but it remains true that being a harpist gets into relation to the whole of the human soul: when one is a harpist, this colors one’s eating and sleeping habits, one’s respiration and concentration, one’s daily schedule, one’s relation to one’s body and to other people, one’s career decisions, one’s political views, and ultimately, depending on how serious the person is, one’s life *as a whole*. This is why it is inexact to say that there are no harpists, but only people that are “more harpist” than others.

The bird song is a more or less sophisticated learned expression of pain and pleasure regardless of the particularity of the situation – the pain involved may be the result of a punishment inflicted by a parrot trainer, of hunger due to draught or of the attack of a predator; pleasure may be caused by a reward, by mere food or by successful reproduction. Just as locomotion involves the *perception* of a particular sensible containing the relevant middle term (“this is *pleasant*”, “this is *painful*”,

etc.), here the birdsong involves the *production* of a similar particular sensible: in both cases the meaning given to the sensible object is a product of association, i.e. habituation.<sup>60</sup> Hence just as a donkey can be “moved” by a carrot, a parrot can be “motivated” to sing by a cracker or to keep silent by a threat. Habituation involves a fundamental generalization in that its only relationship to the particular sensible object or voice is to whether or not it can be subsumed under the universal premise of desire. Hence just as habit, animals other than humans partake in some experience, *empeiria*; habituation and experience are quite similar in that they are a product of repeated memories, but also in that they differ by their generality from positive states such as “harp playing” or “house building”.

#### 4. Medicine, architecture and music.

Most instructive, in this context, is a famous but lengthy passage from the *Metaphysics* that subtly defends a claim that at first may seem counterintuitive: while positive states such as art or science<sup>61</sup> emerge out of experience and habit, the latter two remain more general than positive states:

“While, then, other [animals] live by impressions and memories, they have a small share in experience; on the other hand, the human race also lives by art and *logismos*. In humans, experience comes out of memory, for many memories of the same thing brings to completion a potency for one experience... But art comes to be whenever out of many conceptions from

experience arises one universal judgment [*hypolêpsis*] about similar things. For, whereas to have a judgment that this thing was beneficial to Callias when he was sick with this disease, and to Socrates, and one by one in this way to many people, belongs to experience. But the judgment that it was beneficial to all such and such people marked out as being of one form [*tois toiosde kat' eidos hen aphoristheisi*], when they were sick with this disease (such as sluggish or irritable people when they were feverish with heat), belongs to art.”<sup>62</sup>

The crucial factor is the nature of the “judgment”, whether it is a judgment of mere fact or of the cause. Indeed animals often take care of themselves quite well, and human beings may manage quite well to live just by following their feeling and the familiar judgments of traditional medicine that they have been exposed to: “Such and such a potion is good for this disease”, “Such and such a plant is unhealthy”, etc. Similarly, one may well have memorized perfectly the traditional “judgments” concerning the “appropriate” music to play at weddings, sacrifices, funerals, etc.; an experienced manual laborer may well mechanically build up such and such walls for temples and other kinds of walls for residences, and yet:

“the experienced person knows the what, and not the why, whereas the artisan is familiar with the why and the cause. This is why we think master craftsmen in each kind of work are more honored and know more than manual laborers, and are also wiser because they know the causes of the things they do (just

some inanimate things, the others do what they do without knowing, as fire burns; the inanimate things doing each of these things by nature, but the manual laborers by habit.)”<sup>63</sup>

To speak somewhat loosely, fire is an expert of burning things, but fire never burns *this*. Above habit was opposed to the motion of fire; in the context of positive states, they are basically the same.

Positive states differ equally from habit and from mere nature by their openness to the particularity of the situation: this is good for Socrates neither because it is good in general, nor simply because it worked in the past, nor even because it worked on Socrates in the past, but *because* Socrates is such and such. This wall is to be built this way, not because that is the way walls have always been built, not because I am told to build it that way, but *because* of the material, the geography, the purpose of the building, and the political meaning of the building. This song is to be played this way, not because that is *the* way it is played, but *because* of the particular acoustics of the environment, the time of the day, the season of the year, but also the way of life it serves, the way it forms or affects the listeners of a certain kind and on a certain, unique, occasion.

##### 5. *Hexis meta logou.*

Despite the apparently anachronistic association in the noun “virtuoso” between artistic perfection and morality, it is certainly not out of place to take the

example of music seriously and to multiply examples. It is well known that music is always a fundamental factor of education, and especially of the emotional education of children, both in Aristotle and in Plato.<sup>64</sup> Just as the building of a house or the making of a film involves many people having different shares in the overall purpose, similarly singing to a playback or to a karaoke, conducting an orchestra, involuntarily repeating an annoying tune one has heard on the radio, whistling in the street, playing in a military band or a jazz quartet offer a variety of distributions of “knowledge” of the causes. This wide spectrum is spread between, on the one hand, a level of mechanical repetition, imitation, mere habituation or association, and on the other hand, a level of knowledge, art or science, of the awareness of the particular, i.e. of the awareness that universal “recipes” do not have univocal effects on all particulars: here we thus find a level of holding together two possible contrary ways to go in a particular situation, and a state of deliberating well about them – a developed potency with *logos* or a positive state with *logos*.<sup>65</sup>

The emergence of positive states is then a process of freedom, a way of overcoming the exclusiveness of what presents itself as contrary options. As a form of human freedom from deductive applications of universal rules as well as from the sheer particularity of perceptions, our analysis of positive states with *logos* such as medicine, architecture and music, here foreshadows what will turn out to be the essence of human *logos*: human access to that which she has not experienced first-hand.

Then, the intermediary part of the human soul is not an aggregate of habits. Habits, feelings, experiences, memories *become* positive states, settled and free ways

of the human soul's bearing itself toward the latter. For the time being, this seems to be the clue toward interpreting meaningfully and adequately our focal passage from the *Nicomachean Ethics* where the intermediary part of the human soul listens to *logos* the way "we say 'taking account [*ekhein logon*] of one's father and one's friends'."<sup>66</sup> It is this bearing oneself, *ekhein*, that is crystallized in the concept *hexis*. And this latter is precisely formed not by natural growth or habituation, but by education, the *other* growth required by human growth: one's listening not only to one's immediate surrounding, i.e. to one's "father", whether natural or not, *but also* to those beyond – to one's "friends". "Taking account of" here means not only remembering and being habituated by means of first-hand experiences in the "household", but also attending to that which one precisely has *not* experienced. For the time being, it seems as if the human being *has logos* in the sense a guitarist *owns* a guitar: not the possession of an object, indeed, but neither a mastery of a memorized repertoire and of general instructions, but an ability to bear oneself without them and beyond them.

To conclude this section: in our previous chapter we thematized the term "animal", and in the next one we shall analyze "human *logos*" as such; the third term in the Aristotelian definition of human being, namely *ekhein*, is to be understood neither as *syn-ekheia*, nor as *met-hexis*, nor even as *ethos*, but as *hexis*.

## C. ÊTHOS.

### 1. *Hexis kata ton logon.*

We are trying to establish the philosophical link between *logon ekhein* and *êthikê*, if there is any. We saw that it seems as if *hexis* and not *ethos* that links the two. But there are many *hexeis*, and different kinds of *hexis*.

Even if the examples taken from art and production were helpful in showing *hexis* as a process of freedom, they do not take us further into its kinds and into the ways in which one attends to *both* one's father *and* one's friends. Guitar playing or house building are instances of assuming a master's or teacher's general guidance and then of overcoming it for the sake of freely and maturely engaging in new particular situations: "a holding oneself in relation to something in a certain way [*pros ti pôs ekhein*]"<sup>67</sup> And yet one's relation to one's master or teacher is by far less intricate and profound than one's relation to one's father. In short, while art is a *hexis meta logou*<sup>68</sup>, the positive states of the intermediary part are *not* with *logos*, they are *kata ton logon*<sup>69</sup>, according to *logos*, or *para ton logon*, against it.<sup>70</sup> *Hexis* took us further than *ethos*, and yet we must understand the *hexeis*, the positive states, that constitute the intermediary part of the human soul are *êthikê*. We must understand what human character means such that it is far from being covered by the acquisition of an art or medical skill.

As we said, it is inexact to say that there are no guitarists, but only people that are "more guitarist" than others. Some people *are* guitarists and some are simply not.



And it is true that in the *Nicomachean Ethics* Aristotle draws a similarly thick line while delineating the morally virtuous person. But, whereas there are people who are simply *not* guitarists at all, no human is unfamiliar with fear, desire, pain and pleasure. One does not *become* a person having relations to others in the way one *becomes* familiar with an instrument. Hence when grownup non-guitarists happen to pick up a guitar, they play it the way a child would, whereas cowards feel fear in a fundamentally different way than children: in the latter case something is lacking, but in the former case something is *destroyed* or *out of place*. People do not take up their feelings and needs the way one may pick up a guitar; people do not relate to one another the way they choose a guitar teacher or are handed over to a master craftsman. When human beings produce, humans do things to objects; when they act, they also do things to themselves. Art and production are indeed *hexeis*, but they are not the basic constituent of the human character (*êthos*). The basic constituent of *êthos* is *hexeis* that relate to feelings and desires that are as old as we are, and probably older than our very sense of who we are.

Hence perfection in art or production is not a perfection of the intermediary part of the soul, of human desire.<sup>71</sup> Art and production require that the human bear oneself (*ekhein*) in relation to objects, memories, trainings and habits; they both do have a part in the human soul; but they are precisely too akin to *logos* and too detached from desire, they are “with *logos*” (*meta logou*). In art, “taking account of” means not only remembering and being habituated by means of first-hand experiences in the “household”, but also attending to that which one precisely has *not* experienced; but the other, whether father or friend, remains distant, detachable,

somebody who is more or less chosen, and therefore exchangeable. The father and friends we take account of in our relation to desires and fears, on the other hand, are not simply expendable or exchangeable; there is a much stronger sense in which they are unique and non-instrumental; we are so deeply implicated in them that we cannot discharge them, but rather *resist them*; we do not simply deliberately follow their instructions, we take account of them in a stronger or more precise sense. Apart from a *hexis meta logou*, where does the *hexis kata ton logon* concretely show this taking account of others, this profound kind of listening and access beyond one's private experiences?

Most concretely, perhaps, in the phenomenon of shame. "Shame is an impression [*phantasia*] concerning dishonour, and that for its own sake and not for its results."<sup>72</sup> The word *phantasia* is intriguing; it emphasizes not the "seeming" character of the dishonor involved, but the "seeming *to another*", the "appearance in another's imagination", the necessary "presence" of another. It is exactly here that the expression "*logon ekhein*" reappears: "[people] necessarily feel shame before those whom they take account of [*hôn logon ekhei*]."<sup>73</sup> This sheds light on the kind of positive state of character that is more profound than one's relation to a guitar teacher or a master architect: a fault in playing the guitar in itself is a fault and nothing more; and if one feels ashamed of making that mistake before one's teacher or an audience, it is because one takes account of them, one listens not to their particular instructions, but to their evaluation of oneself. The kind of listening of one's father and friends involved in *logon ekhein* is then the necessary attendance of both as speakers and evaluators. Indeed this presence of others is not more audible than visible: "[People]

feel more ashamed before those who will be always with them [*piresomenous*] and who keep watch on them [*prosekhontas*], because in both cases they are under the eyes of others.”<sup>74</sup>

After *ethos*, and *hexis* as such, this is finally the correct sense of *ekhein* for understanding *logon ekhein* both in the way the desiring part “takes account of” both one’s father and friends, and in the way the human being alone “has *logos*”: it is not *hexis* alone, it is not *hexis meta logou*, not a *met-hexis*, but a *hexis kata ton logon*. Human character and its positive states, whether virtues or vices, will involve the gaze of others, their “presence”, but also the sense that these others “will always be with” oneself. This is why human character is fundamentally interpersonal and necessarily involves a project of living together; this is why human beings are “political animals”. To *have logos* means to take account of the evaluation of others with which one has a life project, to look at oneself from their eyes.

But what is this presence of others really like such that they remain *with us*? Because, although we do not feel to have failed a master’s teaching while making a mistake as such on our own, we do feel shame even when others are *not* there attending our behavior. There must be a sense in which we *see* others *look* at us without them looking at us, in which they speak to us from within without giving any orders, in which they “move us” without constantly touching us. Just as shame does not need the physical presence of others looking at us and giving us instructions, a *hexis kata ton logon* is not a state constantly generated by others, but constitutes a self-sustaining environment. In a way we must specify, we carry on these others in us

– and not in the sense of imitating them, but in the sense of “taking account” of their evaluation of us.

## 2. Bodily *hexis*.

Before taking up the question of moral virtue, let us dwell for a moment on a passage from the *Physics* where Aristotle argues that *hexis* is not an alteration because in alteration the mover is continuous with the moved.

“Among *hexeis* some are virtues, some are vices. Yet neither virtue nor vice is an alteration [*alloiôsis*], but virtue is a certain completion [*teleiôsis tis*] (for when something attains its virtue, then it is said to be complete [*teleion*], for then it is most conform to its nature, as a circle is complete when a circle comes to be and in the best way), and vice is its corruption and displacement [*phthora toutou kai ekstasis*].”<sup>75</sup>

As we saw in our previous section, *hexis* as such is an environment that sustains itself, it is freed from being moved each time. Just as a guitarist does not become one each time she picks up a guitar, our character is not an agglomeration of atomic spontaneous choices or responses to atomic stimuli. “Neither the *hexeis* of the body, nor those of the soul are alterations”.<sup>76</sup>

Bodily *hexis*, which is thematized not in the *Nicomachean Ethics*, but in this chapter of the *Physics*, may help us shed light on this point and on the peculiar way in

which our father and friends *are with us*, as attested by the phenomenon of shame: “for instance, we place health and vigor in the *krasis* and *symmetria* of the hot and the cold, either in relation to themselves or in relation to their surroundings; and similarly with beauty and strength and the other virtues and vices.”<sup>77</sup> Now, in chapters III and IV, where we dealt with nutrition and sensation, we already thematized this “blending” (*krasis*) and “proportionality” (*symmetria*); but on this occasion we can briefly touch upon some aspects of the specificity of human corporeality. Even at the level of merely bodily functions, virtues and vices are self-sustaining positive states. “Beauty”, “ugliness”, “health” and “sickness” are not simply “properties” such that they may be simply manipulated externally, i.e. altered; nor are they simply natural in the sense of innate (in which case they would be constantly “moved” or “generated” by nature as such). Note the remarkable characterization of the body here: although a body has matter and matter can be changed, a body *cannot* be made beautiful or ugly by merely external manipulations. The Aristotelian body has at once a special kind of “thickness” and a “historicality”, its beauty and ugliness has a special depth of its own. As we have seen in our previous chapters, this is because the best way to think about a living body is to think of it not as matter, stone, flesh and bone, but as a soul. Its beauty and ugliness is not simply in the way it looks, but in the “logic” of its life. This is why, indeed, Aristotle, boldly entering “Heraclitus’ kitchen”, says: “in the same way one must engage in the research concerning each animal without hesitation, since in each one of them there is something natural and beautiful.”<sup>78</sup> This does not imply that bodies can be neither made beautiful nor ugly, but that they will not be made so by mere stimuli or pressure (repression or impression) or by mere innate

characteristic, since *hexeis* direct or “interpret” stimuli, and they give innate potencies a certain direction and “interpretation”. To force ourselves to use quantitative terms, *hexis* grows not arithmetically, but geometrically.<sup>79</sup>

Thus virtues and vices are not simply a matter of sensitivity or insensitivity even at the level of merely bodily functions: “virtue makes one be insensitive [*apathes*] or sensitive [*pathêtikon*] in a certain way, while vice makes one *contrarily* sensitive or insensitive.”<sup>80</sup> Bodily health is not simply a matter of preestablished substances; the cause of health is a *regime* with all the semantic field implied by the term: health depends not only on a diet which configures certain substances with corresponding amounts and timing, but also, precisely, on all sorts of habits, on work conditions, on familial traits, on laws, etc. Aristotle’s understanding of bodily excellence is at once substantive enough to avoid relativity and formal enough to avoid empty universal prescription. Experiential testimony for this can be found in the fundamental difficulty of generalizing medical issues, and the need for family physicians, i.e. physicians who not only deduce diagnoses and treatments from a first consultation, but who have a long-lasting acquaintance with us and our life, and even with those long before us, i.e. with us as the new life of a tradition. Physicians do not always calculate, they do not always deduce diagnoses from overarching principles, for the simple reason, emphasized by Aristotle<sup>81</sup>, that they are unable to do so successfully or to do so as such; physicians do not always manipulate (in Aristotle’s terms here: “alter”) our body, because they cannot always do so successfully, or again because they cannot do so at all.

### 3. Moral virtue.

Aristotle extends his analysis of virtue and vice from the context of the body to that of the intermediary part of the soul, the seat of pleasures and pains, and there we see the same irreducibility of *hexis* to habits and alterations in an even richer form:

“Similarly with the *hexeis* of the [intermediary part of the] soul, since all of them consist in holding oneself in relation to something in a certain way [*prosti pōs ekhein*], and while virtues are completions [*teleiōseis*], vices are displacements [*ekstaseis*].”<sup>82</sup>

*Hexeis* are neither feelings such as pleasure or pain, nor sensations which are always accompanied by the latter:

“All moral virtue *concerns* bodily pleasures and pains... while pleasures and pains are alterations of the perceptive part, it is clear that something must be altered both for these to be cast off and for them to be taken on. Therefore, the generation of them [virtues and vices] is with alteration, but they are not alterations.”<sup>83</sup>

Just as excesses destroy the sense organs, and ultimately health as such:

“the same thing holds true for the temperance and courage and other virtues; for the man who runs away from everything in fear and never endures anything becomes a coward; the man who fears nothing whatsoever but encounters everything becomes rash... Temperance and courage are destroyed by excess and deficiency, and are preserved by the mean.”<sup>84</sup>

What *is* universal about courage is that it involves confrontation and encountering, because in each case courage will involve one’s fear. But the object of the fear confronted and the specific way in which confrontation might happen is not universal at all, on the contrary it is always particular and always unique and unrepeatable, and therefore always the product of a creative act, i.e. an act really originating from the subject in the uniqueness of her being, situation and history.

This parallelism between bodily virtues and moral virtues brings to mind our discussion of sensation in Chapter IV: if it is true that excess in sensation destroys the organ, sensation is a *logos*<sup>85</sup> and requires a mean<sup>86</sup>; similarly, excess in feelings destroy something in the human soul. We must clarify what is meant by “mean” or “excess” in this context, just as the same problem showed up in our discussion of sensation. The destruction of a sense organ is the destruction of its *logos*, of its ability to hold together contrary sensuous qualities (hot and cold, wet and dry); in other words, while the excess of heat in iron simply moves it further and further away from the cold toward more and more heat, excess of heat in a hand makes it insensitive to both cold *and* heat. The meaning of *logos* or “mean”, in the context of sensation as well as in that of the moral virtues, is not simply a matter of percentage, of quantity,



of fine-tuning, but a matter of holding together contraries. But while growth holds on to actual contrary elements, and sensation holds on to actual contrary states, the human agent holds contrary possibilities. Virtue stems from the fact that the human agent is open to possible contrary interpretations of particular sensations, *and not from apathy or insensitivity.*

“Humans become corrupted through pleasures and pains, either by pursuing and avoiding them at the wrong time or in the wrong manner or in as many ways as such things are delimited by *logos*. This is also why some define the virtues as certain kinds of apathy or calmness, but they do not define them well because they say this simply but do not add ‘as one ought’ and ‘as one ought not’ and ‘when’ and the rest.”<sup>87</sup>

One can see that Aristotle distinguishes virtue from apathy, or vice from sensitivity, and implies that both the virtuous *and* the vicious person *act in relation to pleasures and pains*, that *both* feel them.<sup>88</sup> Both the courageous and the coward feel fear, and what distinguishes the soul of the former is that it is *not only* occupied by fear, that it takes account of the particularity of the situation, and *not only* of its own emotional state or habits, of its history or present situation. The virtuous person then “listens to *logos*” by holding its emotional state together with contrary interpretations of the situation.

This holding together of contrary interpretations can be seen indirectly by its result: *proairesis*, “choice”, literally “a taking out (*hairesis*) of one of the

interpretations in favor (*pro*)”. In fact, this holding together typical to all the senses of *logos* we have seen so far here goes back to the most literal sense of *logos* and *legein*: collecting, laying down one besides another. And *proairesis* as a “taking out” or “picking” is precisely the result of this laying down. It is because *logos* holds together differences in their difference that *proairesis* as picking is not simply taking what is given, but taking *out*, taking *from out of* what is given – and this for a certain reason (*logos*). Choice happens only *out of* a simultaneous openness of a manifold of options, and thus only *for a reason* for choosing *this* rather than *that*, i.e. only *because of* a deliberation between and interpretation of *this* and *that*. Hence these options are not different amounts of desire or fear<sup>89</sup>, but different interpretations of the particular object.

Thus we come to finally make sense of the meaning of *logos* in the expression *dynamis meta logou* we encountered in *On Interpretation* in our Chapter II: humans are open to contrary “motions” because they hold on to contrary interpretations of situations or objects or projects. If Socrates can walk *and can not walk* out of jail, and if in this sentence we take Socrates to be the subject in the strict sense in which Plato always seems to want us to take Socrates, this is because Socrates can interpret and has interpreted walking away from prison in contrary ways unlike Crito advising him to run out of jail. This “motion” is what is called *praxis* in the strict sense. “*Logos* goes both ways [*amphoin esti*], but not in the same way; it is in the soul which has a source of motion, and will therefore, by the same source, set both in motion linking them [*synapsasa*] to the same *logos*.”<sup>90</sup>

#### 4. Deliberation.

As we said, this holding together of contrary interpretations can be seen indirectly by its result: *proairesis*, “choice”, but also more directly by the very process of interpretation. Aristotle does not use the usual term for interpretation in Ancient Greek, namely, *hermeneia*, but that of deliberation, *bouleusis*.

Because of its openness to the particularity of human situations, Aristotle’s ethics is fundamentally irreducible to universal prescriptions and to quantitative measurements: just as virtue is irreducible to apathy because of the latter’s indifference to the particularity of the situation, defining virtue as an arithmetical mean (such as 6 being the mean of 10 and 2) is a fundamentally distorted way of looking at the human soul:

“but the mean in relation to us is not something one needs to take in this way, for it is not the case, if ten pounds is a lot for someone to eat and two pounds a little, that the gymnastic trainer will prescribe six pounds, for perhaps even this is a lot for the one who is going to take it, or a little.”<sup>91</sup>

The mean, or the *logos*, is not measured, but deliberated according to the particular person and her situation. What is measured, according to Aristotle, is vice, precisely because vice is an excess *away* from that which is a standard in itself. Bringing together “choice”, “mean in relation to us” and indeed *logos*, moral virtue is finally defined as follows: “a positive state that makes one apt at choosing, consisting in a

mean condition in relation to us, which is determined by *logos* and by the means by which a person with practical judgment [*phronimos*] would determine it.”<sup>92</sup> Both *orexis* and *nous* are in fact without *logos*<sup>93</sup>, and neither characterize human beings on their own; it is their togetherness, their interpenetration that characterizes *logos* and defines human beings. Both particular “gut feelings” and general prescriptions fail to circumscribe the origin of moral virtue, the former being stuck with an unaccounted and unaccountable particular emotional state, the latter with an empty rule to apply – which itself is equally unaccounted and unaccountable to be the right rule to apply – *precisely in this particular situation*. It must be recognized that even if Aristotelian ethics epitomizes divine *theôria* or contemplative life, this should not shed shadow on the clear fact that his account of moral – i.e. strictly human – virtue gives utmost important to the particularities of human life. For Aristotle, this is intrinsic to ethics:

“But let this be granted in advance – that all *logos* concerning actions is obliged to speak in outline and not precisely – just as we said at the beginning that one ought to demand that *logoi* be in accord with their material, whereas matters that are involved in actions and are advantageous have nothing static about them, any more than do matters of health. And the general *logos* being like this, still more does the *logos* concerning particulars lack precision; for it falls under no art nor under any skill that has been handed down, but it is necessary for those who are acting to always look at the circumstances surrounding the occasion, just as is the case with the medical art or the art of steering a ship.”<sup>94</sup>

Both “gut feelings” and general prescriptions fail to circumscribe the origin of moral virtue, the former being stuck with a particular emotional state, the latter with an empty rule to apply; the former leave no room for listening and thus resemble habit, whereas the latter are unable to listen to the particularity of the situation human life is always confronted with. The former repeats, and the latter dictates, whereas moral virtue for Aristotle must take the form of taking account of others without falling into imitation of a particular act or into the application of a general prescription. We may well need virtuous people around us in order to be virtuous at all, but what counts is not so much the particular acts we are exposed to than the friendship that makes us care about and be necessarily creative in our actions among particulars. If the human soul holds together contrary interpretations of one situation, it is because the human being is able to see another as a herself: “a friend is another self”<sup>95</sup>, but also because the human being can see herself as another, can be a friend to herself.<sup>96</sup> The human individual being a “political animal” according to Aristotle, friendship turns out to be a virtue in a special sense<sup>97</sup> and in the following two chapters of our dissertation we shall see better how human *logos* is precisely this perceptiveness of others’ experiences.

In any case, the *logos* character of *hexis* and *êthos* blurs the apparent exclusivity of contrary actions as well as the externality of others and the massive integrity of the human individual. As the prudent person interprets apparently same situations in contrary ways and apparently different ones as similar, the intermediary part of the virtuous person takes account of both one’s father and one’s friends not in

the sense of seeing them see oneself, but in the sense of being able to intimately assume their point of view and “listen to them”, deliberate and then choose.

*Ekhein* in the famous Aristotelian definition of human being as “*zôion logon ekhon*” has led us through the concepts of *ethos*, *hexis* and finally *êthos* to the much less famous characterization of humans: “Choice is either thought infused with desire or desire infused with thought, and such a source is a human being”.<sup>98</sup>

#### 5. The dilemma of character painting.

The necessarily imprecise character of ethics thus makes it impossible to draw inferences from particular actions to the “completions” and “displacements” that constitute virtue and vice. For instance, someone writing a thesis knows the variety of the forms which distraction assumes. The inability to concentrate does not simply mean to be unable to refrain from doing many things, from undergoing many sensations, from being constantly stimulated and excited about multifarious things. Writing a thesis well is fortunately not about being a good ascetic, about being a person who distinguishes sharply between sectors of her life. Distraction rather means to do and undergo *many* things *as many*, and not *as one*, to do and undergo *many* things while resetting the process with each action or passion. Vice as “displacement” refers to this necessity of resetting the process, and thus has practically nothing to do with “evil”. Vice as “displacement” is “replacement”. To be virtuous is to be able to go on a trip, to incorporate differences, whereas vice is to remain at the same place

while constantly moving around. Paradoxically, a “vicious” trip is to move around, a “virtuous” trip is change and understanding.

Hence being concentrated on a thesis in philosophy in no way entails lack of interest and excitement in front of the multiplicity of actions and passions precisely because a thesis in philosophy is not an application of a rule or a report on various experiments, but a risk, a trip, *a question* – a paradoxical engagement into something that one knows that one does not know. Being concentrated here is rather being constantly interested and necessarily open without having to reset one’s interest, being excited without having to refuel one’s curiosity, doing and undergoing without *having to end and restart*. Distraction and concentration are examples of human phenomena that are environmental, that is, they are irreducible to activity and passivity, motion or lack of motion: one who is distracted may well be standing still, but in fact he is stopping and restarting constantly.

This is why it is not enough to stand still to step out of the “environment” of distraction: in order to get out of this process of constant change, one cannot simply make a *change*. A child that is constantly distracted while sitting in a classroom may well become extremely concentrated while playing soccer: playing soccer creates an environment that absorbs the soul more and more so that in the end the players are disturbed by distractions. This is why a soccer field is not a certain space *in* which things happen, it is the environment *of* those things, it is an environment imbued with interpretation.

Again human fear is not simply an atomic feeling, there are more environments of fear than fears. Because fear colors actions and objects: in an

environment of fear, I feel fear in relation to someone who feels the same way toward me, thus I will be ready to express my fear in such a way as to set the other to do the same; but since I know that my violence will provoke his, I will be ready to do a violence harsh enough to intimidate him definitively; yet he knows this too and feels pretty much the same way as I do, such that he will be ready to counter my plans of definitively harshening my violence by even greater violence, etc. It is precisely because the reign of fear or anger is more than the sum of the individual motions or atomic feelings it contains, that it blurs the distinction between action and passion, between my feelings and those of my enemy, so that sometimes, if not often, it very unfortunately becomes very difficult to exactly locate any beginning of a long-lasting enmity, and also to foresee any short-term resolution.

No wonder that not all representations of humans are *ethikos* or moral. Just as the positive states in the intermediary part of the human soul take an “environmental” form beyond particular actions, all representation of human character becomes fundamentally problematic. Hence, in his discussion of the aesthetic education of children, Aristotle parenthetically argues that visual representations reflect character only to a small extent: “These [representations] are not the likenesses of characters, the forms and colors produced are rather signs of characters and these are in the bodily modifications. But so far as there is a difference concerning the contemplation of these, the young should not contemplate the works of Pauson but of Polygnotus and of any other moral [*êthikos*] painter or sculptor.”<sup>99</sup> It is exactly these two artists that Aristotle compares in the discussion of character representation in the *Poetics*: “[Those who imitate] do so either as better or as worse than us or as similar to us just



like painters do: Polygnotus paints those better than us, Pauson those worse than us, while Dionysus those similar to us.”<sup>100</sup> Then the question is: if *êthos* defies momentary appearances, particular acts and general prescriptions, how does a painter or sculptor produce a likeness, and not a sign, of a just person? How does one represent not an act or a feeling, but a *hexis* and an *êthos*?

Unlike a composer of music who, according to Aristotle, more directly speaks to our feelings and shapes our soul, painters of *êthos*, the “peintres des moeurs” as it is said in French, are in a dilemma: just as any painter, naively speaking, has to create the appearance of the depth of a three-dimensional body in space, a portrait painter has to somehow create the appearance of the depth of the soul in time and history. If one’s goal is to represent a person as a character, one can limit oneself neither to a naturalistic representation of the model’s nose, eyes, mouth and hair as an “exact” photography would, nor to a parable or an allegory in which the figure would be subsumed under a universal virtue or sin as can be seen in, say, Brueghel’s paintings of the deadly sins. The representation of *êthos* should be neither merely representative nor, in this particular sense, “moralizing”.

Hence it may be easier to produce a conventional representation of Justice and to graphically reproduce the outer appearance of a just human being’s body, than to represent a just person as such. Again this is because imprecision is inherent to ethics, because human character is irreducible to universal formulas and particular acts, because there is an impossibility to represent human deliberation and interpretation, because there is an “invisibility” of the father and friends the virtuous human being takes account of and feels ashamed of, and a certain “lack of content” in their words.

Rembrandt van Rijn teaches one much about how developmental and even hereditary characteristics can be paradoxically represented in a moment and three-dimensionally: although Rembrandt has recourse to “signs”, allegoric objects, Biblical scenes and references, exotic clothes, and real life situations and actions, his real tool in conveying *hexeis* such as magnanimity, temperance or justice, is light and darkness. Rembrandt’s contrasts contribute to finding a middle way between simply asserting the particular person in her particular time and place and making her a conventional sign of universal justice as a blindfolded woman holding a balance in one hand and a sword in the other. They rather seem to be oriented towards conveying the effect that the brightness is not fully detached from the *possibility* of sinking back into darkness and that obscurity is *pregnant*. This contrast does not simply create a dramatic impression or the appearance of the depth of the soul, it allows the appearance of a status between presence and disappearance, in Aristotelian terms, between being-at-work and potency, and this is why it is able to convey the sense of a person having not only certain stories behind her, but also a history and a character: the sense that, apart from the presence of the figure that is *represented*, she *could* have been somewhere else, in different clothes, in a different situation and committing a different act, and yet that it *would* be the same thing, that she *would* adapt herself and still hold the same relation to the world and to her emotions. Conversely, the portrait of a magnanimous person by Rembrandt, insofar as it represents this character trait of the person, gives the impression that somebody else’s being in those clothes, in the same situation and doing the same thing or standing in the exact same posture *would not* be the same thing.

Thus, at least as much as people are sources of actions, characters are constitutive of people for Aristotle. Just as an environment is more than the sum of the objects *in* that environment, a virtue is the environment of a soul irreducible to particular acts. The transcendence of virtue over the particular situations is at once stable and vulnerable as the transcendence of the environment over its components. The courageous person neither spontaneously *recreates* courage in her soul, nor does she *apply* a preexistent formula to her particular situation. *Hexis* names the very fact that there are neither virtuous acts *per se*, nor recipes for virtue other than that it involves an unforeseeable free relation to contrary extremes. The contrasts in Rembrandt's portraits reflect the necessarily deliberative character of human *logos*, its very *êthos*, its holding contrary interpretations without letting one yield to or take over the other.

#### D. RECAPITULATION AND REORIENTATION.

We devoted this chapter to the interpretation of the verb *ekhein* in the famous Aristotelian definition of humans as *zôion logon ekhon*. This interpretation led us through various cognates of *ekhein* such as *synekheia*, *methexis*, *ethos*, *hexis* and finally *êthos*. We concluded that having *logos* for humans does not mean a possession, but an ability to deliberate, i.e., to interpret particular situations in contrary ways. Note that this again refers to the central meaning of *logos*: a relation between contraries that preserves them in their difference. The all too famous definition of human beings as animals having *logos* leads to the less famous but equally informative one in the *Ethics*: “Choice is either thought infused with desire or desire infused with thought, and such a source is a human being”.<sup>101</sup> *Ekhein* here means not *êthos*, and not merely *ethos* or *hexis* as such, but the taking account of oneself as others and of others as oneself – especially “those who will always be with them”.<sup>102</sup>

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But who are they? One does not choose one’s family, and especially one’s parents, one’s “father”. But one can become a person who chooses one’s friends in the *polis* precisely beyond the family circle. In so far as the question of ethics depends on *both* one’s friends *and* one’s father, we must consider the *polis*. The *Politics* is precisely the book that finally takes the relationship to both literally and no longer

metaphorically. The household and the city are both founded on *logos* – the third term of the Aristotelian definition of human being after “animal” (*zôon*) and “having” (*ekhein*).

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<sup>1</sup> DK22B119.

<sup>2</sup> *Politics*, I, 1, 1253a8-18; VII, 12, 1332b5-6.

<sup>3</sup> *Nicomachean Ethics*, I, 13, 1102b29-1102b32. See also *Rhetoric*, II, 6, 1384a23-25; *Eudemian Ethics*, II, 1, 1219b27-1220a11.

<sup>4</sup> *On the Soul*, II, 4, 415a23-415b2. See also *Generation of Animals*, II, 1, 731b18ff.

<sup>5</sup> *Politics*, I, 3, 1256b10-15; VII, 12, 1332a38ff.

<sup>6</sup> *Nicomachean Ethics*, IX, 7, 1167b34-1168a9.

<sup>7</sup> *Nicomachean Ethics*, I, 13, 1102b33.

<sup>8</sup> See, for instance, H. Rackham’s translation: “in the sense in fact which we speak of ‘paying heed’ to one’s father and friends...” (Cambridge: Harvard, 1926), p. 67.

<sup>9</sup> See, for instance, the rendering of W. D. Ross: “this is the sense in which we speak of ‘taking account’ of one’s father or one’s friends” (Oxford: Oxford University Press, 1966). Joe Sachs also prefers the disjunction: “In the same way too we call listening to one’s father or friends ‘being rational’...” (Massachusetts: Focus Books, 2002), p. 21.

In his commentary, Francis Sparshott seems to be clearly aware of Aristotle’s reference to the relation and possible conflicts between family and the state in Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 28 *et al.*

<sup>10</sup> *Nicomachean Ethics*, VI, 2, 1139b5-7.

<sup>11</sup> See our Chapter II. *On Interpretation*, 9, 13; *Metaphysics*, IX, 2, 5.

<sup>12</sup> *On Interpretation*, 9, 19a7-8.

<sup>13</sup> For the complications arising from the practical syllogism in the case of humans, see also Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 7.

<sup>14</sup> *On the Soul*, III, 13, 435b24-26. For the distance between *On the Soul* and the *Nicomachean Ethics*, see also Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 8; Nussbaum, Martha C., “The text of Aristotle’s *De Anima*”, in *Essays on Aristotle’s De Anima*, eds. Martha C. Nussbaum & Amélie Oksenberg Rorty (Clarendon: Oxford University Press, 1992), p. 6.

<sup>15</sup> See *Physics*, II, 1; *Categories*, 14.

<sup>16</sup> *Nicomachean Ethics*, I, 13, 1102a29-30.

<sup>17</sup> *Politics*, I, 1, 1253a10-11.

<sup>18</sup> *On Sleep and Waking*, 3, 456b17-18; 458a27-28.

<sup>19</sup> *Nicomachean Ethics*, I, 13, 1102a33-1102b1.

<sup>20</sup> *Nicomachean Ethics*, I, 13, 1102b13-14.

<sup>21</sup> *Nicomachean Ethics*, I, 13, 1102b17-18.

<sup>22</sup> This intermediary part brings to mind many passages from the Platonic corpus such as *Republic*, IV, 439e3-441c3; *Timaeus*, 70a5; *Phaedrus*, 253d8.

<sup>23</sup> *Nicomachean Ethics*, I, 13, 1102b13-14; 1102b29-1102b32.

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<sup>24</sup> For Aristotle's analysis of *ekhein*, see *Metaphysics*, V, 23; *Categories*, 15. As we shall see, these two analyses will prove to be insufficient for understanding *ekhein* in this context.

<sup>25</sup> *Nicomachean Ethics*, I, 13, 1102a30-34; *On the Soul*, I, 5, 411a24-411b31.

<sup>26</sup> René Descartes, *Méditations Métaphysiques*, "Meditatio Secunda", (Paris: Flammarion, 1979), p.70ff.

<sup>27</sup> Thomas Hobbes, *Leviathan*, (London: Penguin, 1982).

<sup>28</sup> *Nicomachean Ethics*, I, 13, 1102b22-23.

<sup>29</sup> *Nicomachean Ethics*, I, 13, 1102b27-33; see also *Politics*, VII, 13, 1333a16-18.W

<sup>30</sup> *Nicomachean Ethics*, II, 1, 1103a27-31.

<sup>31</sup> *Nicomachean Ethics*, II, 1, 1103a31-1103b1.

<sup>32</sup> It is important that the reader distinguish between the etymologically related, but semantically distinct words: *ethos*, *ethos*, and *hexis*. The first, we shall always translate as "habit"; the second as "character". We shall leave the third untranslated for reasons we shall have to explain.

*Nicomachean Ethics*, II, 1, 1103a17-19.

<sup>33</sup> *Metaphysics*, I, 1, 980a28-980b26.

<sup>34</sup> *History of Animals*, IV, 9, 536b3-5; *Problems*, 11, 898b34-899a4.

<sup>35</sup> *Generation of Animals*, III, 10, 761a5. For very interesting remarks on bees, see indeed *Metaphysics*, I, 1, 980b23-27, but also *History of Animals*, IX, 40, 627a15, 627a24-28, and 627b11.

<sup>36</sup> *Parts of Animals*, II, 17, 660a35-660b2.

<sup>37</sup> This word means "language", "dialect", "accent" and even "speech" in Aristotle as well as in Hippocrates and others. Here however it cannot but mean "idiom" in a very loose sense, which Aristotle mentions in the following sentence: "Inanimate beings never utter voice, but are said only by resemblance to do so, just like a flute, a lyre or any other inanimate being that has a musical compass, tune and *dialekton*." (*On the Soul*, II, 8, 4206-8) W. S. Hett translates *dialektos* here as "modulation".

<sup>38</sup> *History of Animals*, IV, 9, 536b14-18.

<sup>39</sup> *Generation of Animals*, V, 2, 781a26-30.

<sup>40</sup> *Rhetoric*, I, 11, 1371b8-9; III, 9, 1409b1ff.; III, 10, 1410b15ff.

<sup>41</sup> *On Things Heard*, 800a29-31.

<sup>42</sup> *Poetics*, 4, 1448b4-17.

<sup>43</sup> For a similar connection between *eikasia* and *sylogismos*, see *On Memory and Recollection*, 1, 450b20ff.

<sup>44</sup> *Nicomachean Ethics*, II, 1, 1139b23-25.

<sup>45</sup> *Nicomachean Ethics*, I, 13, 1102b29-1102b32.

<sup>46</sup> *On the Soul*, III, 13, 435b24-26. For the distance between *On the Soul* and the *Nicomachean Ethics*, see also Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), p. 8; Nussbaum, Martha C., "The text of Aristotle's *De Anima*", in *Essays on Aristotle's De Anima*, eds. Martha C. Nussbaum & Amélie Oksenberg Rorty (Clarendon: Oxford University Press, 1992), p. 6.

<sup>47</sup> *Nicomachean Ethics*, I, 13, 1102b31-1102b32.

<sup>48</sup> *Politics*, VII, 12, 1332a38-1332b11. After a lengthy and sometimes quite detailed survey of human education that will spill into Book VIII, the triad *physis*, *ethos* and *logos* is taken up again in the context of education in *Politics*, VII, 13, 1334b5. See also *Nicomachean Ethics*, X, 9, 1179b21ff.

<sup>49</sup> *Nicomachean Ethics*, I, 13, 1102b30-1102b32.

<sup>50</sup> We are indeed thinking of a passage we already quoted from *Nicomachean Ethics*, VI, 2, 1139b5-7.

<sup>51</sup> *Politics*, VII, 5, 1332b6-8.

<sup>52</sup> For the idea that *mathêsis* is only one part of *paideia*, see *Politics*, VII, VIII, and especially, *Politics*, VII, 15, 1336a24ff.

<sup>53</sup> *Nicomachean Ethics*, II, 1, 1103b22-24.

<sup>54</sup> "Character is human being's *daimon*." Heraclitus, DK22B119.

<sup>55</sup> *Nicomachean Ethics*, II, 5, 1105b20-28.

<sup>56</sup> For *ekhein*, see *Metaphysics*, V, 23, and *Categories*, 15. The analysis of *hexis* in *Metaphysics*, V, 27, is promising, but excessively cryptic and elusive. In fact, the most informative passage on *hexis* we have encountered in the corpus is *Physics*, VII, 3, 247b1-18. We shall discuss this passage.

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- <sup>57</sup> We shall elaborate an example of human love in our conclusion.
- <sup>58</sup> *On the Soul*, II, 3, 414b4-7; also see II, 2, 413b24-25; III, 9, 432b29-30.
- <sup>59</sup> *Nicomachean Ethics*, II, 1, 1103a21-23.
- <sup>60</sup> The relation between locomotion and animal voice is indeed more complicated and interesting than this. We shall analyze this relation at some length in our following chapter.
- <sup>61</sup> These two intellectual virtues are indeed analyzed in the famous book VI of the *Nicomachean Ethics*.
- <sup>62</sup> *Metaphysics*, I, 1, 980b26-981a13.
- <sup>63</sup> *Metaphysics*, I, 1, 981a27-981b5.
- <sup>64</sup> *Politics*, VII and VIII; see most specifically the extremely detailed discussion of music in education starting at 1339a11 and that runs all the way to the end of the *Politics*; also, indeed, see Plato, *Republic*, II, VI and VII.
- <sup>65</sup> “Everybody somehow seems to divine that virtue is a certain *hexis*, a *hexis* according to *phronêsis*. But this must be slightly modified: Virtue is a *hexis* not only according to *orthos logos*, but with *logos*.” (*Nicomachean Ethics*, VI, 13, 1144b24-28).
- <sup>66</sup> *Nicomachean Ethics*, I, 13, 1102b30-1102b32.
- <sup>67</sup> *Physics*, VII, 3, 246b21-247a1, 246b3-4, 8-14, 247b2-3.
- <sup>68</sup> *Nicomachean Ethics*, VI, 3, 1140a11.
- <sup>69</sup> *Nicomachean Ethics*, VI, 1, 1138b25-29.
- <sup>70</sup> *Nicomachean Ethics*, I, 13, 1102b24.
- <sup>71</sup> *Nicomachean Ethics*, III, 10, 1117b23-25.
- <sup>72</sup> *Rhetoric*, II, 6, 1384a22-26.
- <sup>73</sup> *Rhetoric*, II, 6, 1384a28-30.
- <sup>74</sup> *Rhetoric*, II, 6, 1384a35-38.
- <sup>75</sup> *Physics*, VII, 3, 246a11-17.
- <sup>76</sup> *Physics*, VII, 3, 246a10-11.
- <sup>77</sup> *Physics*, VII, 3, 5-8.
- <sup>78</sup> *Parts of Animals*, I, 5, 645a22-24.
- <sup>79</sup> See *Nicomachean Ethics*, II, 2, 1104a27-1104b3, *et passim*.
- <sup>80</sup> *Physics*, VII, 3, 18-20. (Emphasis is ours.)
- <sup>81</sup> *Metaphysics*, I, 1.
- <sup>82</sup> *Physics*, VII, 3, 246b21-247a2.
- <sup>83</sup> *Physics*, VII, 3, 247a7-19.
- <sup>84</sup> *Nicomachean Ethics*, II, 2, 1104a18-27.
- <sup>85</sup> *On the Soul*, III, 2, 426a28-426b8; II, 12, 424a27-424b3.
- <sup>86</sup> *On the Soul*, II, 12, 424a27-424b3.
- <sup>87</sup> *Nicomachean Ethics*, II, 3, 1104b21-28.
- <sup>88</sup> For the distinction between suppression and virtue see also Martha C. Nussbaum, *The Therapy of Desire* (New Jersey: Princeton, 1994), pp. 82, 93 *et passim*.
- <sup>89</sup> “Desire does not have the power of deliberating, but at one time this desire wins out and knocks away that one, and at another time that one wins out and knocks away this one...” (*On the Soul*, III, 12, 434a12-15.)
- <sup>90</sup> *Metaphysics*, IX, 2, 1046b 21-23.
- <sup>91</sup> *Nicomachean Ethics*, II, 6, 1106a36-1106b5.
- <sup>92</sup> *Nicomachean Ethics*, II, 6, 1106b36-1107a2.
- <sup>93</sup> For the *alogos* character of *orexis* as such, see *On the Soul*, III, 11, 434a13-15: “Desire [*orexis*] does not have the power of deliberating [*bouleutikon*]; but at one time this desire wins out and knocks away that one, and at another time that one wins out and knocks away this one, like a ball, when there is a lack of self-restraint.” For the *alogos* character of *nous* as such, see *Nicomachean Ethics*, VI, 8, 1142a26-27; VI, 11, 1143a36-1143b1; for the superhuman character of *logos*, see also *Nicomachean Ethics*, X, 7, 1177b30ff; VI, 7, 1141b1-3.
- <sup>94</sup> *Nicomachean Ethics*, II, 2, 1103b36-1104a11.
- <sup>95</sup> *Nicomachean Ethics*, IX, 4, 1166a32.
- <sup>96</sup> *Nicomachean Ethics*, IX, 8.
- <sup>97</sup> *Nicomachean Ethics*, IX, 4, 1166a1ff.

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<sup>98</sup> *Nicomachean Ethics*, VI, 2, 1139b5-7.

<sup>99</sup> *Politics*, VIII, 5, 1340a32-38.

<sup>100</sup> *Poetics*, 2, 1448a4-7.

<sup>101</sup> *Nicomachean Ethics*, VI, 2, 1139b5-7.

<sup>102</sup> *Rhetoric*, II, 6, 1384a35-38.



VI. HUMAN *LOGOS*:  
*LOGOS* IN THE *POLITICS*.

“Education is a second sun for those educated.”

Heraclitus.<sup>1</sup>

In our investigation of the philosophical meanings of *logos* in Aristotle, we discussed the question of the inherence of the “*logos* of being” in the *Categories*, which led us through *On Interpretation* first into the realm of natural desire and motion, and then into that of human character and action – for, as it turns out, this latter is not simply determined by desire: “the desiring part in general somehow partakes [in *logos*] insofar as it listens to and can obey it in the sense in which we say ‘taking account [*logon*] of both one’s father and one’s friends’.”<sup>2</sup> The human possession of *logos* however immediately brings to the reader’s mind not the *Ethics*, but indeed Aristotle’s definition of human being in the *Politics*: “the human being alone among animals has *logos*.”<sup>3</sup> Hence the *Politics* takes up the idea of listening to “both one’s father and one’s friends” not metaphorically as the *Ethics*, but this time literally: *logos* makes possible the community of a household and that of a city.<sup>4</sup>

Thus, after elaborating three senses of *logos* in our previous five chapters, namely, “standard”, “proportion” and “reason”, this chapter is devoted to the most common sense of *logos*: “discourse” or “speech”. Our central thesis is the following: human *logos* is a capacity not merely for communicating first-hand experiences of the speaker, but for understanding and expressing that which the speaker has precisely *not* experienced first-hand. In building up our justification, we shall first touch upon

sound and voice, and then engage ourselves in the elaboration of the two levels of articulation that constitute *logos*<sup>5</sup>: (A.) first, the articulation of letters into nouns and verbs, and then, (B.) the further articulation of the latter into *logos*. Finally, (C.) we shall be in a position to show how this understanding of *logos* and the corresponding interpretation of human beings are indispensable for understanding various aspects of the specifically human condition. Let us first put forth the famous passage which will serve as our focal text:

“It is clear that the human being is a political animal to a larger degree than any bee or any gregarious animal. For, as we say, nature does nothing in vain, and the human being alone among animals has *logos*. Now, on the one hand, voice is a sign [*sêmeion*<sup>6</sup>] of the painful and pleasant, therefore it is possessed by other animals as well (for their nature has come up so far as to have sensation of the painful and the pleasant and to signify [*sêmeinein*] them to one another); on the other hand, *logos* is for making manifest the advantageous and the harmful as also the just and the unjust, for it is characteristic of human beings apart from the other animals to have the sensation of the good and the bad, of the just and the unjust, as well as of others, and the community in these makes a household and a *polis*.”<sup>7</sup>

## A. SOUND AND VOICE.

The project of this dissertation stemmed from an apparent contradiction in Aristotle concerning the bee's ability to *hear*. The famous opening of the *Metaphysics* denies that bees "hear sounds" and distinguishes them from other animals by this criterion: "By nature, then, all animals have sensation; from this, some acquire memory, some do not. Accordingly the former are more intelligent and more capable of learning than those that cannot remember; *those animals which are not capable of hearing sounds, such as the bee and any other similar kind of animal*, are intelligent but lack learning. Whatever animal has this sense besides memory learns. While, then, other [animals] live by impressions and memories, they have a small share in experience..."<sup>8</sup> And yet, in the *History of Animals*, Aristotle observes that bees *do* communicate by humming.<sup>9</sup>

To solve the apparent contradiction, we thought that perhaps hearing is said in many ways, that perhaps bees do hear in one sense of hearing, but not in another. Aristotle's accounts of hearing<sup>10</sup> delimit the obvious sense of hearing as mere auditory perception and the passages in the *History of Animals*, which assign hearing to bees, seem to refer to this sense. Is there another kind of hearing that the passage from the *Metaphysics* claims that bees are incapable of? Could this have to do with specifically human *logos*?

During our investigation of the senses of *logos* in Aristotle in our dissertation work, we have come to the conclusion that, for Aristotle, the implicit other sense of hearing that humans are capable of, while bees are not, is the capacity to understand

and transmit what which the animal has *not* experienced first-hand. In contemporary biology, after the astonishing complexity and exactitude of the “dance language of bees” has been discovered<sup>11</sup>, linguists have also observed that, while a first bee who finds honey in flowers is indeed capable of providing the bees in the hive with meticulous precision concerning the location of food, those bees were *unable* to transmit this information to further others.<sup>12</sup> In other words, bee communication is reserved to the transmission and reception of first-hand experiences, or of “autopsy” in its etymological sense, and the specifically human access beyond “autopsy” is a necessary condition of a wide range of human behaviors and institutions.

For it is almost trivial to say that language is an important aspect of human life. Its use may be imagined by the difficulties we would encounter if we have not had it. Further, one may think that language is not only an indispensable tool that we use *in* the world, but our very access *into* the world, that in perception and imagination we do not delineate a half-apple-antenna-twirling-smoke, but rather that our perception delineates things the way our language is structured. One may imagine that language not only influences our experience, but also determines it: to use an all-too-well-known example, the distinction between different kinds of “snow” depends on a particular vocabulary of a certain language, or the distinction between subject and predicate or between tenses is already implied in the parts of speech and verbal forms of our mother tongue.

And yet, according to our findings in this dissertation and especially in this chapter, for Aristotle language is not primary in the sense that it determines our experience as an *a priori* structure, and that the idea of *a* mother tongue is hard to

delimit, since a language changes in itself as well as within the lifespan of the individual, instead of being a stable framework, acquired once and for all, through which a mute life is processed. After all, we do have words like “half-apple-antenna-twirling-smoke” such as “trinitrotoluene”; we may well learn a foreign language’s rich vocabulary relating to “snow”; the value of particular sounds always change; and syntactic or “mental” categories such as “noun” and “verb” are not sealed off from those of other languages. To return to Aristotle, language changes because of homonymy, the indigenous ambiguity of language.<sup>13</sup> And language is necessarily ambiguous because “nouns and the quantity of *logoi* are finite, whereas things are infinite in number; thus it is necessary that the same *logos* and noun signify a number of things.”<sup>14</sup> Finally, things are infinite where life involves contingencies as well as regularities in the sublunar realm, and even more so in human sphere. To put the same idea in still different words, a language is dead in so far as it is unable to change.

For Aristotle, if language then is primary, it is so because it infiltrates and blurs all fixed meanings, and not because it determines our experience as an *a priori* structure. If language is primary, it is because it introduces in experience that which we *have not* experienced, that which we *are not* experiencing, that which we *will or may never* experience – and, most importantly, because it introduces that which is not experienced *without distinguishing it from that which is experienced first hand*.

## 1. Production of sound.

In preparation to our elaboration of *logos* as speech, we must touch upon sound (*psophos*) and voice (*phônê*) because Aristotle will determine human *logos* in distinction from one or both of them. In this section we shall first take account of the production and reception of sound, and then of voice in its semantic and physiological aspects.

Let us start out with sound as such. In our chapter IV, we saw how distant sensation opened up a wealth of objects of interest by using air or water as a medium: in “transperception”, i.e. perception mediated through a medium, the animal almost *reads off* the smell or the visual traces of its prey or predator *in* the air or water. We also saw how “transperception” also provides the particular premise of the “practical syllogism” which, coupled with the universal premise of desire, gives rise to locomotion along with other sophisticated imaginative processes. But what is the process not of the reception of sound, but that of its production?

“Sound comes to be at work always from something against something and in something, for it is the striking that produces it.”<sup>15</sup> Sounding is a motion of something against something unable to yield immediately, “for the motion of the thing striking must outrun the yielding of the air”.<sup>16</sup> Hence, solid, smooth and hollow things sound best, “because they produce many blows after the first one by bouncing back and forth, while what is moved is unable to get out”<sup>17</sup>, and sound expands as long as the medium is continuous and one.<sup>18</sup> To produce a sound then is to force the intermediate element to move in a way it cannot immediately, and this is why sounding requires an

environment in which the element cannot escape right away. Sound in this sense is an elaboration or perversion of the natural motions of elements that sets them one against the other.

Although a bell is a paradigm for sound, animal bodies, inorganic bodies, natural events and artifacts all emit sounds and are all susceptible to transperception. The striking object and the object struck may seem to be identical as in a bell, but it is us who detect or rather impose such an identity: the ringing bell is not one undifferentiated entity any more than two clapping hands are; it has a necessary internal differentiation, it has functionally interconnected parts, i.e. “organs”, an unmoving part and a moving one very much like articulations in the bodies of animals capable of locomotion.<sup>19</sup> The parts of the water that stir up one another and thereby emit the roaring of a tide, taken by themselves, are external to one another; even in the snapping of fingers taken as pure sound, the palm is precisely used as something external to the fingers; even in the case of clapping the object struck *happens to be* a part of the same human being, but the object struck may well have been something else as long it has a relative solidity and smoothness and is connected to the ear of the hearer by the intermediary of continuous air. In short, sound is a shock, and sounding is striking, i.e. the effect of a motion *against* another motion.<sup>20</sup> A human being may put these two motions in a certain order by understanding the proportion between them. We saw in Chapter IV how Aristotle himself compares the destruction of the *logos* of a sense organ to the destruction of the harmony of a lyre.<sup>21</sup>

## 2. Reception of sound.

To *reverberate* or *reflect* a sound, emanating from the touch of the striking object to the object struck, is to respond to it “in its own language”, to respond to it the way the object struck did; if reverberation and reflection are not emissions of sound, they certainly are transmissions. As we know from Chapter IV, to *perceive* a sound is something altogether different: it is to hear. This is trivially clear from the fact that the lyre or the bell, when struck, *does not hear*, any more than a loudspeaker or a recorder, whereas the ear of an animal *does* hear. As we saw, “sensation is *logos*”<sup>22</sup>, but in a different way than the strings of lyre stand in a certain *ratio* or proportion in the eyes of the lyrist; sensation requires the simultaneous grasp of the state of the sense organ *and* of the state of the object *without* letting one yield to the other. To let the organ yield to the medium would not be sensation, but reverberation; and, as we saw, to let the medium yield to the organ would not be sensation either, but rather sound.

In hearing, too, “when the [air] outside is moved, the [air] inside is moved too”<sup>23</sup>, but the ear does not simply yield to or overpower the motion of the incoming air: “the [air] in the ear has been walled in so as to be unmoved in order that there might be an accurate sensation of all differences of motion”.<sup>24</sup> To say that sensation is *logos* means nothing other than that all sensation is sensation of difference and thus requires a way of holding together the terms that are being differentiated. All sensation is sensation of a *between*, a stretch *between*: “Hearing is of the differences



of sound.”<sup>25</sup> For Aristotle, sensation is not only an undergoing or doing, but a kind of *krisis*, “discrimination”<sup>26</sup>, the very distinguishing of the undergoing and the doing.

By simultaneously holding together and discriminating the motions of air inside and outside the sense organ, hearing reveals to the animal the vast realm of relatively smooth, solid, hollow and relatively quick moving objects. But since we saw that hearing as a kind of transperception implies locomotion for Aristotle, we may also infer that the animal that is the *subject* of hearing also becomes its probable *object* precisely because of its ability to move. Theoretically all that can hear can also be heard, but indeed not the other way around. As more unimpeded and less oriented than the eyes in most animals, hearing is less restricted by the distinction between the back and the front, the left and the right, the up and down; hearing in this sense is less focused than circumspective, opens less a *point* of view or a perspective than a surrounding, an environment, a circle: a horizon of hearing and being heard.

A sound then is the immediate presence of something somewhere in the horizon. Since all perception entails pleasure and pain<sup>27</sup>, this immediate presence is never disinterested: one can always try to hear sounds as mere sounds, and one will certainly be able to hear them as acoustic phenomena, but, however successfully, one will have nevertheless *tried* to hear them precisely as acoustic phenomena. One can always bracket the fact that a sound is the presence of *something somewhere*, but, tautologically, one must first bracket the very fact that hearing is first and foremost of the sounds *of things*. Sound is friction, a certain excess of touch, the effect of a motion *against* another motion, and hearing a sound is the immediate presence of this

*excess* of touch, of something *against* something somewhere in the horizon, that is immediately susceptible of moving the animal away or toward itself.

### 3. Physiology of voice.

A cry, however, is not simply a sound *of a thing*. In fact, cries, shouts and hums are indeed sounds, but all are produced specifically in a way to be distinguishable from the mere sound *of something*. By definition, the emission of a sound as such is not “concerned” with the attention that may or may not be oriented to it, whereas a cry is a quite explicit demand for “attention” – a claim coming from, and addressed to, an animal. The sound of a living being has a surplus of bearing in comparison to the excess of touch of mere sound in that it not only may be heard instead of being merely reflected, but also *demand*s to be heard and indeed to “make a difference”.<sup>28</sup>

The primary phenomenon of voice is thus a demand for attention, a call. “Voice is a sound of an ensouled being.”<sup>29</sup> And further, “voice is a sound of an animal...”<sup>30</sup> If voice requires not only life, but animal life, then it is coupled with sensation and, probably, locomotion. As a certain demand for attention, voice addresses beings that it expects to “attend” to itself. Physiologically, voice may be compared to sound in so far as the latter seems like an external shock, the former like an internal one, but this is not exact since voice is a sound produced by an animal “...but not by any random part”.<sup>31</sup> Since Aristotle considers air to be the major medium of voice, voice is produced in an organ that has air<sup>32</sup>: “voice is the striking of

inhaled air against the part called the 'windpipe' by the action of the soul in these parts."<sup>33</sup>

The physiological aspect of voice presents a certain reflexivity in the animal body, or at least a cessation of the continuous alteration of inhaling and exhaling: "for the one who withholds [air] moves it."<sup>34</sup> The production of voice requires that the animal neither inhale nor exhale, but withhold air.<sup>35</sup> The respiratory functions of the lungs, of the windpipe, and of the air within and without, the function of the tongue in tasting, all these are suspended here, disrupted or perverted, in order to be reorganized<sup>36</sup>: air, which indeed was an element and *not* an organ *of* an animal, now becomes one; similarly, the lungs, windpipe and tongue, which all were organs with preestablished functions, are now assigned to another function. Voice entails a reorganization in the organic body as well as in the animal's relation to its environment.

#### 4. Semantics of voice.

This reorganization is made in such a way that voice, unlike sound, is reducible neither to the effect of a motion *against another motion* where the striking object is external to the object struck, nor simply to a sound coming from within the animal body: "the striking object here must be ensouled and have some imagination [with it], for in fact voice is a signifying sound, but not [signifying] the inhaled air as a cough."<sup>37</sup> Then it is not true that a voice is a sound emitted from within a living body, even from a specific part of the body. If a sound signifies anything at all, it

signifies something striking something else, whereas voice is not simply *of something*, it does not immediately and simply “refer” to the *presence* of the animal. Whereas sound means excess of touch, voice is of an animal making contact.

What do voices mean? What does “imagination” refer to in the passage above? The answer to these questions is precisely provided by the long passage we quoted from the beginning of the *Politics*: “voice is a sign of the painful and pleasant.”<sup>38</sup> One wonders: does “sign” here mean a mere outburst of pain and pleasure such as the cry of an animal when struck, or rather a “sign” *made to another*? Is the sign a mere effect of pleasure and pain as a cry, or else an emphatic message to another as an alert or threat? We believe that this is a false dilemma in the eyes of Aristotle.<sup>39</sup> Because, first of all, so far as our elaboration of human *logos* is concerned, voice is fundamentally different from sound in either case: a cry of reflex and a complex alarm call may be fundamentally different from one another, but they are both fundamentally different from the blowing of the wind as they are responses to a touch that touches the animal in a way no inanimate body can be touched; they are both sounds that sound in a way no inanimate body can; they are certain excesses of touch that contacts us in a way no touch can, however violent.

Voice is a translation of neutral stimuli into the language of desire. Further, whether or not voice is reflex or encoded, an “effect” or a “message” of pleasure and pain, either way it is less akin to mere sound than to locomotion which, as we saw in chapter IV, is equally conditioned by desire: like voice, locomotion was an embodiment of pleasure and pains in the forms of flight and pursuit. And yet, the structure of voice cannot be reduced to the “practical syllogism” of locomotion,

because voice is precisely *not* flight or pursuit, but rather a “sign”. The key to understand voice is to precisely see how it somehow violates the apparently smooth operation of the “practical syllogism”.

To begin with: why would an animal make a “sign” of the painful and pleasant instead of pursuing or fleeing the particular object of interest since the sensation of the latter and indeed the universal premise of desire are present? Precisely because the object of interest is *not* attainable by the motion of the individual animal. The animal that cries and the animal that alerts others in fact both confront an impossibility, the impossibility of attaining pleasure or pursuing pain *on their own*. The paradigmatic and fundamental case is the animal’s mating which is indeed impossible to accomplish without another, and this ties in perfectly with the animals’ use of voice for calling their lost babies in great panic.<sup>40</sup> This is why, in voice, the premises of the “practical syllogism” are not followed by locomotion, but by a “sign” of the painful and pleasant: voice provides the particular premise (“this is pleasant” or “this is painful”) to *another* animal in order that they may move *together*. In this sense, it makes no difference whether the receiver of the sign is precisely that which inflicts the pain or that which may cooperate.

Since voice entails a “practical syllogism” of locomotion whereby paradoxically the animal does *not* move, but provokes or invokes another, then we can deduce that the “practical syllogism” of voice operates in an environment of *common* interest and desire – in a minimal community in which the individuals are not only formed out of organs, but themselves become part of a possible “organization” for fleeing pain and pursuing pleasure. An animal that emits a voice in

order to mark its territory, to mate, to threat, to find its babies, or to warn another animal, or even an animal that immediately cries out of pain – these are all instances of an animal perceiving the means of its desire beyond its immediate motion or rest and thus convokes another for cooperation. Voice implicitly assumes the significance of others animals and, to a certain degree, of their perspective, their interests, their interpretation of the situation. Voice thus suspends the immediate flight or pursuit that spills from the “practical syllogism”; voice is a motion withheld in the animal’s body in order to be translated into the language of common interest; voice is an outer organ used to reorganize the world *with* and *for* others.

One can see how the semantics of voice parallels its physiology: just as the physiological production of voice required that the animal withhold air instead of inhaling or exhaling, the content of voice here requires that the animal *do not* immediately flee or pursue, push or pull, but internalize motion. Just as the animal redefined the functions of its lungs, windpipe, tongue, and the air in the physiological production of voice, the semantics of animal voice subverts the immediacy of pursuit of and flight from things. Just as the inherent work of the organs were suspended, disrupted, perverted in order to be reorganized, here the inherent “value” of the objects of sensation is relaborated.<sup>41</sup> Since it involves the distinction between a task to accomplish and a possible cooperator, voice involves a preliminary interpretation of both. The animal that has a voice radiates its interest out there in the world which, in turn, becomes populated with “enemies” and “allies” apart from pleasant and painful things. Voice then is reorganization of the body and the soul of the animal as well as of its environment and relation to others.

## 5. Reception of voice.

The distinction between the production of sound and that of voice is crucial: “in fact, voice is a signifying sound...”<sup>42</sup> The distinction between their reception is no less crucial<sup>43</sup>: sound “signifies” the immediate presence of something, whereas voice invites, invokes, calls an animal for cooperation. But while English distinguishes the production of the two (“sound” and “voice”, or “sounding” and “emitting a voice”...), it does not distinguish their reception, but instead collapses both into the same verb: to hear. Ancient Greek sometimes distinguishes the two not lexically, but syntactically: the reception of a sound mostly entails a use of the verb *akouein* followed by the accusative, whereas that of voice or discourse demands a genitive. In short, Ancient Greek has a distinction between hearing the wind (*akouein ti*) and hearing or even listening to the song of the nightingale (*akouein tinos*).<sup>44</sup>

This is important in that, hearing a voice is implication and involvement for Aristotle, since “voice is a sign of the pleasant and painful” and thereby signifies a provocation for motion or rest. The specificity of emitting a voice can be seen indirectly by means of the difference between *not* hearing a voice and *resisting* to cooperate or feeling mere contempt. Hearing a voice as voice is to *respond to it* immediately by cooperation, rejection or emphatic contempt. Even when one hears the voice of an animal without understanding what it demands, one hears that it is a demand.

To recapitulate our remarks on sound and voice, a sound is produced by the striking of something to something else, and sound is thus heard as the sound *of something*, whereas voice is an animal's assigning the inhaled air to be the striking object and its windpipe to be object struck, and this with a view to overcome the perspective of immediate and individual flight and pursuit by discharging a demand for cooperation from others. As nutrition and reproduction make elements cooperate and contribute to the animal's own desire for perpetuating its life form, voice reorganizes the animal's body and soul and its relation to other animals. Voice assumes the possibility of a community of desire, and demands such community.



## B. THE FIRST ARTICULATION OF *LOGOS*.

Chapter IV showed how sensation takes the form of *logos* as preserving the difference between the state of the sense organ and that of the sensed object. Here we see that in distinction from a mere sensation of a sound, voice prefigures higher instantiations of *logos*: physiologically voice demands the animal to suspend the mere alternation of inhalation and exhalation, and semantically the exclusive options of individual flight and pursuit. In fact, voice may involve highly complex physiological and semantic features. Aristotle even says that, by the width of their tongues, birds “utter letters to a highest degree”<sup>45</sup> and “use their tongue for interpreting one another, some more than others, so that it seems like some convey learning to one another”.<sup>46</sup> One finds even stronger claims in the *History of Animals*:

“Some animals share even some learning and teaching, some from one another, some also from human beings, – those that partake in hearing, – not only those that [partake in] sounds but those that perceive distinctly [*diaisthanetai*] the differences between signs.”<sup>47</sup>

To us on the quest of the meaning of *logos* as speech in Aristotle, the references to learning, imitation and distinct perception serve as a clue for a vocal phenomenon whose production is irreducible to that of voice or sound and its reception irreducible to that of a sound or even of a vocal “sign”. We shall see that the acquisition and use

of such an ability extend beyond the realm of cooperation and that the community they make possible reaches beyond the options of alliance, enmity and contempt.

### 1. Letters.

That Aristotle leaves his full account of *logos* implicit is best seen at the level beyond voice, for the many texts that deal with *logos* as speech in his corpus are extremely elliptic and sparse, not to mention the passages that are more or less relevant to the subject. For instance, the idea that the human being alone among animals has *logos* is indeed found in the *Politics*<sup>48</sup>, whereas it is in the *Generation of Animals* (and the spurious *Problems*) that Aristotle develops this idea by saying that “voice is the material of *logos*”<sup>49</sup>; what looks like his only “definition” of *logos* as sentence, however, is found both in *On Interpretation* and in the *Poetics*; the *Metaphysics* opens with a contrast between humans and animals by means of *logos*.<sup>50</sup> In this section, we shall try to bring these sparse texts together and see how they do constitute a philosophically instructive and provocative whole.

How is voice the material of *logos*? What is the vocal material of *logos*? The physiology of voice was basically described as “the striking of inhaled air against the part called ‘the windpipe’ by the action of the soul in these parts”<sup>51</sup>, thus voice involves the pharynx and lungs<sup>52</sup>, and also a special use of the windpipe. On the other hand, one can gather from Aristotle’s zoological works that *logos* is produced by means of the mouth<sup>53</sup>, the teeth<sup>54</sup>, the larynx<sup>55</sup>, the pitch of the voice<sup>56</sup>, tongue and

the lips.<sup>57</sup> Physiologically, then, the material of *logos* is not *any* voice emanating from the pharynx and wind-pipe.

What kind of voice serves as material for *logos* such that it exhibits such physiological complexity? Since, as we saw in chapter III, organs are formations that hold together elements (*stoikheia*) naturally tending toward contrary directions, wouldn't the Ancient Greek term *stoikheion* nicely connect the formation of organs to that of speech by denoting the element of words as well as of bodies?<sup>58</sup> Aristotle himself illustrates the relation between the matter and form in composite beings by the formation of a syllable out of *stoikheia*:

“The syllable is not its *stoikheia*, nor is BA the same as B and A, nor is flesh fire and earth; because after dissolution they no longer exist: neither flesh nor the syllable, whereas the *stoikheia* and both fire and earth do exist. Thus the syllable is something, but not only the *stoikheia*, vowels and consonants, but something else; and the flesh is not only fire and earth, or hot and cold, but something else...”<sup>59</sup>

Although this quotation from the *Metaphysics* uses *stoikheion* as the material of the syllable only, other parts of the *Metaphysics* use it as the material of voice as such: “The *stoikheia* of a voice is that out of which voice is composed, and that into which it is ultimately divided, and these are not divided into other voices different from them with respect to their form.”<sup>60</sup> A *stoikeion* is then uniform. In this sense a *stoikheion* is a *phthoggos*<sup>61</sup>, “any clear and distinct sound”<sup>62</sup>, any regular sound that

involves *phtheggomai* – a verb Aristotle uses also for the voices of animals that have lungs<sup>63</sup>, that of new born children<sup>64</sup>, of a lyre<sup>65</sup> and of birds.<sup>66</sup> *Stoikheion* is any uniform voice, “like water is a part of water”<sup>67</sup>, out of which complex voices are constituted and into which they can be abstracted and analyzed.<sup>68</sup> The vocal material of *logos* must then be more specific than *stoikheion*: the term *stoikheion* does not let us distinguish voice and *logos* since Aristotle employs it as material for both.<sup>69</sup>

The vocal material of *logos* is *gramma*: “*logos* is composed of letters through voice”.<sup>70</sup> This indeed does not mean that *logos* is composed of written characters, but that the material of *logos* involves a *selection from* the spectrum of uniform voices. Further, the physiological complexity of *logos* suggests that letters are not only a preestablished set of voices, but that the set itself is internally organized. Here a pseudo-Aristotelian text will give us a clue confirmed by Aristotelian texts:

“Why does the human being send forth many more voices, while others, if they are not distinct in form, only one? Or does the human being also have one voice but many languages [*dialektoi*]? Why does this [voice] have differences [in humans], while it does not in others [in other animals]? Or why do humans utter many letters, while some [animals] utter none, and some two or three consonants? These [consonants], combined with vowels, make language. Now *logos* is signifying not with voice, but with its modifications (*pathê*), and not because [the one who utters *logos*] takes pleasure or suffers. Letters are modifications of voice.”<sup>71</sup>

The voice that serves as a material for *logos* is a letter, but letters are not even simply a definite range of voices, they *modify* voice. The difference between voices and letters is not simply a matter of quantity, but of quality; it is insufficient to infer that, being a specific selection from the range of uniform voices, letters are necessarily *less* in number than uniform voices; one must rather understand how letters are necessarily and fundamentally *different* than voices that may happen to exactly correspond to them acoustically.

How do letters *modify* uniform voices then? Physiologically, whereas voice uses the windpipe, the lungs and the pharynx, the production of a vowel also requires the use of the larynx: “the voice *and the larynx* send forth the vowels...”<sup>72</sup> Thus, a vowel *modifies* voice by means of the larynx. And produced this way, “a vowel is that which has an audible voice”.<sup>73</sup> Further, while vowels have an audible voice, some letters have a voice only in conjunction with vowels: “A consonant is that which has no voice by itself with *prosbolê*, but becomes audible with one that has voice...”<sup>74</sup> The production of consonants involves a new physiological aspect, *prosbolê* and *symbolê*: “*Logos* is composed of letters through voice; but if the tongue was this way, or if the lips were not wet, most of the letters could not be uttered; for some are impacts [*prosbolê*] of the tongue, some are closings [*symbolê*] of the lips.”<sup>75</sup>

Thus, just as the production of vowels brought into play the larynx, now consonants engage the lips and the tongue:

“Voice and sound are different, and language [*dialektos*] is a third. No part ever emits voice apart from the pharynx; thus, those that have no lungs, never

utter; but language is the articulation [*diarthrôsis*] of voice by means of the tongue: the voice and the larynx send forth the vowels, the tongue and the lips [send forth] the consonants; and language is composed out of these. Therefore those that have no tongue or no loose tongue do not use language [*dialegetai*]. But sounding belongs to other parts as well. Thus, insects neither emit voice, nor use language, but emit sound to the interior of their lungs, not out of the door.”<sup>76</sup>

We start to see how highly determined the material of *logos* is: a letter is distinguished (1) from mere sounds, (2) from mere voices, (3a) from vowels if it is a consonant, or (3b) from consonants if it is a vowel, and finally, (4a) from other vowels if it is a vowel, or (4b) from other consonants if it is a consonant. For instance, in English /t/, heard or produced as a letter, is distinguished from other acoustic phenomena, and thereby determined on at least four levels:

- (1) /t/ is not a cracking (sound);
- (2) it is not a cry (voice);
- (3a) it is not /a/ or /e/ (vowel);
- (4b) it is not /d/ or /s/.

Similarly:

- (1) /u/ is not a bustle (sound);

(2) it is not a howl (voice);

(3b) it is not /t/ or /s/ (consonant);

(4a) it is not /a/ or /e/.

It is because of this strong determination that a letter is far from being a *stoikheion*, a uniform voice, and its utterance exhibits a complex physiology.

Learning a new language, let alone the first acquisition of language, is a tedious task because first of all it requires a new quantitative range *and* a new qualitative modification of one's phonation: one learns to utter new sounds, some involving a new cooperation of the windpipe, the lungs and the larynx, some reconfiguring the relation between lips and the tongue. Even at the rudimentary level of uttering the correct sounds, the acquisition of a new language involves quite an extensive rearrangement of the body.

Most importantly, letters involve not only a physiological modification of voice, but a fundamental semantic modification of voice, of one's relation to desire, to meaning and to others. To learn to speak is not to add cries and shouts in various combinations, it is to affect or modify voice from its natural roots. Even to supply the material which *logos* will further articulate, one must not only learn to reorchestrate one's respiration, larynx, tongue and lips, but, most importantly, one must be able to "pervert" or "redefine" one's most elemental pleasures and pains. Just as animal voice was possible by neither inhaling nor exhaling, by neither fleeing nor pursuing, here the basic material of *logos* requires that one does *not* emit an animal voice, that one neither invokes nor threatens others. To learn letters is to modify fundamentally

one's relation to oneself in order to learn to commit the voice and silence of one's body to others. This is why language is ethical and political all the way down to its material.

Because letters are meaningless.<sup>77</sup> Voice as such is pure meaning, it is a natural outer "organ" intended to "organize" others, whereas letters precisely evacuate meaning from voice, pervert the natural reorganization of voice, and *stop* invoking others for the sake of its desire. It is on the foundation of such negation that it is possible for a letter to have a function without having a meaning. In order to see this function, we must move beyond the level of the material of *logos*, and step into the process of its first level of *articulation*.

But before making that step, let us say a word about the reception of a letter after the physiological and semantic aspects of its production. Of course, just as the basic material of *logos* involves a meticulous process of production, the reception of a letter as a letter also involves a quite sharp perception of the acoustic differences. As we saw above, this explains Aristotle's wonder in front of the distinct perception (*diaisthanesthai*) that some bird species are capable of.<sup>78</sup> In short, for Aristotle languages differ from one another not only in their syntax, grammar and vocabulary, but all the way down to their letters.<sup>79</sup> The ear tended toward letters is tended toward something that is

(1) not simply a sound, because letters are not reducible to physical shocks and strokes;



(2) not simply voice, because letters are not *any* voice, but a selection of voices;

(3) not simply a voice from within a selection, because letters are also determined physiologically and acoustically by the distinction between elements that have a voice on their own and elements that do not;

(4) not simply a preselected acoustic unit that has a voice either independently or dependently, because letters are finally differentiated within these two groups.<sup>80</sup>

What is the vocal material of *logos*? It is letters: a delimited set of voices modified by the articulation of voiced units with unvoiced ones.<sup>81</sup>

## 2. Articulation.

The vocal material of *logos* is then letters consisting of a specific set of sounds some voiced and some unvoiced. What does one do with letters?

“Voice and sound are different, and language [*dialektos*] is a third. No part never emits voice apart from the pharynx; thus, those that have no lungs, never utter; but language is the *diarthrôsis* of voice by means of the tongue.”<sup>82</sup>

We had this term, *diarthôsis*, in mind when we began this chapter talking about “articulation”. It should be noted that by “articulation” we do not mean “phonation” or “utterance”, but the combination those utterances, “synthesis”.

It is striking that, by using *diarthrôsis* here, Aristotle employs a term by which he elsewhere designates the process of organic differentiation in the embryo<sup>83</sup>, thereby suggesting a possible similarity between the organic formation and the formation of *logos*. In our above discussion about *stoikheion*, we saw that this parallel should be nuanced: for, in the case of organ formation, the material is natural, whereas in the case of speech, the material is already highly determined.<sup>84</sup> To return to a comparison we made in chapter III, in terms of its growth an organ is as incomparable to fire than the first articulation of *logos* is to an organ: we compared the sight of fire to watching a chess game in that one does not lose interest in it by missing the beginning, and we likened the spectacle of a living being to a thriller in which all parts are functionally differentiated. Here we may draw a similar distinction between the articulation of natural organs (whether internal, or external like voice) and that of letters: just as fire was too complete to be internally organized, here the cry of a baby is already too complete and meaningful to be articulated. As sound was an excess of touching, voice is an “excess of contact”; every part of a cry touches us, each time it is like a brand new dice-throw, whereas the parts of *logos* are interrelated the way one single poker game is: in the articulation of *logos*, even missing one letter, even failing to distinctly perceive (*diaisthanesthai*) the accent or length of a letter, or failing to articulate (*diarthrôsis*) any letter, may make a difference in the whole: in English such failure would change “bat” into “pat”, “bad”, “bait”, “brat”, “bet” or

even the meaningless “jat”, just like a thriller could be spoiled by ripping off one single page out of hundreds, or a joke by omitting the beginning or by mumbling at the punch-line. Again, not because *logos* is made out of different cries; *logos* is no more made out of voices expressing pains and pleasures than one single poker game is made out of an agglomeration of mere draws from the deck. A poker game depends on every moment: on the deck of cards, on every card that is seen, on the number of cards drawn, on every move of one’s opponents, on the order in which they sit, on the relation between their different accumulative expressions and responses. If there is parallelism, it is not between organic formation and the first articulation of *logos*, but between the way the articulation of letters differs from organic formation and the way in which we saw organic formation differed from the growth of fire. If the articulation of *logos* out of letters is to be compared to nutrition, the food here cannot be raw, but should be *cooked* beforehand.<sup>85</sup>

Just as letters do not combine voices, but *modify* them by delimiting and differentiating them into a limited numbers of vowels and consonants, speech does not mingle letters, but *articulates* them.<sup>86</sup> It is here that we see the meaning of *logos* reoccur: as a relation that holds its terms without letting one yield or stay indifferent to the other, *logos* here brings together voiced and unvoiced units instead of letting uniform voices (*stoikheia*) or silence take over.

### 3. Nouns.

The vocal material of *logos* is letters, and letters are articulated. But what are they articulated into? Until now we said what this articulation is unlike in a slight but important sense: the formation of an organ. What is the positive purpose of the production of letters? What is the function of the articulation of units “unnaturally”, conventionally and purposively made meaningless?

It is meaning. But apart both from sound which is a direct *effect* of something somewhere, and from voice which is a *sign* of a call for a community of desire, *meaning* here, whatever it may turn out to be, is specifically articulated out of a meaningless material. Just as the physiology of locomotion requires an articulation of the moving and unmoving parts of the animal<sup>87</sup>, just as the sound as excess of touch results from a system between relatively moving and stable objects, here the first result of the first articulation of letters is a similar system between voiced units and unvoiced units, the syllable: “The syllable is a meaningless voice, composed out of an unvoiced letter and a voiced one.”<sup>88</sup> Thus, before being meaningful, letters are put into cooperation by center-periphery relations between vowels and consonants. Indeed a syllable (“ah”) may well correspond to a meaningful unit on its own, but not *as* a syllable – any more than a letter (/u/) *as* a letter would be meaningful.

But, apart from the syllable, where does meaning emerges? What is the final form, the first *meaningful* unit, the product of the first articulation of *logos*? What does it mean and how? If *logos* is a signifying voice just as voice is a signifying sound<sup>89</sup>, how does *logos* signify in distinction from voice? “*Logos* is a signifying

voice, one of whose parts is signifying separately, not as an affirmation (*kataphasis*), but as a *phasis*.”<sup>90</sup> Now since letters do *not* signify, and since *logos* contains a part that itself already does signify on its own, then there must be an intermediary link between letters and *logos*.

This link is indeed *phasis*.<sup>91</sup> What does *phasis* mean? *Phasis* comes from *phainein*, “to show, to make apparent, to clarify”. Aristotle uses it in its strictly physical sense in the *Meteorology*: “Because [Mercury] rises only a little bit from the horizon, many of its appearance [*phaseis*] are eclipsed and are apparent [*phainesthai*] at long intervals.”<sup>92</sup> We shall venture to always translate *phasis* as “clarification” and its verbal forms as “to clarify”, instead of “expression” or “utterance” which is more common and smoother. But we shall translate *phasis* as “clarification” *not* in its ordinary sense of “explaining”, but in more etymological sense of “making one thing apparent”. By translating *phasis* in this uncommon way, we also wish to preserve the idea of light and darkness and to foreshadow its cognate, *apophansis*, “declaration”, which we shall come across later in this chapter.

Thus, “let noun and verb be the only clarifications.”<sup>93</sup> Letters are ultimately articulated into nouns and/or verbs which then are to be further articulated into *logos* proper. The first articulation of *logos* into nouns and verbs that clarify something involves conventionality just like letters did, but also composition and symbolization:

a. *Syn-thêkê* (conventionality): Since letters were already conventional, it is not surprising to see that a noun (and *a fortiori logos*) signify “according to a convention [*kata synthêkê*]”<sup>94</sup>, and not as an “*organon*”<sup>95</sup>. Aristotle explains:

“According to a convention, because no noun is by nature, but when a symbol comes to be; the letterless [*agrammatōi*] sounds, for instance those of wild beasts, *do* make something manifest, but none of them is a noun.”<sup>96</sup> In Ancient Greek, *synthêkê* means “a compound”, but also “convention”, especially in Aristotle but also already in Plato, and it is usually contrasted to the “natural”.<sup>97</sup> A voice as such is never a noun any more than it is a letter, because voice does not signify by means of a convention. It is impossible for any voice to be a noun, and *vice versa*: in the first case, one would be hearing either voice *as* a noun, in the second, a noun *as* voice. One never hears a voice *as voice* in a noun or a noun *as noun* in a voice.

b. *Syn-thetê* (compositeness): Instead of the phrase *kata synthêkê*, in the *Poetics* Aristotle uses the adjective *synthetê* (“composite”) for characterizing the way nouns signify.<sup>98</sup> Just as its conventionality, the composite character of a noun should not be surprising either, since we already saw that a noun uses a certain kind of voice *as material*. One may object that the sound /u/ may well be an English second person pronoun (“you”), or the letter /u/, or a voice (an expression of surprise), or even a sound (the blowing of the wind). But such an ambiguity, because it is an *ambiguity*, does not disprove the existence of differences, but proves it: while objecting, one would thus be saying precisely that /u/ may be one of all four *because there is* a fourfold distinction to begin with. To take the sound of the wind for a howling, or a howling for the pronoun “you” is precisely a case of *confusion*. Besides, as we saw in the last section, letters are so highly determined that such confusion is not only irrelevant, but also improbable: because languages are conventionally determined all

the way down to their basic constituents, it is almost always by *abstracting* their meaning, particular situation or context<sup>99</sup>, that we can hear nouns or verbs in a foreign language as mere voices or sounds.

c. *Sym-bolon* (symbolic character): Finally, and most importantly, conventional and composite nouns come to be “when a symbol comes to be”.<sup>100</sup> In fact, *On Interpretation* opens with this idea: “Those in the voice are symbols of the affections [*pathêmata*] in the soul...”<sup>101</sup> Then, the composite and conventional character of a noun goes together with the noun’s being a *symbolon*. A word closely related to *symbolê* which appeared above as the “closing of lips”,<sup>102</sup> the word *symbolon* appears in Aristotle’s work in at least two interconnected meanings: first, it means a “complementary factor”, used in the context of Empedocles’ understanding of the relation between male and female<sup>103</sup>, in the context of air’s being composed out of the wet and the hot “as from *symbolôn*”<sup>104</sup> and in the context of the generation of a constitutional government (*politeia*) “taking a *symbolon*” from both oligarchy and democracy.<sup>105</sup>

Most concretely *symbolon* means a “tally, i.e. *each of two halves* or *corresponding pieces* of an astragalos or other object, which two *xenoi*, or any two contracting parties, broke between them, each party keeping one piece, in order to have proof of the identity of the presenter of the other.”<sup>106</sup> It is this last and most concrete sense of *symbolon* that best designates the meaning-bearing character of nouns or verbs: for, although the hot and the wet are complementary factors for air, they also have a certain existence or natural existence on their own, just like

democracy and oligarchy are regimes in their own right, and the male and female fundamentally exist on their own – whereas a tally by itself means nothing; if it means at all, it does so only in potency.<sup>107</sup> For, before broken into two tallies or *symbola*, the astragalos is a bone, thus an *organon*; once broken in two, it can no longer fulfill its natural function. When two strangers (*xenoi*) break an astragalos among themselves and deprive it from its first function, they instill the two pieces with a fundamentally new interdependent meaning: each tally negates all other tallies at the expense of its unique counterpart, just like a lock asks for one unique key; thereby the two holders of the tallies mutually identify themselves on the basis of the very moment of the breakage of the astragalos. Note the conjunction of arbitrariness and determination: what matters is *not* that they break *this* particular astragalos or *that* one, but that they break the *same* one.

This sense of *symbolon* also sheds light on the kind of people the tally holders may be; it thereby prefigures the fundamental role of *logos* in the founding of the *polis*. An astragalos taken as a bone may roughly match another: two relatives might have surprisingly similar bones and skeletons, and they *may* identify one another just by looking at this similarity. As a bone with a certain form or look or precisely *eidōs*, the astragalos may bring together relatives. An astragalos that is broken into two tallies however brings together *any* two people. This is why even strangers or guests (*xenoi*) can break *astragaloi*. Hence Aristotle uses *symbolon* not only in the sense of a “complementary factor”, but also in this sense of a “tally” being a friend to its counterpart and stretching out (*oregetai*) toward it to form a whole:



“But in a way the friendship of the opposite is also friendship of the good, for [opposites] stretch out [*oregetai*] toward one another through the middle. For they stretch out to one another as tallies do, because that way one middle thing results from both.”<sup>108</sup>

Identification and *misidentification* do not become an issue in a context involving no strangers or guests, in the context of a household, a village or an isolated city.

It is imprecise to say that strangers or guests *can* exchange tallies; one should rather say that those who exchange tallies and identify one another by their means in fact *must* be strangers or guests. Thus, if one somehow considers one’s relative *as a stranger*, then they may well become bearer of the tallies from the same astragalos. And this possibility is certainly not neglected by fifth and fourth century Ancient Greek culture developing into cities with a background of their unity in their ancient resistance against the Persians. Thus, Oedipus *misidentifies* himself and his parents only because *both* he is cast out of his fatherland Thebes *and* returns there afterwards; his mother fails to recognize his face and bone structure only because she is led astray by his conventional identity as the “son of the king of Corinth” or as the “witty stranger that saved Thebes from the Sphinx”. Jocasta not only misses the possible similarity between Oedipus and herself or Laius, she also fails to take Oedipus’ name *literally* as “swollen-footed” and connect that meaning to what they have done to their son long time ago. As we shall see better in our conclusion chapter, the tragedy of *King Oedipus* pivots around human immersion in *logos*: all characters, except Teiresias, overemphasize the ambiguity of the oracles and overinterpret them,

Oedipus solves the Sphinx' riddle, Jocasta takes "Oedipus" to be merely a proper name... The tragedy is made possible because, as citizens, everybody in the play is thinking merely in terms of the conventional symbolism and compositeness of *logos*. On the contrary, village life as such is closed to such conventional *misidentification*, because it is closed to conventional identification.

To return to the first articulation of *logos* into nouns and verbs, how does a noun work as a tally? What are the two tallies in our context? One is the sound uttered, and one is the undergoing of the soul. This is precisely the distance that we do not find in voice. Considered as mere voice, a noun is as useless as a broken bone – it is precisely an inconsistent sequence of demands for community of desire; but once one envisages a noun as a noun, as a meaningful unit that is conventionally combined out of meaningless units, then one embarks on a process of finding a matching tally – the meaning.<sup>109</sup> The symbolic character of nouns entails a structurally determined confusion: precisely because nouns necessarily open up a distance between the sounds uttered and the meaning, the same things are said in many ways not only in different languages, but even within one language, and because the same nouns can mean fundamentally different things. In a word, the first level of articulation of *logos* is what opens the possibility of ambiguity, equivocation, *homonymia*. It is because there is homonymy that even nouns are subject to the search for the correct meaning. It is important to understand that this inherent "flaw" of nouns follows precisely from their convenience<sup>110</sup>; homonymy is a necessary consequence of the enormous economy of language: "Nouns and the quantity of *logoi* are finite, whereas things are infinite in number; thus it is necessary that the same

*logos* and noun signify a number of things.”<sup>111</sup> This enables Sophocles to beautifully show how erroneous Oedipus is in promising his citizens to *either* kill whoever killed Laius *or* die himself – supposing these synonymous designations to be *homonymous*.<sup>112</sup>

Thus, to say a noun is not to simply *undergo* what is to be said, it is not to imitate or replicate one’s imagination or desire or pain, but rather to break an astragalos and give the others tallies. To understand a noun is to take the tally and match it. One can see here that letters articulated into nouns entail both an amazing economy and an equally vast range of ambiguity: speech articulates a virtually unlimited number of nouns out of a limited number of basic conventional units, and conventionally stands for a virtually infinite number of particular undergoings of the soul – but this economy is at the price of possible tragic ambiguities.

But just as a full understanding of letters requires an understanding of nouns, we cannot fully account for the function of a noun as a tally without considering the second articulation of *logos*: the synthesis of a noun *and* a verb. For the moment, let us recapitulate this long and complex section: the first articulation of *logos*, the “formal cause” of vowels and consonants is the noun and/or the verb. A noun is a conventional composite symbol and these three aspects of the noun require a threefold modification in the soul of the speaker: others are no longer simply either allies or enemies, means or obstacles, but *xenoi*; one’s expressions are no longer immediately meaningful voices, but *phaseis* – meaningful clarifying voices made out of meaningless opaque parts; and one’s very affections are not simply confined within the range of what one does or does not want, but rather extends to one’s desire of

being heard and understood and to one's desire for self-expression and understanding.<sup>113</sup> Conventionality (*kata synthêkê*), compositeness (*synthetê*) and symbolization (*symbolê*) are interconnected and equiprimordial – all are marked by the prefix *syn-* which denotes the central meaning of *logos*, a relation that holds together terms which either exclude or are fused into one another by nature: different undergoings of the soul, different voices and different people. All three cases are cases not of reorganization as voice was, but of re-potentialization. This is why, as we have seen in the previous chapter, if there is an Aristotelian understanding of education, it should be an education into *logos*, that is, it should nurture the student's ability to consider voices, affections and others not as end points but as beginning points: to re-potentialize her affections by neither yielding nor being indifferent to them; to re-potentialize her view of others instead of considering them as either allies or enemies, or else insignificant people; to re-potentialize and free her communication as no longer dictated by her own desire. Heraclitus likens this process, *paideia*, not to “the sun”, but to “a second sun” or “another sun”<sup>114</sup>; and for Aristotle this re-potentialization is interpretation.

#### 4. Meaning.

Letters, i.e. vowels and consonants, all meaningless, are articulated into nouns and verbs. But what is the overall purpose, the work, the function, the “that-for-the-sake-of-which” of this form? For Aristotle, even a compound noun such as *Kallippos*, which is obviously a compound of *kalos* (“beautiful”) and *hippos* (“horse”), is *not*

composed out of meaningful parts<sup>115</sup>: for Aristotle, *hippos* is indeed a noun on its own, but not as part of *Kallippos*. Aristotle is very consistent here: just as the wind does not utter the voice /u/, and just as /a/ in “apple” is *not* a noun, /kalli/ is *not* meaningful in *Kallippos*. Aristotle suggests that there is a strong sense in which a noun is a threshold of meaning: the meaning of a noun is not to be found in the meaning of its parts.

One can see how Aristotle’s positing of the noun as the first level of articulation of *logos* is implicitly an argument against infinite regress in meaning: as conventional, composite and symbolic, a noun, the basic meaningful unit of *logos*, is and should be able to *refrain from referring back to more elementary meaningful parts*, and to precisely mark the beginning of a realm of meaning to which no voice can access. Voice, on the contrary, is composed out of meaningful parts all the way down – a long cry is indeed composed out of short cries that do not mean the same thing, but *do* mean something, a slight emphasis in the pain or pleasure, a minor nuance of threat or invitation. Since voice, being meaningful through and through, has no threshold of meaning, it is hard to delimit *one* voice, whereas *one* word lends itself to understanding in a fundamentally different way: it “clarifies” when its opaque parts suddenly turn their face to one another.

Further, for Aristotle, just as *hippos* in *Kallippos* does not count as a noun, neither does “not-human” (which is an “indefinite noun”) nor “Philon’s” (which is a declension), “because it is not true or false with ‘is’, ‘was’ or ‘will be’.”<sup>116</sup> If for Aristotle a noun is a strong threshold of meaning, it is because a noun depends on whether it will contribute to a truth or falsity when it is coupled with the verb “to be”.

This is the first clue of the meaning of “meaning”: the possibility of truth or falsity when coupled with the verb “to be”. This is why a noun, and not the verb, constitutes *phasis*, the first articulation of *logos*.

As to verbs, one may expect a compound verb *not* to be composed out of nouns and verbs that by themselves have meaning.<sup>117</sup> Similarly, for Aristotle, “isn’t recovering”<sup>118</sup> does not count as a verb (it is only an “indefinite verb”) nor do “will recover” and “recovered”, being declensions of verbs: “they differ from the verb in that the verb designates [*prossêmainei*] the present time, whereas the others denote that which is around [the present time].”<sup>119</sup> A verb “is always a sign of that to which it belongs, for instance, of the underlying things”<sup>120</sup>, so much so that a *logos* need not contain a verb: the definition of human being is a *logos* that does not have a verb.<sup>121</sup> “[*Logos*] is composed of nouns each of which is a symbol.”<sup>122</sup>

Meaning is the *possibility* of truth and falsity when coupled with the verb “to be”. “Cleon” means something because “Cleon is” does, i.e. is either true or false. And further, “Cleon walks” signifies something, and it is a *logos*, it contains a part that by itself signifies something: “Cleon”.<sup>123</sup> But “walks” or even “is”<sup>124</sup> does not mean anything on their own, i.e. they are meaningful as something said of an implicit “Cleon”. Thus the meaningfulness of a verb is, so to speak, conditional: [*If* we are talking about Cleon, he] walks.

Even if we grant this dependency of verbs upon nouns for meaning, how are we to understand the priority of the positive over the negative (“non-human” or “does not walk”), and of the present over the future and the past (“will walk” and “walked”)? The reason is similar to that of the priority of the noun over the verb. Just

as the meaningfulness of “walks” implies a subject, the meaningfulness of “not-human” depends on “human”, that of “will walk” or “walked” on “walks”: Aristotle prioritizes the *tode ti*, and the actual. The negative and the future and past are again conditionally meaningful. It seems that for Aristotle “Cleon will walk” means “*if* we were in the future, we would say that Cleon walks”, that “Cleon walked” means “*if* we were in the past, we would say that Cleon walks”, and that “the not-human walks” means “*if* this were not the way it is, we would say that the *human being* walks.” Aristotle’s understanding of language or speech is certainly in line with his understanding of beings: in the terminology of the *Categories*, primary beings (particular *tode ti*) and secondary beings (*eidōs* and *genos*) are prior to their predicates<sup>125</sup>, the future and the past are derivative of the present<sup>126</sup>, and most fundamentally actuality is prior to potentiality.<sup>127</sup>

Just as *logos* first articulates voiced and unvoiced units (vowels and consonants) for the sake of meaning, we are seeing that the meaningful unit itself is determined in terms of a second articulation: the articulation of that which has meaning on its own (a noun) and that which has meaning only when coupled with a noun (a verb) for the sake of possible truth or falsity. The *possibility* of truth and falsity appears as the central factor of *logos* as speech. Thus, the “final cause” of the first articulation of *logos* points to the second level of articulation: however meaningful, nouns are not ends in themselves. This apparently trivial conclusion nevertheless has informative implications: Aristotle’s understanding of discourse is *not* based on “words”; reading Aristotle’s claims concerning language, but also concerning being as such, we should be able to leave aside a view that roughly

identifies languages with a set of words and their meanings, i.e. with dictionaries. Aristotle prioritizes speech over writing<sup>128</sup>, but also presents an understanding of *logos* as speech that is fundamentally oriented toward the possibility of truth.

## 5. Understanding.

“*Logos* is a signifying voice, one of whose parts is signifying separately, not as an affirmation (*kataphasis*), but as a *phasis*.”<sup>129</sup> So far we described the formation of *phasis*, of nouns and verbs, which are meaningful separately. Before we move on to the full phenomenon of *logos*, let us dwell briefly on the reception of nouns after having analyzed its production. To our knowledge, there is only one passage where Aristotle seems to address the issue of *understanding* a noun instead of hearing mere voice. And yet this passage from *On Interpretation* is very obscure:

“Verbs said by themselves are nouns, and they signify something – for the speaker puts the thought, and the hearer remained at rest (*êremêsen*) – but in no way does it signify whether it is or not. For ‘to be’ or ‘not to be’ (*to einai ê mê einai*) are not signs of a thing, not even if you said ‘the being’ (*to on*) on its own. For it itself is nothing (*auto men gar ouden estin*), but designates some *synthesis* which cannot be thought without the components.”<sup>130</sup>

Apart from this emphasis on the beings’ being something or the beings’ being as such, Aristotle here spells out both the productive and receptive side of clarification



of nouns: “the speaker puts the thought, and the hearer remained at rest.”<sup>131</sup> To hear and understand a noun involves rest. What kind of rest?

The nature of this “rest” becomes clearer once we compare nouns and mere voices. As we saw, voices “move”, they “invite” or “threaten”. They are imperatives, and as imperative, they imply a conditional threat or promise. Voice is the product of the animal’s incapacity to attain its object of interest *by itself* – of an obstructed “practical syllogism” – and its invocation of another to cooperate. “[In voice] the striking object here must be ensouled and have some imagination [with it], for in fact voice is a signifying sound, but not [signifying] the inhaled air as a cough.”<sup>132</sup> If the hearer of a voice as voice is neither impelled nor repelled away, it is simply because it is insensitive to the threat or invitation. Rest as a response to voice is contempt or indifference. Listening and understanding a noun as a noun, however, is precisely to “remain at rest” at least for a “moment” of understanding, i.e., of receiving the meaning by remaining open to its possibility of truth *and* falsity. “Rest” here is not at the expense of a relation to one’s interlocutor. The “rest” of understanding is not due to insensitivity, but due to the consideration of possibilities at least momentarily considered as options. The first articulation of *logos* is received by a being capable of holding the possibility of truth and that of falsity without letting one yield to the other.<sup>133</sup>

This structure of “momentary rest” in front of two contraries indeed matches that of the “potencies with *logos*” we saw in Chapter II: understanding a noun as a meaningful unit necessitates that the listener stay open to *both* of contrary possibilities, just as the “potency with *logos*” implies a “moment” where Socrates

“stands still” and “sees” the option of walking *together with* the possibility of not-walking<sup>134</sup>:

“For *alogos* potencies, whenever the agent and the patient meet in accordance with that potency, the one must act and the other be acted upon; but [in potencies with *logos*] this is not necessary, for whereas each single potency of the latter kind is productive of a single effect, those of the former kind are productive of contrary effects, so that one potency will produce contrary effects at the same time. But this is impossible. Therefore there must be some other dominant factor [*to kurion*], I mean desire or choice.”<sup>135</sup>

Desire or choice – but which one holds both possibilities open? And is this an inclusive disjunction or an exclusive one? The faculty that holds them open is clear: imagination. But Aristotle argues that the imagination combining sense perception and therefore pleasures and pains must be distinguished from an imagination involving the work of *logos*, *logismos*:

“So a sensory imagination, as was said, belongs to other animals as well, whereas the deliberative one belongs to those that are *logistikê*: for, whether one shall do this or that is already a work for *logismos*, has to be measured by one [criterion], since one is looking for the better. Thus one is able to make one thing out of many images. This is the reason why [other animals] do not seem to have opinion, because they do not have opinion that comes from a

*sylogismos*, while others do have it. Therefore desire does not have the power of deliberating. At one time desire conquers and moves the deliberation, at another time the other does the same to this one like a ball; desire does the same to another desire, when there is lack of self-restraint. But by nature the higher is more governing [*arkhikôtera*] and moves.”<sup>136</sup>

Here we see that deliberative imagination is the realm of *logismos*, that realm belonging only to the *logistikos*, where motion is not produced by the stronger desire’s knocking away the others, but by a “momentary rest” of the immediate provocation of desires in consideration: “... desires come to be contrary to one another, which happens whenever *logos* and appetite are contrary to one another, and comes about in beings that have perception of time...”<sup>137</sup> In other words, the ability to foresee the future, to grasp one’s life as a whole and not as an agglomeration of atomic moments, decisions and motions, is equiprimordial with having *logos* and acting according to it. Since the motion dominated by *logismos* does not conquer desire, it cannot be insensitive or repressive toward it. *This* motion is action.

To return to nouns, then, we see how the distinction between the quantitative struggle of desires and *logismos* here shows up in the form of a distinction between motion/rest according to pleasure, pain or contempt, and a “rest for *logos*” with an eventual consequent response. To hear a noun as a noun is to be open to a kind of meaning that is irreducible to the massive meaningfulness of voice, to be open to a certain field of *possible* truth and falsity beyond the field of immediate pleasure and pain. Sensation of proper sensibles, and the pleasure and pain accompanying them,

are so revealing that their truth is not an issue<sup>138</sup>, whereas *logos* is such that it always entails truth as an issue. The “rest” that constitutes the completion of the first articulation of *logos* for Aristotle then is a paradoxical rest in hesitation – not the hesitation between two almost equal pleasures or pains, but that between the possible truth and falsity that the noun may instantiate, a minimal patience for interpretation, a “hermeneutical patience”.

“In general a sign of the one who knows and the one who does not know is being able to teach, and for this reason we regard art, more than experience, to be knowledge, since the one can, but the others cannot teach.”<sup>139</sup> Just as a sign of knowing is the ability to reformulate the content of knowledge to others in other particular circumstances instead of merely repeating it, a sign of the one who has understood a noun is his ability to reformulate the same thing with other words, to paraphrase it, to make variations on it while preserving the exact same possibilities of truth and falsity. A sign that one has understood the word “Socrates” is one’s ability to paraphrase it with “a man”, “Plato’s tutor”, “a philosopher”, etc. without changing the truth values it may have when coupled with “is” or “is not”.

A symptom of the understanding of a noun then is the listener’s readiness to proceed from the first level of articulation of *logos* to the level of its full, second, articulation. To understand the word “Socrates” is tantamount to fall in a preliminary an aporia, to assume “hermeneutical patience”, and be provoked to ask: “*What about Socrates?*”

### C. THE SECOND ARTICULATION OF *LOGOS*.

Let us finally turn to the second level of articulation whereby nouns are articulated into *logos* as discourse.

#### 1. Wish.

Since “*logos* is a signifying voice, one of whose parts is signifying separately, not as an affirmation, but as a clarification”<sup>140</sup>, and since, as we saw, noun is the basic form of clarification, one now expects nouns to be articulated into affirmative and negative declarations; after *phasis*, one expects *logos* to appear as *apophansis* (“declaration”) in its two forms of affirmation and negation.<sup>141</sup>

But Aristotle does *not* proceed from “Socrates” to “Socrates walks”. Doesn’t *logos* fully appear in the form of declarative sentences? No. All declarative *logos* is indeed *logos*, but not the other way around.<sup>142</sup> Aristotle explicitly says that *apophansis* is not coextensive with *logos*: “Not all *logos* is declarative, but the *logoi* to which truthfulness or falsity belong. For instance, a wish [*eukhê*] is a *logos*, but it is neither true nor false.”<sup>143</sup> For further elaboration of this exception, Aristotle refers the reader to the *Rhetoric* and the *Poetics*.

The term *eukhê* means “vow” or “prayer”, but also “wish” or “aspiration” in opposition to reality. It is insistently employed in the discussion of the “ideal state” in Plato’s *Republic*.<sup>144</sup> Aristotle uses it in the *Politics* for the same kind of speculations or expectations concerning constitutions.<sup>145</sup> In any case, despite Aristotle’s reference

to the *Rhetoric* and the *Poetics*, Aristotle's account of "wish" seems to be absent from both: *eukhê* does not seem to even occur in the text of the *Rhetoric*, whereas in the *Poetics* it momentarily figures in a suggestive but undeveloped discussion of the forms of expression.<sup>146</sup>

How then are we to establish the significance of "wish" as a first full manifestation of *logos* as discourse? Our claim is that Aristotle's account of "wish" is to be found in the *Nicomachean Ethics* under the form of *boulêsis*. There, having just distinguished both appetite and spiritedness (*thymos*) from choice, Aristotle continues:

"Again [choice is] not wish [*boulêsis*] either, though they appear to be close. For there is no choosing of impossibilities, and if one were to say to choose [an impossibility], he would appear to be a fool. But there is wish for impossible things, such as immortality. Also there is wish concerning things that cannot be done by oneself, for instance that an actor or athlete may win; but no one chooses such things, but what one thinks can come to being by oneself; further, wish is rather for ends, while choice is for the means to an end, for instance we wish to be healthy, but we choose those things through which we shall be healthy; we wish to be happy and say so, but it would be discordant [*oukh harmozei*] if we said to choose it. For choice appears to be concerning things up to us."<sup>147</sup>

Using this text, we may shed light on wish as the first full appearance of *logos* by distinguishing it from three things.

Firstly, then, wish is not a declarative sentence. It is not the expression of a past, present or future state of affairs. Further, in the form of wish *logos* opens not only the realm of possibility of truth, but also the realm of the impossibility of truth, of desire beyond possibility. Clarification is not immediately taken up by declaration; wish is a detour into the fundamentally unreal. Here lies a human phenomenon that would be obliterated if one were to simply proceed from nouns to affirmative and negative sentences. And since Aristotle does not marginalize this kind of *logos*, but refers us elsewhere, let us not rush into our discussion of declarative *logos* and dwell on wish.

Wishes are neither true nor false, but also a wish *cannot* be true or false as a wish. It is inexact to say that wishes *become* true, since what becomes true is never a wish, but the statement concerning the future implied in the *content* of the wish, and this content does not exhaust wish. It is not its *content* (“the occurrence of a sea-battle tomorrow”), but its mood that makes a wish. In other words, when one says “May there be a sea-battle tomorrow” and when the sea-battle does happen, what *becomes* true is not the wish, but the statement of the following wager precisely abstracted from the mood of wish: “There will be a sea-battle tomorrow” and *a fortiori* the statement “There may be a sea-battle tomorrow”. But, being beyond the grasp of truth and falsity, the dimension of profound unreality in wish penetrates the past as deeply as the future. Aristotle quotes from Agathon: “The god is deprived from this alone: to make what has been done undone.”<sup>148</sup> And yet, having *logos*, limitlessly capable of

wishing, human beings have access precisely to the realm of this impossibility: “Only if we had not killed Socrates!”

Secondly, wishes are not exactly conditionals. Salutations, greetings, prayers, swears and curses are all kinds of wishes, and in these occurrences, the *kat' eukhên* is clearly unbound by reality, but also by possibility and conditionals. Wish is a *logos*, but a *logos* of something even beyond the grasp of the possibility of truth. There is a clear modal difference between the sentences “Only if they do not kill Socrates!” and “If Socrates stops philosophizing, they will not kill Socrates”. A curse (“May Athens regret their verdict!”) differs in the same way from a threat (“If Athens condemns Socrates, they will regret it!”), just as a blessing from a promise. Wishes are paradoxically disengaged “promises”. We already saw that threat and promise were already implicit in “voice”, but here wish turns out to be irreducible to either. In a way, being unconditional, a wish is a *logos* that is simply invulnerable in the face of all conditions, an unjustifiable and irrefutable *logos*. All kinds of wishes and all meanings of *eukhê* or *boulêsis*, except “vow”, are expressions of an *intention* without regard for realization and exempt from the trial of truth and falsity.

Thirdly, however, wishes also differ from orders which may appear to be unconditional like them. Unlike orders, a wish is precisely not a desire that is obliterated and translated into calls for cooperation toward others by means of “voice”. Wish differs from desire by not spilling into either actions or calls for actions. “Save Socrates!” is a linguistic expression of a desire which would immediately move the subject if he perceives the means to fulfill it. But “Only if Socrates was saved!” is a wish – if it is a desire, it is a universal premise of desire that



*is not* coupled with the particular premise of perception so as to give rise to locomotion. Desire moves the animal, wish does not; voice is a call for cooperation and a project, wish is not. Thus wish results in a non-action, it does not *result* at all.

Being distinguished from statements, conditionals and orders, wish is only limited by these three. Hence one can wish triangles to have any number of angles *except three*. Thus the whole point of wish is that one *can* wish for an impossibility, that one *can* wish for that which one has not experienced and cannot experience: one wishes that one recovers, which may be indeed possible, but one may also wish that one has not undergone a trauma, which is impossible, that circles have a finite number of angles, that the Trojan War had not have happened, that one had not have committed such and such an act, or that the Athenians had not condemned Socrates to death: “Only if we had not killed Socrates!”

This structure then is no more akin to prayer, utopia or wishful thinking, than to regret and bad consciousness. *Logos* as wish opens a vast realm of detachment and abstraction from the concrete being which one is, and from projects which one can make. Being fundamentally different from statements concerning that which is, wish is exempt from truth and falsity; being fundamentally different than a statement concerning that which can be, it is exempt from the very *possibility* of truth and falsity; being fundamentally different than an order, wish necessarily exempts itself from an appeal to others and remains isolated, “verbal”, or, as Aristotle sometimes uses it, *logikos*.<sup>149</sup> Thus, by elaborating Aristotle’s distinctions, we see how wish differs from statements of “reality”, whether past, present or future, from statements of possibility, i.e. conditionals, as well as from orders.

A reflection of this fourfold distinction between expressions of states of affairs, conditionals, orders and wishes, is found in the four verbal moods in Ancient Greek: the indicative, the subjunctive, the imperative and the optative.<sup>150</sup> Is it a coincidence that the Latin adjective optative comes from the verb *opto*, “I wish”<sup>151</sup>, and that the Latin term “optativus” corresponds to the Greek *euktikê*, the adjectival form of Aristotle’s word *eukhê*?<sup>152</sup> This does not imply that Aristotle’s distinctions are simply determined by the moods of his native language; on the contrary, as we have seen, this division roughly corresponds to four “states” of the human soul: we shall see the indicative mood in our next discussion of declarative *logos*; in Chapter II, we saw the subjunctive in our discussion concerning future contingents and possibility; in the first section of this chapter, we saw that an order is akin to “voice” which Aristotle defines as a “sign of the pleasant and the painful”<sup>153</sup>; and just now we have shown that wish *is* a *logos*, although irreducible to either of the three.

Hence wish is quite odd and unnatural in the eyes of the desiring interested animal, and yet it is a *logos*, it is quite “verbal” (*logikos*), and it is a significantly human phenomenon. It is a divorce between desire and perception, an unbridgeable gap between the human soul and its environment and thought, and therefore an abstraction from locomotion as well as from action, but also a certain “freedom”, detachment or independence from that which *is* or *can be* or even *could have been*. Since Aristotle says that wish is *logos*, we cannot exclude it from the human condition: humans must have a paradoxically static way of desiring, a way of projecting *without engagement*, a way of desiring even *undesirable* things, a way of desiring that is so universal that no particular does, will or even can ever correspond

to it. The human soul, by having *logos*, and by being able simply to wish things, opens itself to hopes and fears that would indeed have seemed odd, fantastic or simply irrelevant in the animal realm, because the *logos* of wish is the expression of some interest that does not move the subject. Most importantly, being irreducible to voice which simply *indicates* the desire of the animal's soul, wish as *logos* is the expression of something one has not experienced, may never experience, and may know well that one will never experience. Wish as *logos* is the threshold that leads beyond first-hand experience.

## 2. Autopsy.

Finally we come to the most common, but, as we saw, by no means exclusive use of *logos*: *logos apophantikos* or “declarative sentence”. We saw how clarification makes apparent by means of a meaning that first emerged out of meaningless parts; this is why, as Aristotle insisted, “non-human” was not a noun in the strict sense<sup>154</sup>: “non-human” does not clarify in the strict sense, it rather obscures something, crosses it out; if we must say that “non-human” clarifies something, we must add that it does so only because “human” does, but not the other way around. Similarly “runs” does not shed light on its own, but only with a runner.<sup>155</sup> “Will run” and “ran” are further derivatives of the already derivative “runs”, since they clarify the already derivative “runs” by way of a conditional: “*if we were* in the future, we *would* declare that she runs”, “*if we were* in the past, we *would* declare that she runs.” When clarification happens, we have a subject matter, an underlying being. For Aristotle, then, what is

clarified in the proper sense is a noun, and more precisely, that which is *talked about*. “Socrates” is meaningful as that which is talked about, because it is possibly true or false when coupled with the verb “to be” – which precisely brings about the implicit question of the hearer of the name “Socrates”: “*So what about Socrates?*”

If clarification is so, then it is the declarative sentence that contains the answer to the above question, the fulfillment of this expectancy. “*Logos* is a signifying voice, one of whose parts is signifying separately, not as an affirmation, but as a clarification”<sup>156</sup> then means: *logos* has a meaningful part that makes apparent, but this second level of articulation also articulates that independently meaningful part to that which applies and does not apply to it (*hyparkhein*) with temporal specification.<sup>157</sup> In the first case, indeed, the declarative *logos* is affirmation (*kata tinos*), in the second, it is negation (*apo tinos*): “Affirmation is a declaration of something concerning something (*tinis kata tinis*), whereas negation is a declaration of something against something.”<sup>158</sup> Saying that a sea-battle *will* happen tomorrow, that it *will not* happen tomorrow, or even that it *can* or *cannot* happen is fundamentally different from wishing, in that the former not only have a subject matter that is clarified, but also *say something* about it.

The duality of affirmation and negation is explained by the duality of truth and falsity, and this latter by the principle of non-contradiction: concerning the very same subject matter, declarative *logos* is necessarily open to *both* truth and falsity, therefore any such *logos* can be negated. Here we see that truth or falsity, the radical breakthrough out of voice into *logos*, puts at work that which was potential in clarification: “A battle is happening” is not simply a clarification of something (“a

battle”), but finally an expression of *something* about it. This is precisely why “I want the battle to happen” clarifies *me* and then says *something* about me, applies *something* to me, this is why “The battle is happening”, “The battle can happen” or “The battle could have not happened”, clarifies the battle and then says *something* about the battle, whereas “May the battle happen” clarifies the battle without going further in its making seen. A wish concerning Socrates is precisely *not* an answer to the question: “*So what about Socrates?*” But if the expression of wish exhibited a vast realm of “freedom”, *logos apophantikos* enjoys a “freedom” that is almost as unlimited, a “freedom” that extends far beyond correctness into the myriads of ways of being incorrect. *Logos apophantikos* is even “worse” than wish: as having *logos*, humans not only wish for impossible things (“May we have not killed Socrates!”), but they are capable of denying truth itself: “No, we did not kill Socrates!”

This is why such correctness is not a fact, but an *issue*. For structural and necessary reasons, *logos* is certainly not a perfect means to truth as adequation.<sup>159</sup> On the contrary – and this is a clue to the very fundamental character of human *logos* – the vast possibilities of predication of that which is clarified, of “Socrates”, enable humans not simply to multiply truths concerning Socrates, but also, on the contrary, to make truth a task. For humans, truth as adequation is almost a nostalgia for the strictly animal condition, for the full experience of sensation<sup>160</sup>: for presence, for pure experience, for apperception, for first-hand witnessing, for the apodictic certainty of Cartesian thinking<sup>161</sup>, for seeing from one’s own eyes or at least for the self-evidence of *imagining* that one sees from one’s own eyes. For humans, first-hand experience and direct perception are more often than not a task, if not an often impossible one.

There is an Ancient Greek word that perfectly corresponds to this ideal of apperception: *autopsia*, “seeing from one’s own eyes”, “first-hand experience”, “witnessing”. Aristotle uses not *autopsia*, but its cognate *autoptês*, “eye witness”, exactly in the sense of first-hand knowledge as opposed to mere *legein*: “As we said, the largest rivers flow indeed from the highest mountains. To those who look at maps of the earth this is clear, for they have been drawn by means of *in situ* investigation or, if not seen first-hand [*autoptas*], then by means of those who speak.”<sup>162</sup> The other three occurrences of *autoptês* in Aristotle exactly correspond to first-hand witnessing.<sup>163</sup>

As we can now see, having *logos* is ill-suited to *autopsia* taken as an ideal: its double-articulation precisely removes *logos* away from first-hand experience. As Rémi Brague subtly explains<sup>164</sup>, there may be an Ancient Greek epistemic ideal of *autopsia*; but if the Ancient Greeks, but also, as we noted, Descartes, and precisely human beings in general, can be concerned with *autopsia* at all, this is because the human condition is not confined to it. On the very contrary, it is because the human condition is wrapped up with hearing that “which may well be simply the record of somebody else’s discourse”<sup>165</sup> that the truthfulness or adequacy of declarative *logoi* is not a fact, but an issue. The human condition, but also perhaps Ancient Greek philosophy, are understandable less by asserting the preeminence of sight or hearing or language as such, or by noticing the quantitative complexity of human life and communication, than by emphasizing the irreversible human detachment from, and possible yearning for, *autopsia*. It is the forms of “not seeing with one’s own eyes”,

but indeed also of “not hearing with one’s own ears” that give its specific form to the human condition.

Declarative *logos*, which articulates the clarified subject matter with that which is truly or falsely said *about it*, thus ties in with the expression of wish: unlike imperatives and the subjunctive conditions implied in them, indicative and optative sentences both contribute to drive the human condition away from *autopsia* toward a vast and confusing realm where unrealizable desires, unjustified and unjustifiable sentences proliferate.

### 3. Three kinds of hearing.

This is our conclusion in this chapter, and our final conclusion in this dissertation as a whole: *logos* as speech or discourse is first and foremost the understanding and expression of that which is not experienced first hand.

Is this claim expressed by Aristotle? No. Is it implicit in the corpus so that we may support it by Aristotelian texts? Yes, and this is precisely what makes our dissertation possible and compelling: the claim is not out there, but its material is. Which Aristotelian passages then provide the material for this conclusion? Three texts from the *Metaphysics*, the *History of Animals* and indeed the *Politics*. Aristotle provides us with a clue for understanding not the human production of *logoi*, but human reception of *logoi*. Hence, our clue is the verb *akouein*, “to hear”.

The first passage, from the famous opening of the *Metaphysics*, provides us with a tripartite framework:

“By nature animals are born with sensation, and in some, memory comes from this, but in some it does not. This is why the former are more intelligent and capable of learning than those that are incapable of remembering; all those that are incapable of hearing sounds [*tôn psophôn akouein*] are intelligent without learning, for instance bees and any one of that kind of animal. All those that have this sensation besides memory learn. While, then, other [animals] live by impressions and memories, they have a small share in experience; on the other hand, the human race also lives by art and reasoning.”<sup>166</sup>

- (a.) The first kind here is the kind that has memory and thus some intelligence; then
- (b.) comes the kind that is said to “hear sounds” and thus being able to learn; finally
- (c.) come human beings who have a larger share in “experience”.

(a.) Bees:

After our numerous lengthy discussions of wax, fire and bees, it may not be surprising that bees fall into the first kind, even though Aristotle affirms that they are not only intelligent and foresee bad weather<sup>167</sup>, but even that they have some share of the divine.<sup>168</sup> The passage from the *Metaphysics* clearly states that they are incapable of “hearing sounds”. And yet the *History of Animals* is unclear about this issue: “Bees seems to like the sound of a rattle... It is not altogether clear [*adêlon holôs*, altogether



unclear?] whether they hear...”<sup>169</sup> A passage in the latter text suggests that bees are not simply deaf:

“At day-break [bees] remain silent until one of them wakes them up by buzzing two or three times. Then they fly to work together; and when they come back they are noisy at first; but gradually they become less so until one of them hums and flies around, so as to signify sleep. Then suddenly they keep silent.”<sup>170</sup>

Do bees hear, then, or not? Aristotle would rather ask: what are the ways in which “hearing” is said? And what is the kind of hearing bees are capable of? Bees do hear in the sense of perceiving an order and of immediately obeying it: waking up or going to sleep.<sup>171</sup> But bees do not hear *in such a way as to learn, repeat and propagate what they hear*. But why does Aristotle add that bees are incapable of hearing “sounds” (*psophos*)? Because, as we have seen from our previous analyses, the order that bees hear is precisely *not* a “sound” as such, but a “voice” (*phônê*): a call for cooperation for the sake of common desire, an obliterated practical syllogism bringing together the universal good and the particular sensible experienced first-hand or remembered or anticipated.

But there is another problem. This one concerns not the bees’ ability to hear, but their inability to “hear sounds” and thus to “learn”: in the *History of Animals*, Aristotle says that some bees construct rough combs and adds that “there are some beekeepers say that it is chiefly the young ones that do this out of lack of science

[*anepistêmosunê*]<sup>172</sup> Even so, there is no indication that the young *learn*, i.e. “hear sounds”, *and then* become capable of building better combs. Further, this is not the only instance in Aristotle *epistêmê* is used very loosely: for example, Aristotle himself says that “children seem to lack the science of being awake”.<sup>173</sup> On the contrary, that young bees construct rough combs shows that they *do* construct combs without there being any mention of learning and instruction. It is because bees hear one another in the sense of receiving an order that bees do have “a small share in experience” according to the *Metaphysics*. This does not mean that their experience is not complicated; they have “a small share in experience” only because they have a share *only in first-hand experience, in autopsia*.

(b.) Birds:

Then hearing is said in at least two ways: first, hearing in the sense of receiving an order or obey a “voice”, and then, hearing in the sense of “learning”, the “hearing of sounds”. What does this latter kind of hearing involve? First, the passage from the *Metaphysics* suggests that the humans are *not* the only kind of animal capable of learning. Which animals are capable of “hearing sounds” and thus of learning? At least one answer is found in our second text, the *History of Animals*:

“Among small birds, while singing some utter a different voice than their parents if they have been reared away from the nest and have heard [*akousôsin*] other animals sing. A hen nightingale has before now been seen to

teach her chick to sing, suggesting that song does not come by nature as idiom and voice does, but is capable of being shaped.”<sup>174</sup>

We are familiar with this text from our previous chapter: birds habituate their chicks to sing a certain way, possibly in order to train them for the future, besides giving them orders or calling out for them. The chicks, in turn, are able to learn the way of singing of the birds around them, besides perceiving voice as voice; they listen not in the sense of awaiting an order, but in a very narrow sense of learning: imitation. It is because the chicks do not perceive any call for cooperation in the songs they hear that Aristotle uses here the expression “hearing sounds” instead of “hearing voices”.<sup>175</sup> Hence it is known that some birds imitate not only other birds’ or humans’ voices, but precisely inanimate objects.

Note that just as not all habits are consciously instituted as habits, chicks’ imitations are *not* made for the sake of imitating. As we emphasized in our previous chapter, they result not from representation, but from immediate identification. Unlike bees who were above far removed from the project of imitating the voice they hear, birds sing not only “innate” or “instinctive” songs, but also the songs they have experienced first hand around them. This imitation, just like habit, is precisely the internalization of first-hand experience. This is precisely why, they have a share in experience, but again *in first hand experience, in autopsyia*.

(c.) Humans:

But, according to the *Poetics*, don't humans excel in imitation among all animals?<sup>176</sup> And isn't the human life full of extremely complicated structures of orders, threats, prohibitions, conditionals, etc.? True, but neither define humans. What then does define humans? Is there a third kind of hearing irreducible to that of bees and birds? There is at least one according to our third text, which we shall quote extensively:

“There are three things by which human beings are made good and serious; these three are nature, habit and *logos*. For first one must be born a human being and not any other animal, thus must have a certain body and soul. But there are some qualities that are of no use to be born with, for our habits make us revert them; in fact by nature some are liable to become for the worse or for the better by habits. So other animals mostly live by nature, some do so to a small extent by habits too; but the human being lives by *logos* as well, for only the human being has *logos*. So that these [three] must be harmonized. For human beings often act contrary to habituation and nature because of *logos*, if they are persuaded that some other way of acting is better. Now, we have already delimited the natural property of those who are to be amenable to the hand of the legislator. The work left to do is education, for humans learn some things by being habituated, others by listening [*akouontes*].”<sup>177</sup>

As this last word suggests, then, hearing is indeed said in at least three ways: first, the bees' innate perception and execution of orders (voice-hearing), then other animals'

hearing in the sense of learning, i.e., imitating their environment (sound-hearing), and thirdly one last kind of hearing.

What is heard here is *logos*, and the process involved is education. Hearing *logos* is not to hear an order or to be exposed to a behavior to imitate. What exactly is heard in *logos* such that it is neither orders to execute nor things to imitate? Human beings hear what they hear not only from their natural parents or from those who happen to be around them; they hear what they hear not only from their environment as such or from their parents, but precisely from “*both one’s father and friends*”<sup>178</sup>; they hear precisely that which they *have not yet* experienced and that which they *cannot* experience first hand, that which the speaker may well have not experienced herself either, that which they may want while knowing that they cannot live, that which they wish.

Then according to Aristotle humans have a “larger share” in experience in comparison to other animals not quantitatively, but qualitatively: their experience does not exclude but inextricably incorporates that which they have *not* experienced first hand. Human *logos* is the capacity to understand and transmit that which is not and may never be experienced first hand.

#### 4. Human *logos*.

Hence the rest of the passage from the *Metaphysics* draws a crucial contrast between human beings and other animals:

“Then other animals live by images and memories, they have a small share of experience, whereas the human kind lives also by art and *logismoi*... To have a judgment that when Callias was suffering from this or that disease this or that benefited him, and similarly with Socrates and other such persons, is a matter of experience; but to judge that it benefits all suffering from this or that disease *that are delimited according to one form*... is a matter of art.”<sup>179</sup>

One can see that the small share of experience animals have (“images and memories”) is exactly first-hand experience: perception, memory and various imaginative processes. The “large” share of experience reserved to humans, whereby they also partake in art and *logismoi*, is precisely experiences *not* made first hand. An unscientific treatment may replicate or apply traditional recipes, make inferences and predictions based on past facts: “this treatment always worked for curing all humans, this is a human, then...”, whereas to have a scientific medical skill, which Aristotle will explicitly call *logon ekhein*<sup>180</sup>, is to have access to the particular manifestation of the disease as being *caused* by the patient’s being *such and such*. Not that unscientific treatments have no general concepts or knowledge of species, but rather that they are not familiar with the form as being the very cause of the disease so as to make the following kind of inference: “this treatment works for curing *this form* of human beings because it is their form that is responsible for the disease, this is a human of *that form*, therefore...”

Hearing, then, is said in many ways, or at least three ways: while bees hear in the sense that they are aware of natural signals and orders (voice-hearing), some kinds

of small birds hear in the sense that they are able to repeat and internalize the first-hand experience of their environment (sound-hearing), specifically human hearing is *logos*-hearing: understanding *without* having to experience its content or even being able to experience it. Human *logos* may happen to (*symbainein*) employ hearing and spoken words, and yet *logos* in a written form, say a note or a book, is essentially more akin to audible *logos* than any birdsong.

“Hearing conveys the differences of sounds, but in some animals it also conveys the differences of voice. Incidentally [*kata symbebêkos*] hearing makes the largest contribution to prudence, for *logos* is the cause of learning by being audible, but it is audible not in itself but incidentally, for *logos* is composed of nouns and each nouns is a symbol.”<sup>181</sup>

The sign that one has understood *logos* is that one is able to further relate it to others who are equally deprived of the first hand experience; on the contrary, the sign that one has *not* understood is that one simply repeats the words and is unable to adapt their meaning to particular cases if need be. While executing an order is a sign of hearing an order, and repeating a song is a sign of hearing it in the way chicks do, paraphrasing seems to be a sign of understanding *logos*. This is just what happened with virtues as we saw in our previous chapter: just as a doctor interprets an itch sometimes as a sign of healing but sometimes as a sign of disease *according to the middle term, i.e. the kind of patient at hand*, a guitarist is someone who not only repeats his teacher in playing certain songs in certain circumstances in certain ways,

but is necessarily also able to play the same songs in different ways in different circumstances, or different songs in same settings, and in this sense she is freed from her training and education; finally, the sign that one has become courageous is that one is capable of performing different particular actions in different particular situations *without ceasing to be courageous in the least*. Habituation gives rise to virtue not because repetitions of first-hand experienced virtuous acts are virtuous, but because repetition enables the student to understand the particular reasons behind actions and thus independently confront situations she has *not* experienced first hand.

Aristotle insists that first-hand experience is often more successful than science and art: being transmitted from generation to generation by means of successive first hand experiences, traditional medicine, ancestral morality, familial customs and regulations of rural life provide such an immense accumulation of habits that one is almost puzzled when Aristotle denies the term “wisdom” to them. And yet what makes the strength of habits is also its limitation so that “it is probable that at first the inventor of an art besides common sensations was wondered at by humans, not merely because some of his inventions were useful, but as being wise and different than the others.”<sup>182</sup>

## 5. Conclusion.

The human ability to understand and express that which they have not experienced first-hand is the full and correct interpretation of Aristotle’s implicit conception of human *logos* with all its psychological, scientific, ethical and political



implications that bring together the compartmental insights of Aristotle's philosophy of human being. And this is the appropriate background for understanding the famous passage from the *Politics* which served as our primary text in this chapter:

“It is clear that the human being is a political animal to a larger degree than any bee or any gregarious animal. For, as we say, nature does nothing in vain, and the human being alone of the animals has *logos*. Now, on the one hand, voice is a sign of the painful and pleasant, therefore it is possessed by other animals as well (for their nature has come up so far as to have sensation of the painful and the pleasant and to signify them to one another); on the other hand, *logos* is for making manifest the advantageous and the harmful as also the just and the unjust, for it is characteristic of human beings apart from the other animals to have the sensation of the good and the bad, the just and the unjust, as well as of others, and the community in these makes a household and a *polis*.”<sup>183</sup>

Human *logos* enables not only virtue and community, but also historiography and science insofar as both deal with that which cannot or does not have to be experienced first hand in order for information to accumulate. This sense of *logos* no less enables lying, dissimulation and propaganda. Politics and philosophy too are constituted by that which we have not experienced, are not experiencing, and may well never experience. In other words, first hand experience is an insufficient condition for a comprehensive understanding of the human condition.

It is the human presence that is shot through with *logos*: being detached from that which is standing right in front of them, human beings stand in front of things in a specific way. Since humans are able to somehow “witness” that which they have not witnessed first hand, the following question is more telling in this context than the response: “ – Yourself, were you with Socrates yourself the day he drank the poison in prison or did you hear it from someone else? – Myself, I was there myself Echecrates.”<sup>184</sup> This is a paradigmatic situation that characterizes human dialogues: the speaker may well be transmitting her first hand experiences, her *autopsia*, but not necessarily so:

“Since it is impossible to discuss by bringing in the things themselves, but we make use of symbols in the place of things, we think that what happens with names also happens in the case of things, just as people who count pebbles [*psêphôn tois logizomenois*].”<sup>185</sup>

Again and again Aristotle emphasizes that once we are dealing with human *logos*, we are no longer simply dealing with “things themselves”; the awareness of “things themselves” become a task to fulfill, a goal to attain and often to irrevocably miss. It is this hermeneutical task that is implicit to Aristotle’s *logikê* in general, but also to the ambiguous Platonic strategy of *writing dialogues*. As the human speaker is capable of relating her experience and that which she has not experienced, the human listener is able to consider that which she hears as either of the two. Echecrates *can*

believe that Phaedo is relating his first-hand experience, but he does not have to; it is human *logos* that necessarily brings along trust and distrust as open options.

Aristotle employs above the expression “counting pebbles” in its literal sense of counting on an abacus – and precisely *not* with abstract symbols and numbers. But indeed the Ancient Greeks’ usage of pebbles goes far beyond counting pebbles *as pebbles*; they are also used for *representing something*, most notably, as some passages in Aristotle testify<sup>186</sup>, they are used as votes, i.e. as representing people’s opinions. And it is true that for Aristotle there is something fundamentally inadequate to the human condition in simply *counting votes* for and against in decision making: simply voting for and against is in fact a regression into expressions of pleasure and pain. Hence the exclusive options of protesting and applauding, of calling *ay* and *no*, are often expressed by the word “voice” in English, for instance, in expression like “to collect the voices” or “voice vote”. On the contrary, for Aristotle, what gives life to laws, contracts or decisions, what establishes the very options to be voted for, is the excellence of deliberation: “law has a compulsory force because it is a *logos* emanating from some prudence and intelligence.”<sup>187</sup> But again, this is the foundation of sophistry and demagogy as well as that of genuine political participation. Sophists and demagogues are able to manipulate their audience in ways a tyrant may not be able to, because, having *logos*, the sophist has access to experiences of others, and because, having *logos*, the demagogue is able to view the world not only in terms of his own agenda, but also from the standpoint of the people.

Hence when Aristotle distinguishes four kinds of *logoi* or “arguments” in discussion (“didactic arguments, dialectical arguments, examination arguments and

contentious arguments”<sup>188</sup>), all four are explained in a short sentence which each time implies *the assumption of somebody else’s point of view*: “Didactic arguments are those which reason [*syllogizomenoi*] from the principles appropriate to each branch of learning and not from the opinions of the answerer, for he who is learning must take things on trust.”<sup>189</sup> This is exactly what we meant by saying that science requires an accumulation of knowledge that is obviously impossible without the capacity for understanding and relaying that which one has not experienced first hand. Aristotle continues: “Dialectical arguments are those which, starting from widespread opinions, reason concerning a contradiction.”<sup>190</sup> We dealt with the importance of dialectical method in our introduction, so here let us only note how it requires human *logos* as being specifically oriented to that which is *not* clear to us, but may be clear by nature. Thirdly, in examination arguments the questioner tunes into the mindset of the answerer<sup>191</sup>, and finally, contentious arguments “are those which reason or seem to reason from opinions which appear to be, but are not generally accepted.”<sup>192</sup> This last sense, as the previous ones, is inconceivable so long as we interpret *logos* merely as “statement”, “sentence”, “inference” or mere “argument”: *logos* means “argument” not in the sense of a private reasoning, but in the sense of a reasoning from or towards somebody else.

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The human ability to understand and express that which one has not experienced first hand: this final meaning of *logos*, which is understood as

“discourse”, “speech” or “language”, and is further extended into “book”, “oration”, “sentence”, etc., still refers back to the focal meaning of *logos*: just as “standard”, “proportion” and “reason”, *logos* as “discourse” is a relation that holds on to one’s experience (since hearing somebody talk is an experience in its own right), but also to that which extends beyond experience into the “wonders” (*deina*) Sophocles says humans are capable of<sup>193</sup>, and into admiration in front of that which a human being will never be, for instance, into puzzlement in front of the standard of being of an ox, its “*logos* of being” – the first question of this dissertation. The question of the “*logos* of being” shows itself only to a “being with *logos*”.

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<sup>1</sup> DK22B134.

<sup>2</sup> *Nicomachean Ethics*, I, 13, 1102b29-1102b32.

<sup>3</sup> *Politics*, I, 1, 1253a10; VII, 12, 1332b5-6; *Nicomachean Ethics*, IX, 9, 1169b20-21; *Eudemian Ethics*, II, 8, 1224b30. But see also *Nicomachean Ethics*, VIII, 12, 1162a15-25.

<sup>4</sup> *Politics*, I, 1, 1253a14-18.

<sup>5</sup> As will be seen, we talk about a “double articulation” because we find, not only this idea, but also this terminology in Aristotle. Nevertheless we are indeed aware of, and do not wish to preclude its immediate connotations in the 20<sup>th</sup> century linguistics. (See, for instance, Jean-Louis Labarrière, *Langage, Vie politique et mouvement des animaux*, (Paris: VRIN, 2004), pp. 27ff.)

<sup>6</sup> For *sêmeion* and its derivatives (see *sêmeinein* below), we shall use “sign” and its derivatives – but, as we shall see, this is not to be taken etymologically; in other words, “*sêmeinein*” does not imply the making of a sign, but can mean mere expression. Similarly, for consistency, we shall use the following equivalences in this chapter even when meanings do not always match perfectly: *psophos* = sound; *phônê* = voice; *symbolon* = symbol; *gramma* = letter; *onoma* = noun; *rhêma* = verb; *phtheggomai* = to utter; *hermênein* = to interpret; *hexis* = active state; *empeiria* = experience; *dialektos* = language; and, unless notified, *logos* = speech; *phasis* = clarification; *apophansis* = declaration; *kataphasis* = affirmation; *apophasis* = negation.

<sup>7</sup> *Politics*, I, 1, 1253a8-18; VII, 12, 1332b5-6; *Nicomachean Ethics*, IX, 9, 1169b20-21; *Eudemian Ethics*, II, 8, 1224b30. But see also *Nicomachean Ethics*, VIII, 12, 1162a15-25.

<sup>8</sup> *Metaphysics*, I, 1, 980a28-980b28. Emphasis ours.

<sup>9</sup> *History of Animals*, IX, 40, 627a24-27. See also *History of Animals*, VIII, 40, 625b10.

<sup>10</sup> *On the Soul*, II, 8. See also *On Sense and Sensible Objects*, 1, 437a10-11, *et passim*: “Hearing is of the differences between sounds only, for a few it is of the differences between voices.”

<sup>11</sup> Karl von Frisch, *The dance language and orientation of bees*, (Harvard: Harvard University Press, 1993).

<sup>12</sup> Emile Benveniste, *Problèmes de linguistique générale*, (Paris: Gallimard, 1962) pp.56-62; see also Gilles Deleuze, Félix Guattari, *Mille plateaux*, (Paris: Minuit, 1980), p. 97.

<sup>13</sup> *Categories*, 1, 1a1ff.

<sup>14</sup> *Sophistical Refutations*, 1, 165a11-14.

<sup>15</sup> *On the Soul*, II, 8, 419b9-11.

<sup>16</sup> *On the Soul*, II, 8, 419b22-24; *On Sense and Sensible Objects*, 2, 438b20.

- <sup>17</sup> *On the Soul*, II, 8, 419b16-18.
- <sup>18</sup> *On the Soul*, II, 8, 419b34-35.
- <sup>19</sup> *On the Movement of Animals*, I, 698a15ff.
- <sup>20</sup> See also the spurious *On Things Heard*, 800a1ff.
- <sup>21</sup> *On the Soul*, II, 12, 424a29-33; *On Sense and Sensible Objects*, VII, 448a9. See also our discussion, in Chapter IV, of *On the Soul*, I, 4, 407b27-408a28.
- <sup>22</sup> *On the Soul*, III, 2, 426b7; II, 12.
- <sup>23</sup> *On the Soul*, II, 8, 420a5-6.
- <sup>24</sup> *On the Soul*, II, 8, 420a9-12.
- <sup>25</sup> *On Sense and Sensible Objects*, I, 437a10.
- <sup>26</sup> *On the Soul*, III, 2, 426a8ff, III, 3, 427a19, *et passim*; *Posterior Analytics*, II, 19, 99b35-36.
- <sup>27</sup> *On the Soul*, II, 3, 414b4-7; also see II, 2, 413b24-25; III, 9, 432b29-30.
- <sup>28</sup> “Hearing is of the differences between sounds only, [it is] of the differences between voices for a few.” (*On Sense and Sensible Objects*, I, 437a10-11.)
- <sup>29</sup> *On the Soul*, II, 8, 420b6. Another passage that is informative with respect to Aristotle’s concept of *phônê* is *Poetics*, I, 1447a201447b2.
- <sup>30</sup> *On the Soul*, II, 8, 420b13-14.
- <sup>31</sup> *On the Soul*, I, 1, 420b14.
- <sup>32</sup> *On the Soul*, II, 8, 420b14-17.
- <sup>33</sup> *On the Soul*, II, 8, 420b27-29.
- <sup>34</sup> *On the Soul*, II, 8, 421a2-4. In the Pseudo-Aristotelian *Problems*, it is said that withholding breath sharpens hearing as well, “this is why in hunting they recommend one not to breathe”. (*Problems*, 11, 903b34-36, 904b11-14.)
- <sup>35</sup> An interesting question may be whether voice employs the mouth, the windpipe and the lung in a way that almost imitates the ear. In both cases, indeed, the body has air, and withholds it – does not let it simply yield to, or knock off, the surrounding air.
- <sup>36</sup> *Parts of Animals*, II, 17, 660a29-660b2; *On the Soul*, III, 13, 435b25.
- <sup>37</sup> *On the Soul*, II, 8, 420b31-421a1.
- <sup>38</sup> *Politics*, I, 1, 1253a11-14.
- <sup>39</sup> That reflexes and deliberate expressions and behaviors are not absolutely distinct is also Charles Darwin’s basic claim in *The Expression of the Emotions in Man and Animals* (New York: Oxford, 1998).
- <sup>40</sup> See the fourth chapter of Darwin’s *The Expression of the Emotions in Man and Animals* (New York: Oxford, 1998).
- <sup>41</sup> No wonder that it is with imagination, voice, communication and speech that falsity becomes a real issue. *On the Soul*, III, 3, 428b25-26.
- <sup>42</sup> *On the Soul*, II, 8, 420b33-34.
- <sup>43</sup> Aristotle himself seems to emphasize this difference in the following sentence: “Hearing is of the differences between sounds only, for a few it is of the differences between voices.” (*On Sense and Sensible Objects*, I, 437a10-11.)
- <sup>44</sup> Herbert Weir Smyth, *Greek Grammar*, (Harvard: Harvard University Press, 2002), §§ 1363a, 1365, p. 324.
- <sup>45</sup> *Parts of Animals*, II, 17, 660a29-30; *History of Animals*, II, 12, 504b1. See also *History of Animals*, IV, 9, 536a20ff.
- <sup>46</sup> *Parts of Animals*, II, 17, 660a35-660b2.
- <sup>47</sup> *History of Animals*, IX, 1, 608a17-21; IV, 9, 536b8ff.; for the case of bees, see *On Sense and Sensible Objects*, 5, 444b8ff.
- <sup>48</sup> *Politics*, I, 1, 1253a10-11: “Of animals, the human being alone has *logos*.”  
*Politics*, VII, 12, 1332b3-6: “Other animals [other than human] mostly live by nature, some in small degree by habits (*ethesin*), but human being [lives] also by *logos*, for human being alone has *logos*.”  
*Generation of Animals*, V, 7, 786b19-21: “[Human beings] alone among animals uses *logos*.”  
*Eudemian Ethics*, II, 8, 1224b30-31.

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*Nicomachean Ethics* indeed talks about the part of the human soul that has *logos*. (I, 13, 1102a27ff. *et passim*, especially IX, 8, 1169a1-3.) This analysis of the human soul is taken up in the *Eudemian Ethics*, II, 1, 1219b27ff. *et passim*.

<sup>49</sup> *Generation of Animals*, V, 7, 786b22; *Problems*, XI, 898b31.

<sup>50</sup> *Metaphysics*, I, 1, 980b26ff.

<sup>51</sup> *On the Soul*, II, 8, 420b27-29.

<sup>52</sup> *History of Animals*, IV, 9, 535a27-29.

<sup>53</sup> *Parts of Animals*, III, 1, 662a17-27.

<sup>54</sup> *Generation of Animals*, V, 8, 788b3-6; *Parts of Animals*, III, 1, 661b1-17.

<sup>55</sup> *History of Animals*, IV, 9, 535a27-b2.

<sup>56</sup> *Generation of Animals*, V, 7, 786b19-22.

<sup>57</sup> *Parts of Animals*, II, 16, 659b27-660a8; *On the Soul*, II, 8, 420b18-23; III, 13, 435b25-26; *On Respiration*, 11, 476a19-20.

<sup>58</sup> “Stoikheion” in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

<sup>59</sup> *Metaphysics*, VII, 17, 1041b11-19.

<sup>60</sup> *Metaphysics*, V, 3, 1014a27-32.

<sup>61</sup> *Metaphysics*, I, 9, 993a7; *On Things Heard*, 801b2ff.

<sup>62</sup> “Phthoggazomai” in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

<sup>63</sup> *History of Animals*, , 535a30.

<sup>64</sup> *History of Animals*, VII, 10, 587a27.

<sup>65</sup> *Metaphysics*, V, 12, 1019a15-16.

<sup>66</sup> *History of Animals*, IX, 28, 618a5; *Parts of Animals*, II, 17, 660a30.

<sup>67</sup> *Metaphysics*, V, 3, 1014a31-32.

<sup>68</sup> *Metaphysics*, III, 2, 998a24-26; I, 9, 993a4-10.

<sup>69</sup> This is the point where we disagree with Jean-Louis Barrière, *Langage, Vie politique et Mouvement des Animaux*, (Paris: VRIN, 2004) pp. 27-29.

<sup>70</sup> *Parts of Animals*, II, 16, 660a3-4.

<sup>71</sup> *Problems*, 10, 895a4-14. See also *Problems*, 11, 905a30-34. See also *History of Animals*, IV, 9, 535a27-b5; 536a32-536b4.

<sup>72</sup> *History of Animals*, IV, 9, 535a29-b1. Emphasis ours.

<sup>73</sup> *Poetics*, 20, 1456b25-26.

<sup>74</sup> *Poetics*, 20, 1456b28-29.

<sup>75</sup> *Parts of Animals*, II, 16, 660a4-7.

<sup>76</sup> *History of Animals*, IV, 9, 535a27-b5; 536a32-536b4.

<sup>77</sup> *On Interpretation*, 2, 16a19-21; *Poetics*, 20, 1457a10-12; *Problems*, 10, 895a4-14.

<sup>78</sup> *History of Animals*, IX, 1, 608a17-21.

<sup>79</sup> *On Interpretation*, 1, 16a5-6. See also *Problems*, 10, 895a4-14. In this sense, even birds have different languages. Let us quote a very interesting passage from the *History of Animals* on the “language” and “education” of birds: “Both voices and languages [*hai phônai kai hai dialektoi*] differ according to locality. Thus, voice clearly differs according to its high or low pitch, but its *eidos* does not differ within one kind; on the other hand, articulated (*en tois arthrois*) voice, which one might describe as a language (*dialekton*), differs in different animals, and also within one and the same kind of animal according to locality: thus, some partridges cackle, others make a shrill noise. Among small birds, some when singing utter a different voice from their parents if they have been reared away from their parents and have heard other birds sing.” (IV, 9, 536b8-17)

<sup>80</sup> The situation becomes even more complex if one takes the semivowels into account as Aristotle does in *Poetics*, 20, 1456b24-34.

<sup>81</sup> *Poetics*, 20, 1456b22-25. The status of semivowels is hard to establish because Aristotle thinks that S and R are both semivowels, and that G and R form a syllable. (*Poetics*, 20, 1456b34-38)

<sup>82</sup> *History of Animals*, IV, 9, 535a27-b1.

<sup>83</sup> *Generation of Animals*, II, 6, 744b11; *History of Animals*, VII, 3, 583b23. For “*adiarthôtos*”, see also *History of Animals*, VI, 30, 579a24.

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<sup>84</sup> In fact it is not impossible to save the parallelism between the formation of organs and *logos*, since the material of organs is not as “raw” as one might think: the uniform parts of the animal body are not mere elements. See for instance *Parts of Animals*, II, 2ff.

<sup>85</sup> In fact this is not a farfetched parallel since the integration of food is often expressed in Aristotle’s biology with the term *pepsis* which means “ripening by heat”, “concoction”, but also “baking” or “cooking”. This is why the parallel between formation of organs and the formation of *logos* could be reestablished by introducing the crucial idea that the tissues of organs are not raw elements, but elements “concocted” into *homeomeros* parts like blood.

<sup>86</sup> *Parts of Animals*, II, 17, 660a22, 32; *History of Animals*, IV, 9, 535a27-b1.

<sup>87</sup> *On the Movement of Animals*, I, 698a15ff.

<sup>88</sup> *Poetics*, 20, 1456b34-35.

<sup>89</sup> *On the Soul*, II, 8, 420b33-34.

<sup>90</sup> *On Interpretation*, 4, 16b26-28.

<sup>91</sup> *On Interpretation*, 5, 17a17-18. See also Ross, David, *Aristotle* (London: Methuen & Co.: 1949), p. 24n.

<sup>92</sup> *Meteorology*, I, 6, 342b33-35. Hence the “phases” of the moon have their root in this word and idea.

<sup>93</sup> *On Interpretation*, 5, 17a17-18.

<sup>94</sup> *On Interpretation*, 2, 20-21; 4, 16b33-17a2.

<sup>95</sup> *On Interpretation*, 4, 17a1. For a clear example of *synthêkê* as contract, see *Rhetoric*, I, 15, 1376b1ff.

<sup>96</sup> *On Interpretation*, 2, 16a26-29.

<sup>97</sup> “Syntheke” in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996). See *Prior Analytics*, I, 44, 50a19; *Rhetoric*, I, 15, 1376a33. See also *Politics*, III, 5, 1280b11, *Nicomachean Ethics*, V, 5, 1133a30, and V, 7, 1134b33, where *synthêkê* is used respectively for “law”, “money” and “rules of justice”.

<sup>98</sup> *Poetics*, 20, 1456b35, 1457a2, 11, 14, 23.

<sup>99</sup> Of course, this foreshadows the question of writing, which is much more susceptible of being taken out of context.

<sup>100</sup> *On Interpretation*, 2, 16a28.

<sup>101</sup> *On Interpretation*, 1, 16a3-4.

<sup>102</sup> *Parts of Animals*, II, 16, 660a7.

<sup>103</sup> *Generation of Animals*, I, 18, 722b12.

<sup>104</sup> *Meteorology*, II, 4, 360a26.

<sup>105</sup> *Politics*, IV, 7, 1294a35.

<sup>106</sup> “Symbolon” in H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

<sup>107</sup> See again *Metaphysics*, VII, 17, 1041b11-19.

<sup>108</sup> *Eudemian Ethics*, VII, 5, 1239b30-33.

<sup>109</sup> Indeed this idea is at the foundation of Heraclitus’ eleventh fragment (DK22B11) but also of Socrates’ interpretation of the oracle he expresses in his defense speech. (Plato, *Apology*,) 21a1ff.

<sup>110</sup> According to Porphyry, homonymy is even prior to synonymy because being is homonymous. (Porphyry, *On Aristotle’s Categories*, 61,10, tr. Steven K. Strange (Ithaca: Cornell University Press, 1992).

<sup>111</sup> *Sophistical Refutations*, 1, 165a11-14.

<sup>112</sup> Sophocles, *King Oedipus*, v. 132-146.

<sup>113</sup> It is practically impossible not to think of the opening of the *Metaphysics* here: “All human beings by nature stretch out toward having seen (*eidenai*). A sign of this is the love of sensations, for even apart from their use, they are loved in their own right...” (*Metaphysics*, I, 1, 980a22-24.)

<sup>114</sup> DK22B134: “[*Herakleitos*] *tên paideian heteron hellion einai tois pepaideumenois [elegen].*”

<sup>115</sup> *On Interpretation*, 2, 16a21-22. The example in *Poetics*, 20, 1457a12-14, is similar: *Theodôros* is not composed out of the nouns *theos* (“god”) and *dôron* (“gift”).

<sup>116</sup> *On Interpretation*, 2, 16a29-16b3.

<sup>117</sup> *Poetics*, 20, 1457a15.



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<sup>118</sup> Aristotle's examples are "oux hygiainēi" and "ou kamnei" which mean, respectively, "is healthy" and "is sick" – we modify the examples in order not to suggest that the number of words is at issue here. As can be seen from the Ancient Greek examples, what is at issue here is the negation.

<sup>119</sup> *On Interpretation*, 3, 16b17-18.

<sup>120</sup> *On Interpretation*, 3, 16b9-10.

<sup>121</sup> *Poetics*, 20, 1457a24-27.

<sup>122</sup> *On Sense and Sensible Objects*, 1, 437a13-15.

<sup>123</sup> *Poetics*, 20, 1457a27-28.

<sup>124</sup> *On Interpretation*, 3, 16b22-23.

<sup>125</sup> *Categories*, 5.

<sup>126</sup> Hence the present is susceptible of sensation, which all animals share in, whereas the past is of memory, and future is of anticipation, faculties that presuppose and are built upon sensation. See *Metaphysics*, I, 1, 980b20-26; *On Memory and Recollection*, 1, 449b9-23; *Posterior Analytics*, II, 19.

<sup>127</sup> *Metaphysics*, IX, 8.

<sup>128</sup> *On Interpretation*, 1, 16a3-8.

<sup>129</sup> *On Interpretation*, 4, 16b26-28. See also *Poetics*, 20, 1457a23-24.

<sup>130</sup> *On Interpretation*, 3, 16b19-25.

<sup>131</sup> *On Interpretation*, 3, 16b20-21.

<sup>132</sup> *On the Soul*, II, 8, 420b31-421a1.

<sup>133</sup> For Aristotle's extremely interesting, but often very difficult, interpretations of *êrêmia*, see his interpretation of *noêsis* and *sylogismos* as *êrêmia* in *On the Soul*, I, 3, 407a33-35, and his further analyses of *hexeis* and virtues and vices as *êrêmia*, see *Physics*, VII, 3, 246a10ff.

<sup>134</sup> *On Interpretation*, 9, 13; *Metaphysics*, IX, 3.

<sup>135</sup> *Metaphysics*, IX, 5, 1048a5-11; see also *Metaphysics*, IX, 2.

<sup>136</sup> *On the Soul*, III, 11, 434a6-16.

<sup>137</sup> *On the Soul*, III, 10, 433b5-8.

<sup>138</sup> *On the Soul*, III, 3, 427b13.

<sup>139</sup> *Metaphysics*, I, 1, 981b7-10.

<sup>140</sup> *On Interpretation*, 4, 16b26-28.

<sup>141</sup> *On Interpretation*, 6, 17a25-26.

<sup>142</sup> This is where we depart fundamentally from Heidegger's analysis of *logos* in Aristotle which puts exclusive emphasis on *apohansis*. See Martin Heidegger, *Interpretations Phénoménologique d'Aristote*, bilingual edition, tr. Jean-François Courtine, (Mauvezin: TEF, 1992) p. 39. See also Martin Heidegger, *Being and Time*, tr. Joan Stambaugh, (New York: SUNY, 1996), §7b, and §44, pp. 28-30, 196-211.

<sup>143</sup> *On Interpretation*, 4, 16b33-17a4.

<sup>144</sup> The very famous passage in Plato, *Republic*, VI, 499c, but also, V, 450d; VII, 540d. All these quotations *emphasize* the deliberately "impossible" character of the "republic". Plato also uses the same word to denote a child's wish in *Sophist*, 249d. For more on the relation of "prayer" to *logos* see Martha C. Nussbaum, *The Therapy of Desire* (New Jersey: Princeton, 1994), p. 50.

<sup>145</sup> *Politics*, IV, 1, 1288b23; IV, 9, 1295a29-30; II, 1, 1260b28-29; see also the verbal forms of *eukhê* in *Politics*, VII, 13, 1334b22; VII, 12, 1332a30; VII, 10, 1330a37.

<sup>146</sup> *Poetics*, 19, 145611.

<sup>147</sup> *Nicomachean Ethics*, III, 2, 1111b20-31. Although we agree with Sparshott on many points concerning the *Nicomachean Ethics* and Aristotle's method, he seems to miss or at least underestimate the significance of this phenomenon in Francis Sparshott, *Taking Life Seriously – A Study of the Argument of the Nicomachean Ethics*, (Toronto: Toronto University Press, 1994), pp. 25-27, 126-128.

<sup>148</sup> *Nicomachean Ethics*, VI, 2, 1139b10-11.

<sup>149</sup> See for instance *Eudemian Ethics*, I, 8, 1217b21.

<sup>150</sup> Herbert Weir Smyth, *Greek Grammar*, (Harvard: Harvard University Press), p. 107. Compare this fourfold distinction with Al-Farabi, *Commentary and Short Treatise on Aristotle's De Interpretatione*, tr. F. W. Zimmermann (Cambridge: Oxford University Press, 1981). For a comparison of Greek and Latin, which is informative insofar as Latin does not have an optative mood, see also Carl Darling Buck, *Comparative Grammar of Greek and Latin* (Illinois: Chicago University Press, 1933),

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pp. 299-301, and R. W. Moore, *Comparative Greek and Latin Syntax*, (London: G. Bell and Sons, 1934), pp. 98-101.

<sup>151</sup> Herbert Weir Smyth, *Greek Grammar*, (Harvard: Harvard University Press), p. 406.

<sup>152</sup> R. W. Moore, *Comparative Greek and Latin Syntax*, (London: G. Bell and Sons, 1934), p.

81.

<sup>153</sup> *Politics*, I, 1, 1253a12-14; *On the Soul*, II, 8; III, 13, 435b24-26.

<sup>154</sup> *On Interpretation*, 2, 16a29-30.

<sup>155</sup> *On Interpretation*, 3, 16b9-10.

<sup>156</sup> *On Interpretation*, 4, 16b26-28.

<sup>157</sup> *On Interpretation*, 6, 17a23-24. Thus, it is clear that the infinitive is not a verbal form.

<sup>158</sup> *On Interpretation*, 6, 17a25-26.

<sup>159</sup> *Sophistical Refutations*, 1, 165a6-14.

<sup>160</sup> *On the Soul*, III, 3, 427b13.

<sup>161</sup> See the famous second meditation in René Descartes, *Méditations Métaphysiques*, (Paris: Flammarion, 1979).

<sup>162</sup> *Meteorology*, I, 13, 350a14-18.

<sup>163</sup> *History of Animals*, VIII, 29, 618a18; 37, 620b23; 41, 628b8.

<sup>164</sup> Rémi Brague, *Introduction au monde grec*, (Paris: Transparence, 2005) pp. 72-74.

<sup>165</sup> Rémi Brague, *Introduction au monde grec*, (Paris: Transparence, 2005) p. 74.

<sup>166</sup> *Metaphysics*, I, 1, 980a27-980b28.

<sup>167</sup> *History of Animals*, IX, 40, 627b11. For other detailed and surprising details on bees see whole chapter 40, and also *Generation of Animals*, III, 10, and 11.

<sup>168</sup> *Generation of Animals*, III, 10, 761a5.

<sup>169</sup> *History of Animals*, IX, 40, 627a15-18.

<sup>170</sup> *History of Animals*, IX, 40, 627a24-27. See also *History of Animals*, VIII, 40, 625b10. In fact, it has been discovered that bees *do* have auditive faculties. See Karl von Frisch, *The dance language and orientation of bees*, (Harvard: Harvard University Press, 1993).

<sup>171</sup> It has been suggested that Karl von Frisch's famous discovery of the "dance of the bees" could have been anticipated in Aristotle's biology: "On each flight the bee does not go on to flowers from different forms, but goes, say, from violet to violet and does not touch any other until it has flown back into the hive. *And having arrived at the hive they shake themselves and three or four others attend each [hotan d' eis to smēnos aphikōntai aposeiontai, kai parakolouthousan hekastēi treis ē tettares].*" (*History of Animals*, VIII, 40, 624b3-7, emphasis ours) The ambiguity lies not only in the verb *aposeiethai*, used here intransitively, but also in the meaning of the last clause: what exactly are the three or four other bees attending to? If they are attending to the shaking of the bee, then it is plausible that Aristotle's observations anticipate Frisch's findings. The remainder of the passage is equally open to debate: "What is taken is not easy to see, nor the way in which they do their work has been seen. But the gathering of wax has been watched on olive trees, since owing to the leaves' thickness [the bees] remain in the same place for longer." (*History of Animals*, VIII, 40, 624b7-12.)

<sup>172</sup> *History of Animals*, IX, 40, 626b4.

<sup>173</sup> *Generation of Animals*, V, 1, 779a20.

<sup>174</sup> *History of Animals*, IV, 9, 536b14-18. See also *Parts of Animals*, II, 17, 660a35-660b2.

<sup>175</sup> But compare *History of Animals*, IX, 1, 608a17-21.

<sup>176</sup> *Generation of Animals*, V, 2, 781a26-30; *Rhetoric*, I, 11, 1371b8-9; III, 9, 1409b1ff.; III, 10, 1410b15ff; *Poetics*, 4, 1448b4-17.

<sup>177</sup> *Politics*, VII, 12, 1332a38-1332b11. After a lengthy and sometimes quite detailed survey of human education that will spill into Book VIII, the triad *physis*, *ethos* and *logos* is taken up again in the context of education in *Politics*, VII, 13, 1334b5. See also *Nicomachean Ethics*, X, 9, 1179b21ff.

<sup>178</sup> *Nicomachean Ethics*, I, 13, 1102b32. Emphasis ours.

<sup>179</sup> *Metaphysics*, I, 1, 980b26-981a13. Emphasis ours.

<sup>180</sup> *Metaphysics*, I, 1, 981a15, 22; 981b7.

<sup>181</sup> *On Sense and Sensible Objects*, 1, 437a10-15.

<sup>182</sup> *Metaphysics*, I, 1, 981b14-18.

<sup>183</sup> *Politics*, I, 1, 1253a8-18; VII, 12, 1332b5-6; *Nicomachean Ethics*, IX, 9, 1169b20-21; *Eudemian Ethics*, II, 8, 1224b30. But see also *Nicomachean Ethics*, VIII, 12, 1162a15-25.

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- <sup>184</sup> Platon, *Phaedo*, 57a.  
<sup>185</sup> *Sophistical Refutations*, 1, 165a6-10.  
<sup>186</sup> *Rhetoric to Alexander*, 1433a23; 1424b2; *The Athenian Constitution*, 69.1.  
<sup>187</sup> *Nicomachean Ethics*, X, 9, 1180a22-23.  
<sup>188</sup> *Sophistical Refutations*, 2, 165a38-165b1.  
<sup>189</sup> *Sophistical Refutations*, 2, 165b1-3.  
<sup>190</sup> *Sophistical Refutations*, 2, 165b3-4.  
<sup>191</sup> *Sophistical Refutations*, 2, 165b4-6.  
<sup>192</sup> *Sophistical Refutations*, 2, 165b6-9.  
<sup>193</sup> Sophocles, *Antigone*, v. 332-333.

## CONCLUSION.

In this concluding chapter of our dissertation, (A.) we state our thesis with a retrospective summary of its justification through the previous six chapters, and draw the implications of our interpretation of human *logos* according to Aristotle; (B.) we then propose two figures well-known to us and indeed to Aristotle in order to give our interpretation of human *logos* a concrete form; (C.) we end up with a discussion of the perspectives opened by our work.

## A. THESIS.

### 1. Back to “*logos* of being”.

With our last chapter we have come full circle in our dissertation. By arguing that the sense of *logos* in Aristotle’s *Politics*<sup>1</sup> is the human ability to understand and to propagate that which one has *not* experienced first-hand, we have come back to our very first discussion concerning the idea, expressed but not explicitly justified by Aristotle, that there is such a thing as “what it is *for beings* to be”, a “being as such”<sup>2</sup>, an inherent standard, a “*logos* of being”.<sup>3</sup> It is precisely because all along *we ourselves*, animals having *logos*, were able to understand and propagate that which we never experienced first hand that we have been able to even ask the question of the “*logos* of being” of elements, plants, animals, of human beings and of human communities. Thus at the term of our pursuit of answers to the question “What should a being be like if it is to have anything like a *logos* of being?”, we reached also an answer to the question: “What should *we* be like if we are to ask such a question, i.e. a question concerning the *logos* of being of something we are not?” Our discussion of the distinction between homonymy and synonymy in Chapter I, which first led to the concept of potency in *On Interpretation* (Chapter II), then to a first detour into Aristotle’s account of self-motivated motions and nature (Chapter III) and of animality (Chapter IV), and to a second detour into his concept of human being (Chapters V and VI), ended up also providing insight into the kind of being that could even come to enter such a discussion. Through our interpretation of “*logos* of being”

in the *Categories*, through our investigation of the *inherence* of the claim for a being to be, through our research for the standard for the way a being is from the perspective of the very being at hand beyond – but not exclusive of – the way it looks, sounds, moves around, how much it weighs, pleases or hurts, etc., we have come to also understand something about ourselves as questioners capable of access to that which we precisely are not, may not, will not, and do not have to be. The question of the *logos* of being presents itself only to a being having *logos*.

## 2. Thesis and summary of the dissertation.

In response to the guiding question of our dissertation, “Is there a philosophical connection between the various senses of *logos* in Aristotle’s corpus?”, we are now in a position to claim that the four major senses of *logos*, “standard”, “proportion”, “reason” and “discourse” are connected by means of a focal meaning: they are all different ways of holding different terms together without letting one yield to or overtake the other. In this focal sense, *logos* provides the inclusive counterpart of an exclusive formal version of the “principle of the excluded middle” or of the “principle of non-contradiction” such as  $A \vee \sim A$  or  $\sim(A \& \sim A)$ . Indeed, neither *logos* contradicts the “principle of non-contradiction” nor does Aristotle’s inclusion of the middle go against the “law of the excluded middle”, they rather both bring both laws or principles down to earth into the sublunar realm from out of the heavens or our abstractions.

As for the justification of our overall thesis, we can sum up our six chapters by a series of six questions and answers, emphasizing the central meaning of *logos* in each answer:

Q1: What does the very opening of the Aristotelian corpus mean by “*logos of being*”?

A1: “*Logos of being*” means a standard of being. *Logos* names the way in which beings, instead of being either now or then, either here or there, have extension: *beings are now not at the expense of having been, they are here not at the expense of being also there in different respects*. “*Logos of being*” is a standard of being that enables beings to have extension and duration and to change themselves not despite, but precisely according to, what it is for them to be.

Q2: Do all beings have a “*logos of being*” for Aristotle? If not, what should a being be like if it is to have such an inherent standard?

A2: It should be neither mere possibility nor thoroughly actualized: to have a “*logos of being*” is to change oneself, to already intend what it is for itself to be, *to have a potency not at the expense of actuality, but precisely according to that actuality*. This defines natural beings in the sublunar realm in their motion and rest, and in their life so that they can die. Among these some also act according to “potencies with *logos*”, potencies that hold together contrary actualizations without letting one prevail: *it is not at the expense of the potency of not-walking that Socrates*

*has the potency for walking, but because of it.* The inherence of the “*logos of being*” then shows itself first in natural motion and then in human action.

Q3: How do natural beings then exhibit the inherence of their “*logos of being*” by moving?

A3: By tending, by moving with desire, by stretching out and back toward a “form according to *logos*”. On the one hand, to be a natural being means for Aristotle to move or remain at rest for an inherent reason, i.e. desiring motion and rest: elements are not simply located at certain coordinates in space, *while being at their actual location they have their place they rest at, tend toward and back to*; on the other hand, living in the sublunar realm minimally means for Aristotle to nourish oneself: *organic beings not only hold on to their location and their place, but also, in nutrition, hold together contrary elements within the “logos of growth” in their own body without letting one take over or lay indifferent to the other; in reproduction they do the same in another body.* It is no longer a question of being either of this or of that element, but of being of both, and necessarily so.

Q4: Is this transformation of external beings into their own life form the only way natural beings exhibit the inherence of their “*logos of being*”?

A4: No. For Aristotle, being an animal minimally means touching and the touching animal neither transforms, nor is it transformed by the world, nor even does it remain unaffected; *it is rather affected by the world while also holding onto its own state.* Touching is paradigmatic for perception as an affection coming from without



that completes the body of the animal within, for the animal attention to the world. As to locomotion, the last motion that exhibits the inherence of “*logos of being*” in nature, Aristotle analyzes it as the result of something similar to a syllogism holding the afore-mentioned universal desire in nature together with diverse forms of receptivity to particulars giving rise to various forms of motions such as flight, pursuit, hunting and migration – all of which result from a *holding on to the universal premise of desire without dismissing the particulars* as the “absolute” or “universal” motion of elements does.

Q5: As to humans, finally, how does human action exhibit the inherence of their “*logos of being*”?

A5: The defining trait of action is choice, and choice is defined by holding one “option” above others, thereby implying a prior state of the human soul in which *it holds on to contrary “options”, or more precisely, contrary interpretations of the particular sensible*. Beyond the diverse forms of natural motion and habituation, the human soul brings together the two prerequisites of action: desire and a receptivity of a particular which is this time informed by a positive state (*hexis*) of deliberating over its possible interpretations so as to form that which Aristotle likens to a taking account (*ekhein logon*) of both one’s father and friends. It is in the sense of *hexis* that human beings are not animals that *are* or *do* something, but animals that *have* (*ekhei logos*).

Q6: How does *logos* as “discourse” finally tie in and relate to these senses of *logos*?

A6: By first articulating conventionally determined voiced units with unvoiced ones into conventionally and independently meaningful units, human *logos* then articulates this meaningful unit with dependently meaningful ones. This enables humans to form wishes and statements beyond complex forms of categorical or conditional imperatives. This highly determined “freedom” provided by the conventionality of speech not only reaches beyond present experience, but most importantly even beyond the possibility of experience as such: *human beings do not experience at the expense of that which they do not*. Thus this sense of *logos* not only refers back to the focal meaning of *logos*, but also provides the third and crucial term in the famous Aristotelian definition of human being, “animal having *logos*”, after our Chapter IV on “animality” and our Chapter V on “having”.

### 3. Implications of human *logos*.

*Logos* is thus the human openness to that which she has *not* experienced and may well never experience first hand. The inclusive counterpart of an exclusive principle of non-contradiction, the included middle, the Heraclitean “back-turning harmony”<sup>4</sup> of contraries, the very solution of the problem of their exclusiveness, *logos* is the human ability to receive, understand and transmit that which they have not experienced first hand and may never be able to account for. Hence humans view other humans as conveying something they have not experienced either. For humans,

the contrary of honesty among human is not simply treachery, but blind credulity; and in turn, the contrary of being lied to or manipulated by others is not simply being treated with honesty, but also incredulity and perpetual skepticism. As Aristotle quotes from Euripides: “If there is persuasive false designations among mortals, you should also admit the contrary, that disbelieving the true befalls mortals.”<sup>5</sup>

As one can see, the implications of our interpretation of human *logos* in Aristotle are inclusive of, but irreducible to a scientific or rational access to the “*logos* of being” of other species or to the univocity of words. Hence our dissertation is not a semantic, lexicological or even simply conceptual survey of *logos* in the Aristotelian corpus. The basic motivation behind this dissertation is not linguistic curiosity concerning the word *logos*, but rather, on the one hand, our puzzlement in front of the task of thinking *logos* in Aristotle’s famous definition of human beings in the *Politics*, I, without imposing an understanding of rationality that may or may not have been Aristotle’s, and on the other hand our puzzlement in front of the human condition with all its institutions, distortions, wars, sciences, arts, politics, etc. It was clear to us that “many are the wonders [*deina*], none are more wonderful than the human being”<sup>6</sup>, and it was clear to us that Aristotle defined these “wonderful” beings as “having *logos*”; now, we believe that we have proceeded from that which was clear to us toward that which is clear by nature: the “wonders” that humans are wonderfully but also terribly capable of require *logos* as Aristotle understands it, as the human access beyond first hand experience or beyond *autopsy*.

The wonders and terrors of the human world are in fact predicated on this sense of human *logos*: if human beings were not receptive to experiences they have

not made themselves, information could not be accumulated, articulated and propagated in the complex forms of diverse sciences *in order then to be repeated and made public*, thus each scientist would start over all experiences and experiments and be the *first* scientist<sup>7</sup>; but equally there could be no limitless propagation and accumulation of misinformation; further, beyond information and misinformation, without this sense of *logos*, there could be no discourse of the creation of the universe (the generation of beings precisely out of *nothingness*), no discourse of origins (*our* coming to be), of any community in its mythical or religious form, since there would be no ethnic or familial genealogy nor any claim to “nobility”, and each human being would have to be the first being on earth, the first human being, the first ancestor of his descendants, the founder of his city; there would indeed be no true fiction, no true experimentation, no true improvisation, no historiography, no prophesy, since by definition all these require the experience of that which has not been experienced; there would be no awareness of one’s lifespan as a whole, which is the true criterion of happiness for Aristotle, and thereby no sense of one’s own death other than something that did, does and will happen to others<sup>8</sup>; there would be no propaganda, no rumors, no deliberately impossible and yet deliberate desires, i.e. no utopia and no nostalgia, no true remorse or bad consciousness; there would be no *debatable* principles of living, since all principles would be immediately subjugated to the preservation of the individual or of the species; thus, there would be no genuine compromise, no promises held or betrayed, no true sacrifice because there would be no sense of “good” and “bad” beyond the “painful” and “pleasant”; there would be no possibility for pleasure and pain to assume an *accompanying* role; reversely, there

would be no eschatology deferring one's pains and pleasures to an afterlife, no otherworldliness. There would be no way to detach oneself, for better or for worse, from one's own perspective, no way to be with others beyond the spectrum of allies and enemies, of cooperators and opponents, of masters and servants; in short, there would be no intermediary room for *xenoi* to remain *xenoi* – a welcomed guest or a potential rival.

To appeal to an idea that is argumentatively less rigorous than perhaps experiential, doesn't it make sense to say that one learns another's language, reads another's book, listens to another's ideas, enters another's land and is initiated in another's way of living, precisely because one has already had the feeling that it is *there*, in *their* syntax or *their* words, in *their* customs and rituals, that wisdom lies? Don't the monuments of unknown cities, the sinuosities of their streets, the invisible traces of the sedimentation of their laws and customs, the fleeting intonations of their sentences and the lack of overlapping in the categories of their thought, don't these appear as promises rather than obstacles or indifferent alternatives? Doesn't the world then seem like our only and ultimate school? These experiential suggestions are not altogether unfamiliar to Aristotle: "Humans are the same in relation to *xenoi* and to their own citizens as they are in relation to style: thus [in poetry] one should make one's language foreign, for things that are remote are wonderful [*thaumastai*], and wonderful things are pleasant."<sup>9</sup>

Thus, finally, if humans did not have *logos*, humans would not only be less wonderful (*deinos*), but they would also lack *thaumadzein*, they could not love that which they know they cannot have. There would be no philosophy in the Socratic

sense. Philosophy is in another's language. Philosophy is synonymous with xenophilia.

## B. THE HUMAN CONDITION.

For better or for worse, these are the implications of *logos* in the specifically human condition. And it is part of this latter that humans may lack *logos* or become immersed in it. “Since those who imitate imitate acting people which are necessarily either serious [*spoudaious*] or lowly [*phaulous*]... they imitate them either as better [*beltionas*] than us<sup>10</sup> or as worse or as similar to us, just like painters.”<sup>11</sup> In order to give a concrete form to our interpretation of the human situation, let us briefly take up one character that is “worse than us”, and one that is “better”, one that lack *logos* and one that is immersed in it – both of which, being relative to us, cannot be altogether different from us.

### 1. The Cycloptic.

The passage above from the *Poetics* immediately spells out examples of those characters that are “worse than us”. One of them should be privileged since it is a figure that appears in important passages of the Aristotelian corpus apart from the *Poetics*<sup>12</sup>, most notably in the *Politics*<sup>13</sup>, but also already in the *Nicomachean Ethics*<sup>14</sup> and in the *Rhetoric*<sup>15</sup>. This mythical figure shall provide us insight to the implications of being “worse than us”.

Being “worse [*kheirous*]... than the people today”, the Cyclopes appear in the *Poetics* as figures well-suited to comedy.<sup>16</sup> In the debate between conservatism and reform in the *Politics*, II, they appear as “earth-born” and *not* to be followed since

“they were just like ordinary and foolish people”.<sup>17</sup> The Cyclopes are representatives of ancient customs that should be reformed with caution, even if they are written down. Most importantly, the discussion concerning the priority of law as *logos* over paternal rule in the *Nicomachean Ethics* suggests that what is at stake is less a group, much less a certain group, than a way of life qualified as “cycloptic” (*kyklôpikôs*):

“Paternal authority does not have the force of necessity, neither does an individual in general, unless he is a king or the like; whereas law has compulsory power, being a *logos* originating from some prudence and thought. Now among humans, those who oppose people’s impulses are hated, even when they do so rightly, but the law is not hated when it orders what is decent. But in the city of the Lacedemonians alone, or among few others, does the lawgiver seem to have taken care for upbringing and exercises, while in most cities they have been most careless about such things, and each person lives the way he wants, laying down the law ‘for his children and wife’ in the manner of a Cyclops [*kykôptikôs*].”<sup>18</sup>

In what way then is the Cycloptic life “worse than ours”, in the words of Aristotle who is almost never a judgmental moralist? Just as the rest of the passage from the *Nicomachean Ethics* notes that it is only when there is no common concern that upbringing and nurture is left to paternal rule as in Cycloptic life, it follows that what makes the Cycloptic way of ruling and living “worse” is simply that it is at least *second best*, compared to what *is* best according to Aristotle: that upbringing be a



common concern.<sup>19</sup> In the terms of the *Nicomachean Ethics*, human life is impoverished by no longer “taking account of *both* one’s father *and* one’s friends”.<sup>20</sup> In the terms of our previous chapter, human life is thwarted by being limited to *autopsy*, first-hand experience.

This ties in well with the view of Pierre Aubenque who emphasizes the role of *bouleusis* and necessarily of compromise as much as consensus in ethical and political affairs such that in fact this middle ground, just like Aristotle’s understanding of the middle term in logic and that of the mean in ethics, has nothing to do with mediocrity. The search for such a middle ground is not a way of “playing it safe”, but in fact the search for “excellence between two extremes”:

“In the political order, this excellence is friendship which is the basis of a genuine city in opposition to associations motivated by private interests. The human being accomplishes herself in community, in the coexistence and the conviviality (*synousia*) whose intellectual condition of possibility is common deliberation. It is in this sense that the ‘government of the middle’, which we call ‘constitutional government’ [*politie*” in the French text] or ‘democracy’, is the most ‘excellent’ of constitutions.”<sup>21</sup>

Genuine compromise is impossible without *logos*, without an immersive access into another’s perspective, without at least an opening toward that which one does *not* take pleasure in, without sacrifice, i.e. without a *proairesis*, a preference, an interpretation as good, of that which one does not and may never benefit from.

Genuine compromise is impossible without an eye for the mindset of another. Other than their paternal rule and lack of care for upbringing, what does the Cycloptic life look like?

## 2. Law.

Even if the *Politics* will remark that the Cyclopes live a sporadic life<sup>22</sup>, what they lack is not a common location<sup>23</sup>, common goals and *therefore* common strategies.<sup>24</sup> A community is not simply made out of allies, and a city is not made out of neighbors.<sup>25</sup> The Cyclopes do not lack the mental capacity for deliberating, but rather a sense of the human condition and situatedness which makes it *necessary* to deliberate:

“For to lay down a law about things people deliberate is impossible. Therefore they do not deny at least *this*: that the human must judge about these, although not one human being, but many. For each ruler judges beautifully when he has been educated by the law, and it would seem out of place if one person saw better when judging with two eyes and two organs of hearing, and acting with two feet and hands, than many people with many, since even today the monarchs make many eyes and ears and hands and feet their own, for they adopt persons that are friendly to their rule and to themselves as their fellow-rulers.”<sup>26</sup>

From this it should be clear that the lack of the Cyclops is in no way bodily; Cycloptic life is “worse” not because they are literally monocular, but because they are, if we may, “autoptic”. Homeric, Platonic and Aristotelian texts all suggest that the Cyclops is depicted as having one eye because of a more fundamental, political and interpersonal shortcoming, *and not the other way around*. Hence the number of “eyes” or “hands” always remains often misleadingly metaphorical. To vary examples around this insight as we shall see Aristotle doing, what makes a conversation is not two speakers, what makes a good one is not even *more* speakers, a friendly gathering is not enriched by more and more food or more and more hosts and guests, but by their variety, i.e. their difference; the reason why a crowded jury may be better than a restricted one is not their number, but the diversity that does not necessarily follow from it:

“It is possible that the many, although not each one is serious [*spoudaios*], yet when they come together may be better [*beltious*] than those who are so, just as public dinners to which many contribute are better than those supplied at one’s cost; for where there are many, each one may have some portion of virtue and prudence, and when they have come together, just as the multitude becomes one human being with many feet and hands and senses, so also it becomes one with regard to moral and intellectual faculties. This is why the many judge musical and poetic works, for each can judge a different part and all of them all of the work.”<sup>27</sup>

The land of the Cyclopes then does not lack houses, caves or streets, it lacks an *agora*; the Cycloptic body and soul do not lack organs, hence the Homeric Polyphemus will call the other Cyclopes for help; what they lack is the variety of the portions of “virtue and prudence” that they embody.

The Cycloptic life lacks *logos*; they are not *alogos* as such, but *alogos* precisely in the way a human may be; they lack *logos* in a way that is *not* simply foreign to humans, or at least to their “past”. Now we are in a position to read the famous quotation from the Homeric story of the Cyclops within the discussion of family and household in the *Politics*, I: “Formerly the cities were under kingly rule as some peoples still are, because they came [to form a city] out of kingly rule, for every household is under the kingly rule of its oldest member so that the colonies were so too, given the kinship of their members. And this is what Homer says: ‘and each gives law to his children and spouses.’ for they were scattered, and that is how people used to live.”<sup>28</sup> In order to shed light by way of contrast on human *logos*, this passage invites us to reflect on a figure that was extremely familiar to Aristotle and his predecessors and contemporaries: Polyphemus.

### 3. Language.

Polyphemus is not dispossessed, and the life on the island of the Cyclopes is by no means as impoverished as one may judge from the considerations above: indeed they are “arrogant and lawless”<sup>29</sup>, and yet this is not because they are raised badly, naturally evil or wicked, but rather because they are blessed, being born from

the earth itself<sup>30</sup>: their island is so fertile that there is no *need* for agriculture, deliberation and legislation. As Aristotle quotes, “each gives law to his children and spouses” in one’s own cave. (107-115) The Cyclopes may remind one of Aristotle’s characterization of the kind of human being that is by nature deprived of the *polis*; the latter are, according to another Homeric quotation in Aristotle, “‘clanless, lawless, hearthless’, and also a lover of war inasmuch as he resembles an isolated piece at draughts.”<sup>31</sup> To vary Aristotle’s striking metaphor, the Cycloptic routine is that of a king on an empty chessboard.

As can be seen, the emphasis on the lack of concern and work on the island is made unmistakable in the Homeric text by the wealth of privative adjectives, and so is the deliberate contrast to the human condition: they have no plough, no sowing, no hunting, *hence* no carpenters and no ships... (125) No wonder that Odysseus, assuming the point of view of an entrepreneur or of a colonizer, imagines how beautiful a city they would be able to build if they had some ships, and how easy an agriculture they would have because of the fertility of the soil. (126-141) Polyphemus may well have one eye by birth, but his character is no less formed by his environment; Odysseus himself suggests the very moment he comes across Polyphemus (190-191) that the latter does not have an evil *nature* at all, but rather that he has an already self-sufficient environment. Of course, all this inference is made in contrast to the human condition which has less to do with birth<sup>32</sup>, say the number of eyes one has, than with their interaction with their environment which, being sublunar, is not always as blissful as the island of the Cyclopes.

Not having any notion of law beyond his sporadic life, being the lonesome powerful king on the empty chessboard, Polyphemus is necessarily unfamiliar with any kind of “law of hospitality”. (259-271) Being more autoptic than monocular, he considers another viewpoint as contrary, contradictory or confrontational. *Being* the son of the sea-god Poseidon, Polyphemus in fact *has* no gods properly speaking (275-280), therefore no law reaching out of the cave, no openness (because no need for openness) to a perspective beyond his pleasure and pain. In fact, as long as one thinks of law in terms of local arrangements and interpersonal strategic contracts, a *law* of hospitality remains paradoxical and Polyphemus’ assumptions and actions are understandable from this standpoint.

Of course, Odysseus is depicted as a diametrically opposite character to Polyphemus on every point: Odysseus the voyager, the perennial *xenos*, takes the best wine he has, and once arrived at Polyphemus’ cave he refuses his fellow men’s proposal to run away with the goods they found in there – but not because he believes in the natural goodness of humans and Cyclopes, but rather because he expects generosity in return. (228-230) Odysseus is not a pawn at all, but a queen surrounded by bishops, knights and rooks.

Despite this evidence of lawlessness, Polyphemus proves himself not to be altogether deprived of linguistic skills: he attempts to make Odysseus tell him where his ship was.<sup>33</sup> No wonder Odysseus the *polytropos*<sup>34</sup>, i.e. the one with many resources, but also and more fundamentally the one who has gone through much hardship, immediately deciphers Polyphemus’ intention and tells him that their ship dashed into pieces. (279-285) In a dramatic reversal, the very weakness of

Polyphemus' attempt here to manipulate is what precisely inspires Odysseus to in turn manipulate this time successfully. It is at this moment that, calming his immediate anger (299-305) without altogether suppressing it (504)<sup>35</sup>, Odysseus pays heed to *logos* and appeals to his openness to a life altogether foreign to him by taking a look at the world from Polyphemus' round eye.

Besides his resources of *tekhnê* and indeed the cooperation of his fellow men in the fabrication of the spear (319-335), Odysseus makes and works out his plan by means of language: the night before he blinds him, Odysseus *speaks* to Polyphemus while offering the good wine they brought with them as if he was asking for mercy (347-352); and when in drunkenness Polyphemus *asks* his name (355-359)<sup>36</sup>, he famously *tells* him that his name is "Nobody" and thereby begins the process by which he shall slyly orient the shepherd Polyphemus to his ruin. (366) It is well known what happens afterwards, but much less is emphasized the relation between the Cyclopes' lawlessness and their necessarily limited linguistic keenness. For, when, in the hope of organizing them, Polyphemus tells the other Cyclopes that "Nobody is killing me" (408), although the disconnection is clear, in fact *both* Polyphemus *and* the other Cyclopes are responsible for it: Polyphemus takes "Nobody" for a proper name, while the other Cyclopes are unable to notice Polyphemus' shortcoming, immersed as they are in the literal and correct sense of this name, and fail to become "many eyes and ears and hands", regardless of how many and how well-armed they may be. (410-412)

Polyphemus then fails to attune himself not only to Odysseus' plans, but also to the mindset of the other Cyclopes; otherwise he would explain them that

“Nobody” is *homonymos* in Aristotelian terms, and does not only mean “nobody”, but in this context is the name of the evil Greek guest; but nor do the Cyclopes put themselves in Polyphemus’ shoes and notice that *clearly* “Nobody is killing me” is an odd answer to their question in that context. Both sides take the word “Nobody” univocally, as *synonymos*, but, unfortunately, in different senses, precisely as Odysseus planned by using this homonymous name. Cyclopes act as if words simply match beings, as if there is only one word for one being or one kind of being.<sup>37</sup>

This is the story Aristotle has in mind when he calls the life of the Cyclopes as second best, i.e. as falling short of the potential of human law and language. We saw at the beginning of this dissertation how Aristotle characterizes this univocal, non-arbitrary and essential relationship between nouns and beings: Cycloptic language is immersed in synonymy.<sup>38</sup>

#### 4. Love.

Only if Odysseus had never arrived in the island! In the Homeric text, the life of Polyphemus seems to have been perfect until the cunning and colonizing Odysseus arrived. In the end, the latter laughs at the shortcomings of Polyphemus, so is probably the reader intended to do. In fact, it is this passage that Aristotle quotes in the *Rhetoric* as testimony that the degree of one’s anger is proportionate to one’s willingness to let one’s enemy *know* who retaliated.<sup>39</sup> On the other hand, somewhat hubristically announcing who he really is, Odysseus exposes himself to the wrath of Poseidon, Polyphemus’ father. Despite what may be suggested by an episodic



reading, the end of Odysseus' encounter with the Cyclops is thus not simply a victory of the former over the latter.

But the ambiguous comedy of Polyphemus in the Homeric text extends beyond a consequence of the Cyclopes' limited legal and linguistic – mostly “rational” – capacities, and Polyphemus' previous life was *not* as idyllic before the arrival of Odysseus as a reader of Homer might think. Because, according to the later tradition indeed, there is an unsaid in the Homeric text. This unsaid is revealed when Polyphemus himself becomes the poet instead of Homer, and himself tells his story instead of Odysseus. The real comedy, if it is one, is played not on the theme of limited Cycloptic law or language, but on the theme of Cycloptic love. The real comedy, if it is one, is played as a prequel to the Homeric episode revealing that Polyphemus was not living an exactly heavenly life before the fatal visit of Odysseus, and puts the Cyclops in a new and even more problematically human contrast with the Greek hero famously awaited by Penelope and Telemachus.

This unsaid is spoken out in the eleventh idyll by Theocritus, a Sicilian poet from the 3<sup>rd</sup> century BCE.<sup>40</sup> The text is extremely informative with respect to what it means to lack or to have *logos*, not only in the context of social organization, but also in the context of the individual emotional life, of a life unable to access resources and assume mindsets beyond its own first-hand experiences. It shows how the world is not split into mythical grotesque beings lacking *logos* and cunning humans having it. It shows why, however “worse” Cyclopes may be, their situation must at least be *plausible* for the spectators for the play to be a comedy.<sup>41</sup> It blurs such a distinction in line with Aristotle who circumscribes an *alogia* that is as characteristically human as

*logos*, and places it at the very center of the human soul.<sup>42</sup> It relates a story of Polyphemus that directly teaches us something about the human condition.

According to the idyll Polyphemus was heart-broken. In his youth he fell in love with a sea nymph named Galatea so deeply that he became incapable of even herding his heavenly flocks, which, being heavenly, went to pasture and came back on their own. But, says the text, Polyphemus found out the cure for his heartache: “sitting on a high rock, staring at the sea, he would sing.” (17-18) Except the moralizing last two verses, the following verses of the idyll are devoted to Polyphemus’ love-song in which the reader sees how he interprets his broken-hearted situation: on the one hand he declares himself to be ready to leave everything behind for his love; on the other hand, he tells her to “burn away my life with *fire*<sup>43</sup> – my heart would bear that – and my single eye, most dear to me”.<sup>44</sup> (52-53, 63-64) As to his plan of “action”, it is thus: if “[his] mother had given [him] gills when [he] was born”, then he would have joined Galatea (54); “if a *xenos* would arrive in his ship, [he] would learn [*mathoimi*] now, right now, how to swim” (60-62); if his mother had spoken a gentle word to Galatea about him, she would have joined him in his shepherd life in the cave. (67-71)

On the one hand, then, Polyphemus interprets the situation in a clearly self-centered way, foreshadowing his later inability to communicate with the other Cyclopes: he makes propositions, offerings and promises to Galatea that are irrelevant to a sea-nymph who is understandably not ready to leave everything behind for him. He is so unable to see the world from another’s standpoint that, reflecting his necessarily limited linguistic virtuosity, the so-called “metaphors” he employs to

praise Galatea are equally ridiculous, confined as he is to univocality, literality or synonymy: the whiteness of cream cheese, the softness of a lamb, the playfulness of a calf, etc. (20-24) *And yet*, on the other hand, despite his selfish but passionate desire, his so-called plan of “action” involves contrafactual conditional sentences or conditions depending on Galatea, on his mother, on a possible *xenos*, in short, on everybody *but him*. His plan of “action”, his cure, is to sit on a rock, to sing love-songs to ease his heart, and to call out for her.

However grotesque it may appear at first, Polyphemus’ situation is by no means one unfamiliar to human beings. Hence we entered this detour beyond the Aristotelian and Homeric texts simply to make the point that Polyphemus in fact partakes in a special modality of *logos* we encountered in our previous chapter: “wish”, the disjunction between his self-centered interpretation of the situation and his complete inability to change it. And however comedic, it is in fact this aspect of Polyphemus that is humane, and Theocritus clearly sympathizes with him. This is because, while easily imagining ways in which Polyphemus could have indeed joined Galatea, the reader also may sense that there may well have not been any such possibility and that Polyphemus’ so-called “cure” or plan of “action” may well have been the *only* resource accessible to humans: Galatea could have simply refused Polyphemus, she could have been prevented to see Polyphemus by her family, or else she could have been dead.<sup>45</sup> And this is as specifically human as Odysseus’ inventiveness in order to return to Penelope.

What this supposedly comedic Polyphemus teaches us about *logos* is the following: since human *logos* is an openness to that which one has not experienced

first hand, human beings remain stuck in their own perspective and experience in a specific, i.e. humane, way. It is precisely because they *can* overcome their own perspective that human inability to do so takes a specific form, the form of Job's long repressed protest against God, the form of wish with all its traumatic variants: remorse, resentment, nostalgia, utopia, obsession, etc. To take up the Sophoclean terminology of wonder (*deinos*), human *alogia* is as wonderful as *logos*.

## 5. The Oedipal.

So much then for the character who is "worse than us" according to Aristotle's *Poetics*, but who, as we can see, sheds light on the human condition both negatively in the Homeric text and also more straightforwardly in the idyll of Theocritus. But who is the character that is "better than us" again according to the *Poetics* such that it may well shed light on the human condition from a reverse angle?

Aristotle suggests that characters that are "better than us" are found (and are to be found) in tragedy, in contrast to comedy.<sup>46</sup> More specifically, as the Cyclopes are paradigmatic figures of people "worse than us", the Aristotelian paradigm of tragedy is *King Oedipus*<sup>47</sup>, and, most specifically, the paradigmatic tragic hero is Oedipus whose action he precisely qualifies as *deinon*.<sup>48</sup> This symmetrical form of human blindness is altogether more tragic than Polyphemus' in that it results not from human confrontation with impossibility, but from human possibilities, deliberate decisions, words and actions. As Cycloptic blindness indirectly sheds light on human

access beyond *autopsy*, Oedipal blindness may have something to teach us concerning a life detached from *autopsy*.

There are myriads of ways in which Oedipus can be contrasted to Polyphemus: instead of *having* no god because of his being the son of one, Oedipus is the son of a human and a zealous follower of god's oracles; instead of having limited linguistic skills, Oedipus is the very one who cunningly solves the riddle of the Sphinx and becomes at once the savior of a city, the father of a family, and a bold king, unlike the solitary heart-broken shepherd Polyphemus; thus, with all his messengers, soldiers, oracles, family members and advisors at the opening of the tragedy, Oedipus appear as a panoptic character: all eyes, hands and feet at the throne of his city facing a new riddle in the form of a wicked epidemic – something probably not often seen in the blessed island of the Cyclopes. This multiplication of the “organs” of the King of Thebes is a perfect example of human *logos*: the messages carried by messengers, the oracles related by soothsayers and then transmitted by others, the numerous stories handed on from generation to generation, the various curses and promises – all these instantiate characteristically human *logos* as the ability to understand and relate that which they have not experienced first hand. Unlike Polyphemus who either becomes a “lover of war” or fails to identify himself with the desires of his loved one, Oedipus the *xenos* is welcomed by the Thebans and saves them, marries their widowed queen and becomes king; and in contrast the desperateness and rage of Polyphemus, Oedipus' majesty and righteousness makes him similar to the “guardian of the city” that Aristotle implicitly contrasts to Socrates'

suggestions in Plato's *Republic* precisely after one of most chauvinistic passages<sup>49</sup> of the Aristotelian corpus:

“Spiritedness [*thymos*] is something dominant and indomitable; but it is not beautiful to say that [the guardians] are cruel to strangers; for one must not be this way to anybody, and men of great-souled nature are not fierce except toward wrongdoers, and even more so against their companions if they think these are wronging them, as said before.”<sup>50</sup>

Compared to the Cyclopes' xenophobic island, then, Thebes is a xenophile city, a relatively cosmopolitan and liberal environment. Whereas the Cyclopes, called out for help by Polyphemus, fail to understand that “nobody” does not have a univocal sense in that context, i.e. that “nobody” and “Nobody” (Odysseus) are homonyms, Oedipus and other characters in the tragedy do the exact opposite: they all fail to notice that “the killer of Laius”, “the one who slept with his mother”, “Laius and Jocasta's son” and “Oedipus” are all synonyms. Whereas the Cyclopes were limited to the literal senses of words (“Nobody”), the Thebans are so immersed in the multivocality of *logos* that they fail to take things literally without making assumptions: the oracles are always overinterpreted, i.e. they are understood not literally, but are distorted by the assumptions of their hearers.

But, first of all, Jocasta, who does not recognize the face of her very son<sup>51</sup>, does not seem to reflect on the literal meaning of Oedipus name (“swollen foot”), in which case she could have remembered what she did to her son years ago and thereby

recognize him. For her, “Oedipus” is the conventional tag for the stranger from Corinth, a conventional appellation, a token or a tally of the *xenos*. And indeed, as we noted in our previous chapter, it is not only true that *xenoi can* exchange tallies, but more precisely that those who exchange tallies and identify one another by their means in fact *must* be *xenoi*. Oedipus *misidentifies* himself and his parents only because he is cast *out* of Thebes and returns there afterwards; his mother fails to recognize him only because she is led astray by his conventional identity as the “son of the king of Corinth” or as the “witty stranger that saved Thebes from the Sphinx”. Village life as such is closed to such conventional *misidentification*, because it is closed to conventional identification. The tragedy is made possible because, as citizens of a city, everybody in the play is thinking merely in terms of conventional symbolism.

The symbolic character of nouns entails a structurally determined confusion: precisely because nouns necessarily open up a distance between the sounds uttered and the meaning, the same things are said in many ways not only in different languages, but even within one language, and because the same nouns can mean fundamentally different things. In a word, the first level of articulation of *logos* opens the possibility of ambiguity, equivocation, homonymy. It is because there is homonymy that even nouns are subject to interpretation. It is important to understand that this inherent “flaw” of nouns follows precisely from their convenience; homonymy is a necessary consequence of the enormous economy of language: “Nouns and the quantity of *logoi* are finite, whereas things are infinite in number. Thus it is necessary that the same *logos* and noun signify a number of things.”<sup>52</sup> This

enables Sophocles to beautifully show Oedipus tragically determined to *either* kill whoever “himself” killed Laius *or* die “himself” – supposing these synonymous designations to be *homonymous*.<sup>53</sup>

To sum up our comparison between the character who is “worse than us” and the one who is “better”, then, the Cyclops lives a selfish closed rural life of synonymy where things that share names also share their “*logos* of being” naturally as animal voices are signs of pleasure and pain, whereas Oedipus lives an political life of homonymy, a life open and devoted to others. In short, as the Cyclops was blind to others and was blinded by another’s cunning or beauty, Oedipus is blind to himself and ends up being blinded by himself.<sup>54</sup>

When Aristotle insists that there be nothing in the plot of the tragedy itself that is *alogos*, but only in past events, his example is *King Oedipus*.<sup>55</sup> It is his shady natural roots that blur Oedipus’ plans for starting over and freely redefining himself. After Jocasta recognizes who Oedipus is and condemns herself to silence, Oedipus, seeing her terror, bravely cries:

“Let whatever disaster come! However lowly it may be, I want to see my origin. In her womanly arrogance, she is ashamed of my ignoble roots. But I consider myself to be the child of Fortune the generous, and I am not ashamed of it. It is Fortune who was my mother, and the years of my life that made me lowly and great. This is my origin, nothing can change it: why would I refuse to learn who I was born from?” (1076-1085)



Oedipus' true hubris, his true misunderstanding of human limitation, exhibit itself in this claim to be a purely rational agent, self-transparent individual, freely defining himself, the child of no real parents, but of "Fortune". This is what makes him "bigger than nature", "better than us", detached from the *alogia* of his past; this is what makes his downfall not simply realistic, but paradigmatic. This detachment from his natural roots could make Oedipus simply neglect the question of his origins, and yet, on the contrary, it pushes him forward in the gradual unfolding of his self-recognition.<sup>56</sup>

We have thus come to the end of our elaboration of Polyphemus and Oedipus as two figures that shed light on the human condition as having *logos*, i.e. as having access to that which one does not and may never experience first hand. Often used by Aristotle as paradigms, they both instantiate specifically human forms of *alogia*: one immersed in his cave under the earth which gave birth to the Cyclopes<sup>57</sup>, in his self-centered life, in his familial circle, in his natural environment and in his language that is foreign to homonymy that is typical to *logos* and always requires interpretation; the other in his cosmopolitan and public life as a self-determining rational individual agent detached from his natural origins, so wrapped up in his free interpretations and assumptions that he is blind to his familial origins, to his irrational attachments, and to his childhood.

### C. NOUS.

The Cycloptic and the Oedipal are then two forms of human *alogia*: deficiency in *logos* and exclusive immersion in *logos*. Cycloptic *alogia* and Oedipal *alogia*.

But in concluding our dissertation as a whole, let us remark that for Aristotle not all *alogia* is human. *Metaphysics*, XII, the last book of the *Physics* and of *On the Soul* present a sense of *alogos* that is not a *privation* of *logos*, but altogether foreign to *logos* to begin with. In contrast to Cycloptic or Oedipal *alogia*, this one is *positive* and thereby testifies that, despite its extremely varied functions, *logos* is not a key opening all doors and the overall logic of all being. For Aristotle there *is* a form of carelessness that is not rashness, a lack of prudence that is not vice or foolishness; for Aristotle there *is* a way of being that does not hold onto different terms without neither collapsing one to the other nor letting them lay indifferently; for Aristotle there *is* a relation that has no extremes and thus no middle to include. It is different from science, but it is not ignorance. Beyond compositeness and manifoldness, the world, even the sublunar realm, have oases of positive simplicity, of pure acts.

This is *nous*.<sup>58</sup> And *nous* is to be contrasted to *logos* on all levels. Unlike composite beings that have a “*logos* of being”, *nous* is everlasting transparency and purity: “There is a sense in which *nous* makes all things; this is a positive state like light: for in a way light makes colors in potency into colors at work. This *nous* is separable, impassive, unmixed, since it is at work in its being.”<sup>59</sup> Unlike beings that are *both* potentially *and* at work so that what it is for them to be is at issue, the rest of

the passage above claims that *nous* leaves no room for change, for decisions and choices, for deliberation, for consensus or compromise, for intermittence, for not being at work, and for somehow not being what it is for *nous* to be: “*Nous* does not think intermittently. Separated, it is only what it truly is, and this alone is immortal and eternal... and nothing thinks without this.”<sup>60</sup> Unlike sensation that is an instantiation of *logos*, holding on to the form of sensibles without yielding to them or affecting them, “*nous* is the form of forms.”<sup>61</sup> Unlike locomotion which takes the form of a practical syllogism, *nous* is not moved, but rather moves without itself being moved.<sup>62</sup> Unlike *logos* as predication, affirmation or negation, “*nous* is not something in relation to something else [*ti kata tinos*]”.<sup>63</sup> Unlike prudence, “*nous* apprehends the terms of which there is no *logos*.”<sup>64</sup> *Nous* is thus associated not with the human, but with the divine in the human.<sup>65</sup>

Let us end our dissertation where the *Posterior Analytics* end, where *nous* appears beyond *logos*:

“Since among the intellectual positive states by which we are in truth some are always true (knowledge and *nous*), and some admit falsity like opinion and calculation, and since no other kind of knowledge is more accurate than *nous*, and since the sources are more knowable than demonstrations and all knowledge is with *logos*, thus there would be no knowledge of the sources; and since no knowledge admits of being more true than *nous*, then *nous* would apprehend the sources; from this one sees also that the source of demonstration is not demonstration, just as the source of knowledge is not

knowledge. So if we have no kind of truth other than knowledge, then the source of knowledge would be *nous*; it would be the source of the source, just as all knowledge stands to all things.”<sup>66</sup>

Reason, rationality or intelligence may appear to us today as a superpower defining and distinguishing human beings – whether this separation is qualitative or quantitative. We hope to have shown that for Aristotle *logos* distinguishes humans from other animals in two of its senses (“reason” and “discourse”), but that these two together with the other two senses of *logos* (“standard” and “proportion”) all refer back to one focal meaning shared by all living nature and most of nature as such. In any case *logos* is not hypostatized or epitomized in Aristotle neither in the context of beings as such (cf. God, or the ultimate constituents of the cosmos), nor in the context of ultimate human happiness and blessedness as well as of human capacities and achievements (cf. *nous*). And if *logos* has been shockingly neglected both by Aristotle and by his posterity, it may be because it has been eclipsed by the absolute prioritization and deification of *nous*, and ended up abandoning its worldly, hesitant, concrete and humane character in order to become the Word.

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<sup>1</sup> *Politics*, I, 1, 1253a10-11.

<sup>2</sup> For the connection between being as such and language see also Jacques Derrida, *Apories*, (Paris: Galilée, 1996), p. 69ff.

<sup>3</sup> *Categories*, 1. Our return to the “*logos* of being” by means of human *logos* may provide a beginning to Aubenque’s question in Aubenque, Pierre, *Le problème de l’être chez Aristote*, (Paris: PUF, 2002), p. 508. See also Jean Brun, *Aristote et le lycée* (Paris: PUF, 1961), p. 21.

<sup>4</sup> DK22B51. All translations from Ancient Greek are ours unless noted otherwise, and quotations from Presocratics follow the Diels-Kranz notation.

<sup>5</sup> Euripides, *Thyestes* (Frag. 396, *T. G. F.*), quoted in *Rhetoric*, II, 23, 1397a.

<sup>6</sup> Sophocles, *Antigone*, v. 332-333.

<sup>7</sup> *Metaphysics*, II, 1, 993b12-19.

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<sup>8</sup> Besides Aristotle's discussions of the wholeness of human life from the *Nicomachean Ethics*, I, we are indeed thinking here of the "mineness" (*jemeinigkeit*) of *Dasein* in the second section of Martin Heidegger's *Being and Time* as well as Jacques Derrida, *Apories*, (Paris: Galilée, 1996), p. 50ff.

<sup>9</sup> *Rhetoric*, III, 1, 1404b8-11.

<sup>10</sup> Who exactly does this "us" refer to? Probably, first, to Aristotle's audience – which is totally unclear to *us*. What is clear at least is that Aristotle himself is part of this, and we shall pursue our interpretations of such comparisons as being made in relation to Aristotle, about which we have some information, instead of venturing to imagine what his audience was like.

<sup>11</sup> *Poetics*, 2, 1448a1-6.

<sup>12</sup> *Poetics*, 2, 1448a15.

<sup>13</sup> *Politics*, I, 1, 1252b22-23. For an implicit but clear reference see also *Politics*, I, 1, 1253a5-7. See also the intriguing parallel in *Politics*, III, 11, 1287b25ff. The figure of the Cyclops is the one we encounter in Homer's *Odyssey*, IX, 114ff., and in this sense Aristotle develops a figure already present in Plato, *Laws*, 680b, 682a. But the earth-born beings in *Politics*, II, 5, 1269a6-7 refer to the other figure of Cyclops we find in Herodotus, IV, 27; Hesiod, *W.D.*, 108, Pindar, *Nem.* 6.1. [referanslar!!]

<sup>14</sup> *Nicomachean Ethics*, X, 9, 1180a 29.

<sup>15</sup> *Rhetoric*, II, 3, 1380b.

<sup>16</sup> *Poetics*, 2, 1448a17.

<sup>17</sup> *Politics*, II, 5, 1269a7-8.

<sup>18</sup> *Nicomachean Ethics*, X, 9, 1180a19-29.

<sup>19</sup> See *Politics*, VIII, 1, 1337a22ff.

<sup>20</sup> *Nicomachean Ethics*, I, 13, 1102b33-34. Emphasis is ours for reasons exhibited in Chapter V.

<sup>21</sup> Pierre Aubenque, "Aristote et la Démocratie", in *Individu et Société: l'influence d'Aristote dans le monde méditerranéen*, (Istanbul: Isis, 1988), p. 38.

<sup>22</sup> *Politics*, I, 1, 1252b24.

<sup>23</sup> *Politics*, III, 1, 1274b39-1275a24ff.

<sup>24</sup> *Politics*, III, 5, 1280b24ff.

<sup>25</sup> There is a specific term for the prepolitical agglomeration of households in Aristotle: *kômê*. (See *Politics*, I, 1, 1252b16ff.)

<sup>26</sup> *Politics*, III, 11, 1287b23-32. The same idea appears in *Politics*, III, 6, 1282a16-23. For the association between *logos* and *synopsisia* see also *Politics*, VII, 1, 1323b6-7.

<sup>27</sup> *Politics*, III, 6, 1281a42-1281b10.

<sup>28</sup> *Politics*, I, 1, 1252b19-26.

<sup>29</sup> Homer, *Odyssey*, IX, 106.

<sup>30</sup> *Politics*, II, 5, 1269a7.

<sup>31</sup> *Politics*, I, 1, 1253a5-8. The quotation from Homer is from the *Iliad*, IX, 63.

<sup>32</sup> *Politics*, III, 1, 1275b22ff.

<sup>33</sup> It is not clear to us what exactly Polyphemus is thinking to do here with the ship. And yet this question might have some relevance as we shall see him later *needing* a ship.

<sup>34</sup> Homer, *Odyssey*, I, 1.

<sup>35</sup> *Rhetoric*, II, 3, 1380b.

<sup>36</sup> Why exactly does Polyphemus ask Odysseus' name here? There must be a reason because this is indeed already part of Odysseus' plan. In other words, why did Odysseus assume that Polyphemus would ask his name such that he prepared the spear, preconceived the way his fellow men and him would go out of the cave, and further anticipated that Polyphemus would try to ask for help from the other Cyclopes in vain?

<sup>37</sup> *Sophistical Refutations*, 1, 165a11-14.

<sup>38</sup> *Categories*, 1.

<sup>39</sup> *Rhetoric*, II, 3, 1380b.

<sup>40</sup> Theocritus, *Idylls*, ed. R. J. Cholmeley, (London: George Bell & Sons, 1901).

<sup>41</sup> For the subtle relationship between plausibility and possibility in tragedy and comedy, see *Poetics*, 24, 1460a26ff.

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- <sup>42</sup> *Nicomachean Ethics*, I, 13, 1102a28ff.
- <sup>43</sup> It is us who emphasize this word in order to suggest how Polyphemus' burning desire is far from even considering that he is addressing a sea nymph.
- <sup>44</sup> Indeed there is a reference to the Homeric episode.
- <sup>45</sup> Note that otherworldly projections exploit precisely cases like these.
- <sup>46</sup> *Poetics*, 2, 1445a17-19, *et passim*.
- <sup>47</sup> *Poetics*, 11, 1452a25, 33; 13, 1453a11, 20; 14, 1453b7, 31; 24, 1460a30; 16, 1455a20; 26, 1462b2.
- <sup>48</sup> *Poetics*, 14, 1453b31.
- <sup>49</sup> The passage we have in mind is *Politics*, VII, 6, 1327b23-33. See also the more famous passage in *Politics*, I, 1, 1252b5-9.
- <sup>50</sup> *Politics*, VII, 6, 1328a8-13.
- <sup>51</sup> Most dramatically, when she describes Laius to Oedipus, she says "His look was not very different from yours" (743), and it is exactly upon this phrase that Oedipus realizes that he *is* Laius' killer.
- <sup>52</sup> *Sophistical Refutations*, 1, 165a11-14.
- <sup>53</sup> Sophocles, *King Oedipus*, v. 132-146.
- <sup>54</sup> "King Oedipus might have had one eye too many." (Friedrich Hölderlin, "In lieblicher Blau"/"In lovely blue", in *Hymns and Fragments*, tr. Richard Sieburth (New Jersey: Princeton University Press, 1984), p. 251.) Aristotle also uses this metaphor and he may have Oedipus in mind in *Nicomachean Ethics*, VI, 13, 1144b8-12.
- <sup>55</sup> *Poetics*, 15, 1454b6-8; 24, 1460a26-32.
- <sup>56</sup> It is a pity that Aristotle's insightful emphasis on *anagnôrisis* seems to have been understood as a momentary outburst due to the outstanding skill of a protagonist (as many mystery novels appeal to keen detective for solving the mystery, or as the scenes in many comedy films await the real *factor* of funniness, the withdrawal of which renders the situation back to its "commonness") or to an extraordinary incident, as a poor science-fiction movie may answer all the questions with an answer that makes no sense... See *Poetics*, 16, 1455a18-: "The best kind of recognition is the one that comes out of the things themselves [*hê ex autôn tôn pragmatôn*], of the unfolding [*ekplêxeôs*] that happens by means of plausible events, like Sophocles' *Oedipus*..." The all too well known Aristotelian precept that in tragedy "one should prefer a likely impossibility to an unpersuasive possibility" (*Poetics*, 24, 1460a26-27) in fact grants events themselves to power to be likely and persuasive without appeal to strict logic. But this is precisely granted to *events* in a tragedy. The unfolding of events is such that it makes even the impossible *likely*. This means that a good intrigue, the heart of tragedy for Aristotle, is capable making the impossible *likely*, and that a bad plot is incapable of even making a possibility persuasive.
- <sup>57</sup> *Politics*, II, 5, 1269a7-8.
- <sup>58</sup> Hannah Arendt, *La crise de la culture*, (Paris: NRF, 1972), p. 65; Amélie Oksenberg Rorty, "De Anima and Its Recent Interpretations", in *Essays on Aristotle's De Anima*, eds. Martha C. Nussbaum & Amélie Oksenberg Rorty (Clarendon: Oxford University Press, 1992), p. 9.
- <sup>59</sup> *On the Soul*, III, 5, 430a14-17.
- <sup>60</sup> *On the Soul*, III, 5, 430a18-25. See also *Generation of Animals*, II, 3, 736b28.
- <sup>61</sup> *On the Soul*, III, 8, 432a3.
- <sup>62</sup> *Metaphysics*, XII, 7, 1072a24-1072b4.
- <sup>63</sup> *On the Soul*, III, 6, 430b26-29.
- <sup>64</sup> *Nicomachean Ethics*, VI, 8, 1142a25-26; VI, 5, 1141a5-8; VI, 9, 1143b1.
- <sup>65</sup> *Nicomachean Ethics*, X, 7, 1177b30-1178a2; X, 8, 1179a23-31.
- <sup>66</sup> *Posterior Analytics*, II, 19, 110b5-17.

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## APPENDIX: LEXICOLOGY OF *LOGOS*.

It might be useful for reference to indicate a sketch of the article *logos* in Hermann Bonitz' *Index Aristotelicus*<sup>2</sup>, and more generally in Liddell and Scott's *Greek-English Lexicon*<sup>3</sup>.

### A. *LOGOS* IN THE *INDEX ARISTOTELICUS*.

In his *Index Aristotelicus* Hermann Bonitz distinguishes the meanings of *logos* in Aristotle under four headings, themselves divided into groups and subgroups. Aside from the hundreds of references to Aristotelian texts, his fourfold partition may be reproduced as follows (to each major heading we add in bold the corresponding sense of *logos* that we have elaborated in our dissertation and the relevant chapter):

- I. vox, lingua, sermo. [DISCOURSE, cf. Chapter 6]
  2. verbum.
  3. oratio.
  4. narratio, commentum, dictum.
  5. oratio pedestris.
  6. *logoi* saepe usurpatur, ubi ad alias eiusdem libri partes vel ad alios libros lectores relegantur.
  
- II. *Logos* ab oratione transfertur ad eas notiones ac cogitationes..., quae voce et oratione significantur. [STANDARD, Chapters 1 and 2.]
  1. *logos* significat explicationem vel definitionem nominis alicuius.
    - b. notio.
    - c. (as universal in contrast to perception)
    - d. (opposed to number, place, magnitude)
    - e. (account?)
    - f. *logos* latius patet quam *horismos*.  
– *logos* oppo *hylê*.  
– *logos proteron* vel ita usurpatur ut distinguatur ab eo quod est *ousiai proteron*.
  2. enunciatum.  
– inde explicatur, quod *logos* praedicatum significare potest.
  3. *sylogismos*.
  4. ratio, argumentum, ratiocinatio.
    - b. ratiocinationi saepe opponitur sensuum evidentia.
    - c. genera *tou logou* adiectivis distinguuntur.
    - d. formulae ex voc *logos* cum verbis coniuncto.
  5. disputatio, disquisitio de aliqua re, colloquium.
  6. *doxa, hypolêpsis, axiôma*.
  
- III. cogitandi ac ratiocinandi facultas. [REASON, cf. Chapter 5]

<sup>2</sup> Hermann Bonitz, *Index Aristotelicus* (Graz: Akademische Druck und Verlagsanstalt, 1955).

<sup>3</sup> H. G. Liddell, R. Scott, *Greek-English Lexicon*, ninth edition, (Oxford: Clarendon, 1996).

IV. ratio mathematica (Verhältniss). [PROPORTION, cf. Chapters 3 and 4.]  
B. LOGOS IN THE GREEK-ENGLISH LEXICON.

In Liddel-Scott's *Greek-English Lexicon*, the meanings of *logos* are distributed under ten major headings themselves divided into groups and subgroups which may be summarized as follows (again we indicate in bold characters the relevant sense of *logos* that we have analyzed in our dissertation, followed by a reference to the relevant chapter):

- I. computation, reckoning. [REASON, cf. Chapter 5.]
  1. *account* of money handled.
    - b. *public accounts*, i.e. branch of *treasury*; also as title of treasurer.
  2. generally *account, reckoning*.
  3. *measure, tale; sum, total* of expenditure.
  4. *esteem, consideration, value* put on a person or thing.
- II. Relation, correspondence, proportion. [PROPORTION, cf. Chapters 3 and 4.]
  1. generally, *relation*, ratio, analogy, reasoning.
  2. Math., *ratio, proportion*.
  3. Gramm., *analogy, rule*.
- III. *explanation*.
  1. *plea, pretext, ground, purpose, reason*.
    - b. *plea, case* in Law or argument.
  2. *statement of a theory, argument*; discourse, reflexion on reality; teaching; collectively of prophecy, *arguments* leading to a conclusion; theory.
    - b. title of a discourse by Protagoras; name of an *argument*; title of a philosophical treatise; name of play of Epicharmus; *quibble, argument*.
    - c. in Logic, *proposition*, whether as premiss or conclusion.
    - d. *rule, principle, law*, as embodying the result of *logismos*; principle; final cause; true *principle*, right *rule*; *plan*.
  3. *law, rule* of conduct; universal principle; conscience; precept.
  4. *thesis, hypothesis, provisional ground; proposition*.
  5. *reason, ground; proof*.
  6. *formula* (wider than *definition*, but frequently equivalent thereto), *term* expressing *reason*; *essential definition*; generic *definition*; specific definition; *formula*, i.e. *ratio* of combination.  
[STANDARD, cf. Chapters 1 and 2; PROPORTION, cf. Chapters 3 and 4.]
  7. *reason, law* exhibited in the world-process; the *divine* order;
    - b. *spermatikos logos*, generative *principle* in organisms.

c. in Neo-Platonic Philosophy, of regulative and formative *forces*, derived from the intelligible and operative in the sensible universe.

- IV. inward *debate* of the soul. [REASON, Chapter 5.]
1. *thinking, reasoning*; test by *reflection*; *reflection, deliberation*; *idea, thought*; *analogy*; *argument*; *whim*; ordaining *reason*; scientific knowledge and right *process of thought*; in singular and plural, contrasted by Plato and Aristotle as *theory, abstract reasoning* with outward experience; *explanation*, opp. perception; *theory*, opp. practice; in Logic, *discursive reasoning*, opp. intuition; *reasoning* in general;
  2. *reason* as a faculty; frequently in Stoic Philosophy, human Reason, opp. *phantasia*; also the *reason* which pervades the universe.
    - b. *creative reason*.
- V. *continuous statement, narrative* (whether fact or fiction), *oration*, etc. [DISCOURSE, cf. Chapter 6.]
1. *fable*.
  2. *legend*; of Orphic *rhapsodies*.
  3. *tale, story*; plural *histories*; so in singular, *a historical work*; one *section* of such a work; of St. Luke's gospel; in Plato, opp. *mythos*, as *history* to legend.
  4. *speech*, delivered in court, assembly, etc.; funeral *oration*; especially the *body of a speech*, opp. *epilogos*, opp. *prooimion*; *body of a law*, opp. proem; *spoken*, opp. written *word*; *speech* read from a roll; published *speech*; rarely of *speeches* in Tragedy.
- VI. *verbal expression or utterance*; rarely a single word; never in Grammar signifying *vocable*; usually of a *phrase*. [DISCOURSE, cf. Chapter 6.]
- a. plural, without Articulation, *talk, tales*; brief *words*.
  - b. singular, *expression, phrase*; *rigmarole*; *message*.
  - c. coupled or contrasted with words expressed or understood signifying act, fact, truth, etc., mostly in a depreciatory sense.
  2. *common talk, report, tradition*; *hearsay*; in plural, traditions.
    - b. *rumour*; *fiction*.
    - c. *mention, notice, description*; *expression*.
    - d. the *talk* that one occasions, *repute*, mostly in a good sense, *good report, praise, honour, fame*; less frequently in bad sense, *evil report*; *slanders*.
    - e. *story*; *tradition*; *credit*.
  3. *discussion, debate, deliberation*.
    - b. *right of discussion or speech*; hence, *time allowed for a speech*.

- c. *dialogue*, as a form of philosophical *debate*; hence, *dialogue* as a form of literature.
- d. *section, division* of a dialogue or treatise; *branch, department, division* of a system of philosophy.
- e. in plural, *literature, letters*.

- VII. *a particular utterance, saying.* [DISCOURSE, cf. Chapter 6.]
- 1. *divine utterance, oracle*.
  - 2. *proverb, maxim, saying*.
  - 3. *assertion*, opp. *oath*; *bare work*, opp. *martyria*.
  - 4. *express resolution; consent; proposal*; frequently in plural, *terms, conditions*, etc.
  - 5. *word of command, behest*; the ten Commandments.
- VIII. *thing spoken of, subject-matter; subject; question; matter for talk.*
- 2. *plot* of a narrative or dramatic poem.
    - b. in Art, subject of a painting.
  - 3. *thing talked of, event*.
- IX. *expression, utterance, speech regarded formally; intelligent utterance, opp. phônê; in plural, eloquence; language; oration.* [DISCOURSE, cf. Chapter 6.]
- 2. of various modes of expression, especially artistic and literary; *prose*, opp. *poiêsis*.
    - b. of the constituents of lyric or dramatic poetry, *words*, opp. *praxis*; dramatic *dialogue*, opp. *ta tou khorou*.
  - 3. Grammar, *phrase, complex term*, opp. *onoma*.
    - b. *sentence, complete statement*.
    - c. *language*; title of work by Chysippus.
- X. the Word or Wisdom of God, personified as his agent in creation and world-government; in New Testament, identified with the person of Christ.



## INDEX OF SOME GREEK TERMS

We do not write all cognates and all obvious translations. *Logos* and its cognates are almost always indicated in brackets in the text of our dissertation.

*Aisthêsis*: sensation, perception.

*Apophasis*: negation.

*Apophansis*: declaration.

*Arkhê*: source, origin; principle; beginning.

*Boulêsis*: wish.

*Bouleusis*: deliberation.

*Doxa*: opinion.

*Dynamis*: potency; possibility, power.

*Eidos*: form, look.

*Endoxa*: widespread opinion.

*Energeia*: being-at-work, actuality.

*Entelekheia*: being-at-work, being-at-work-staying-itself, actuality.

*Epithymia*: appetite.

*Ethos*: habit.

*Êthos*: character.

*Eukhê*: wish.

*Genos*: kind.

*Gramma*: letter.

*Hexis*: positive state.

*Hôs epi to polu*: for the most part.

*Hylê*: material.

*Kataphasis*: affirmation.

*Kinêsis*: motion.

*Mathêsis*: learning.

*Metabolê*: change, reversal.

*Morphê*: shape.

*Orexis*: desire.

*Ousia*: being.

*Paideia*: education.

*Pathos*: affection, feeling; modification.

*Phasis*: clarification.

*Pheggesthai*: to utter.

*Phônê*: voice.

*Phronêsis*: prudence.

*Proairesis*: choice.

*Psophos*: sound.

*Psykhê*: soul.

*Sêmeion*: sign.

*Stoikheion*: element.

*Zôion*: animal.

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### PUBLICATIONS

"The *Apology* in Light of the Cave" in John Russon and Patricia Fagan (eds.), *Reexamining Socrates in the Apology* (Illinois: Northwestern University Press, forthcoming 2007). (article)

"On Plato's *Meno* and the *Republic*", Ancient Philosophy Society Meeting, Eugene, Oregon, 2005. (response paper)

### TEACHING EXPERIENCE:

Instructor:

- 2005 Summer: "The Meaning of Human Existence", Pennsylvania State Univ.  
2004 Winter: "Philosophy, Art and Film", Pennsylvania State University.  
2004 Spring: "Introduction to Philosophy", Pennsylvania State University.

### LANGUAGES

French (fluent), Turkish (fluent), Ancient Greek (Reading level), Latin (Reading level).

### REFEREES

John Russon, Associate Professor of Philosophy, University of Guelph.  
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