

6.1. Introduction to Philosophy 1984/1985.

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First year: logic

Contents: see p. 159

Preface.

(i) The purpose of this three-year course is ‘propaedeutic’. ‘Propaideia’ and/ or ‘propaideuma’ mean, in Ancient Greek (e.g. Platon, Politeia 536d), something like ‘introductory (or ‘elementary’) instruction.

This involves two contents of thought: this course, first of all, gives information, though not in the dilettante (enthusiast) or in the specialist sense; it is about general education; it provides, secondly, method; therefore it does not lose itself in fashion or in ideology (one-sided, yes, bigoted thinking).

(ii) This three-year propaedeutic, of course, in the first place, initiates into philosophy (philosophy), but also into rhetoric (textuology) and into professional science (stellar or positive science). Philosophy is, after all, distinct from both, yet not separable.

First of all, the philosopher expresses his ideas in texts; he situates himself in a tradition of texts (intertextuality), which he reads himself; well, rhetoric, since the Greek Protosofic (-450/-350) especially, is textualism and theory about textualism.

Secondly, the philosopher - with the exception of irrationalist thinkers (and these still use reasoning) - is anxious to work scientifically (methodical, moment) and he keeps himself informed, as much as possible (we live in a burst of professional science), of the results and foundations of the professional sciences (informative moment). - By the way, “propaedeutics” is used to denote the elementary study of a science.

(iii) Isokrates of Athens (-436/-338)

He advocated a “general education,” which was the foundation of his rhetoric. Philosophy and professional science were integral parts of that general education, necessary to responsibly, compose and/or pronounce a text.-- We engage in that tradition.

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Note.-- (i) *C.J. De Vogel, Greek Philosophy, I (Thales to Plato)*, Leiden, 1950, 2, says that the subject term “philosophia” (literally: “wisdom-mindedness”; think of us “wisdom-philosophy”) covers two meanings:

a. broad meaning,

namely, the systematic acquisition of ‘wisdom’ so that one approaches, as far as possible, the ideal of general development; *Herodotos of Halikarnassos* (-484/-424), the founder of the ‘science of history’ (land and ethnology), *Hist.* , 1:30,-- later *Thoekudides of Athens* (in Latin Thucydides; -460/-399), the highly specialized founder of the science of history, *Peloponesian war.*, II: 40,-- later still, Isokrates of Athens (-436/-338), the rhetor, use the word ‘philosophy’ in the broad sense of ‘general education’, - one sees that ‘sophia’ (Lat.: ‘sapientia’, wisdom) means - practically speaking - ‘general development’;

b. a narrower meaning,

namely, the specialized acquisition of what, since Puthagoras of Samos (-580/-500) and the Paleoputhagoreans (the oldest disciples of Puthagoras (Latin: Pythagoras) (-500/-300), has been called ‘philosophy’, i.e. a highly scientific philosophy, -- with which the specialization begins; -- yet neither Puthagoras nor the Paleoputhagoreans wanted to break with the ancient (archaic) ‘wisdom’, i.e. the set of skills, by which the man of that time could cope with life and its tasks.

De Vogel, o.c., 3, mentions, briefly, the seven sages of Hellas, among whom Thales of Miletos (-624/-545), generally, passes as the first specialized sage (and this as ‘fusikos’, physicist, physicist and natural philosopher).

From which one can see that the boundaries between general education and specialized philosophy (and/ or professional science and, later, also rhetoric) are not clearly delineable.

(ii) Hellas (Greece) was, under that point of view, only one case of a general pattern of culture. One reads e.g. *W.I. Irwin, Wisdom Literature*, in: *Enc. Britann.*, Chicago, 1967, 23: 601, at:

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the ancient Near East (i.e., the area encompassing Ethiopia, Egypt; -- Mesopotamia, i.e., approximately Iran and Iraq, Asia Minor (Micrasia, Anatolia), Armenia,-- Syria,-Arabia) knew, from the Sumerians (in Mesopotamia) and the ancient Egyptians, a richly varied wisdom literature, the portrayal of which we can read, in the Wisdom Books of Old and New Testament, in Israel (from -1200 especially).

There is more: the *Strasbourg Colloquium* (17/19.05. 1962), showed us a group of specialists, who discussed ancient Egyptian (eight studies), Mesopotamian (one study) and Israelite (three studies) wisdom (see *F. Wendel et al, Les sagesses du Proche-Orient ancien*, (Wendel, *Wisdoms of the Ancient Near East*), Paris, 1963, in which A. Volten, *Der Begriff der maat in den Aegyptischen Weisheitstexten*, (The concept of maat in the Egyptian wisdom texts,), o.c., 73/101, sees, among other things, ancient Egyptian hylozoism (the idea that all matter is alive) at work in the first Greek philosophers; Volten denotes 'Maat' especially as 'soul substance (fluid)').

See also:

-- *W. Bieder, Wisdom literature*, in: *B. Reicke/ L. Rost, Biblical-historical dictionary*, Utr./Antw., 1970, VI: 65/70 (review);

-- *C.A. Keller, ibid.*, 70v. ("wise" is stout, knowledgeable, experienced, wise; -- developed, normative, sensible and conscientious and so social); *id.*, *ibid.*, 63/65 ("wisdom" is, translated into modern terms, the summary term for ancient Eastern humanism ("humanism" in the sense of "generally developed way of being human.") or "paideia" (educational ideal).

In other words, there is a very strong agogic moment hidden in the ancient Eastern wisdom: emancipation (independent thought) and saving action (salvation) are at stake. This agogic moment is found, later, in the Pythagoreans and, in their wake, in the Platonists,

Rightly writes *M.J. Suggs, Book of Wisdom*, in: *Enc. Britann.*, Chicago, 1967, 73: 600f.: "Greek philosophy was the heiress and, to some extent, the pupil of the ancient contemplation of the East." (a.c., 600).

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Philosophical logic (theory of thought, dianoetics).

Since the days of Aristotle of Stageira (-384/-322; nicknamed “the Stagirite”), the founder of philosophical logic or doctrine concerning thought, logic has always been connected, in one way or another, with ontology. Therefore a first chapter on ontology.

Further, logic has always been an ordering doctrine (harmology). Therefore, as a second introduction, a word about the comparative method, core of all ordering.

After those introductory chapters, we can, with ease, begin the logic proper, which, essentially, discusses three themata:

- ideas (notions, concepts),
- judgments (propositions, statements, assertions), in which concepts, in judgment, function;
- reasoning (especially the syllogism or capstone), such as deduction, reduction (including and especially inductive reduction), and abduction (or hypothesis).

Usually, as a separate section, the applied logic or methodology is added. We will, however, not treat the applications or - as one now likes to say - ‘applicative models’ separately, but integrated into the logic text itself.

- Such are the main features of the subject matter of the first year of philosophy. ‘Philosophy’ has, usually, been ‘orderly, i.e. logically rigorous, thinking. Not without reason did the Peripateticists (Aristotelians) call the logic of their master ‘to organon’ (Lat.: instrumentum, tool,-- here of the thinking faculty).

More than that: in the tradition of Aristotle’s teacher, Platon of Athens (-427/-347), the founder of the Academy, a doctrine of order is intrinsically intertwined with philosophical thinking itself. It is in that Platonic tradition that we shall enter : all ‘being’ (reality) is thought (thoughtful, invested thinking); to think is: to allow that thoughtful ‘being’, in the form of ideas (thought-contents), to come to full consciousness in us. It is this type of awareness, which, through ontologically based logic, is facilitated.

L 5

I. Introduction

I.A. ontological introduction. (5/19)

In a first point, we will delineate the ontological method (lemmatic-analytical). Then, in a second point, we will deal with:

- (i) the 'being' as being(s) in itself and
- (ii) 'being' as a necessary and/ or sufficient reason or ground (as a 'horizon').

Definition of ontology.

First, a description. - Ontology, as a term, comes from *Joh. Clauberg* (+1665), who, in his *Metaphysica* (1646) says that 'ontologia' is "a type of know-ledge, which dwells on being as being, i.e. in so far as being is."

Clauberg adds, "(it is, thereby, about) a 'natura' (a way of being), peculiar to :

- (i) all (collection; summative induction) and
- (ii) all separate (singular) being".

Consequence: such a science is 'catholica universalis' (general concerning object); i.e. nothing falls outside of it (comprehensive nature).

2. Ontology as matter,

i.e. as a human activity, however, is much older: *G. Thinè A. Lempereur*, *Dictionnaire général des sciences humaines*, Paris, 1975, 673, speaks of a type of ontology as a "metaphysical" ontology, set against the "formal" of Edmund Husserl (1859/1938), the phenomenologist, and the "fundamental" of Martin Heidegger (1889/1976), the existential thinker.

We are talking, here, first and foremost, about the 'metaphysical', originating in the thought of Parmenides of Elea (-540/...), one of the first ancient Greek thinkers, and brought to full development both by Aristotle (L.4), its true founder, and in the Middle Ages ecclesiastical Scholastics (800/1450). So that, with that, we stand before an ancient and established tradition.

Bibl. sample.

-- *O. Willmann* (1839/1920), *Abriss der Philosophie (Philosophische Propädeutik)*, (Outline of Philosophy (Philosophical Propaedeutics)), Wien, 1959-5, 329/460 (*Historische Einführung in die Metaphysik; id., Die wichtigsten philosophischen Fachausdrucke in historischer Anordnung*, ((Historical Introduction to Metaphysics; id., The Most Important Philosophical Terms in Historical Order)), Kempten / Munich, 1909;

--- *D. Mercier*, *Metaphysique générale ou Ontologie*, (General metaphysics or Ontology), Louvain / Paris, 1923-7.

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Lematic-analytic ontology.

Platon of Athens (L.4) is the founder of the lemmatic-analytic method. This proceeds, in two steps.

(i) First, the ‘lemma’, anticipatio (praesumptio),-- the conjecture (hypothesis, assumption). With regard to ‘being’, we know, to begin with, vaguely, what ‘being’ is. Reason : we use, daily, the verb and noun ‘being’, as well as the adjective ‘substantial’. And we use it meaningfully.

(ii) Then, the ‘analysis’, analysis (dissection, unravelling).-- The ‘being’ we are, now, in the following pages, starting from our initially vague notion of being, going to clarify, ‘explicate’, further explain.

(I) -- If anything, then fact and mode of being.

(1) the common sense (Eng. common sense (*Thomas Reid* (1710/1796; *An Inquiry into the Human Mind on the Principles of Common Sense* (1764) and the Scottish School allied to him has an understanding of ‘being’, ‘essence’, ‘essential’, as shown in the following elementary language analysis.

(i) “Who is Theagenes? And Charikleia?”

Answer: “The heroes from the love and adventure novel *Aithiopika* by *Heliodoros of Ephesus* (tss. +300 and +400).”

Note: ‘being’ is pronounced with ‘who’ or with ‘heroes’ connected. One ‘is, after all, ‘someone’ (Identifying language).

(ii) “Where are Charikleia and Theagenes?”

Answer, “They are in the region of the Nile estuary” (Locally situated language).

(iii) “How was Charikleia?”

Answer: “A young girl, sitting on a rock,---so beautiful that she had the image impression (image) of a goddess.” (Thus the book I, 2:1). (Further qualifying or typical language).

We could go on like this.

One more question, “Is Charikleia there?”

In this case, the emphasis is not on the place but on the sheer fact of whether she is there.-- In the three previous questions, it was about What questions; in the last question, about Whether questions.

(2) M. Heidegger (L.5), known for his foundational research on ‘being’ and ‘knowledge of being’ (hence the name ‘Fundamentalontology’ (fundamental ontology)) says: “To be human (‘Dasein’) is (i) to be (ii) in a certain way, namely, (i) while he himself ‘is’, (ii) man understands, immediately, ‘something like being’” (Sein und Zeit, I, Tübingen, 1949-6 (1927-1), 17).

L 7.

Translated into the language play of the common mind (i.e. of John-and-all), this reads: **(i)** because we ourselves 'are' (exist in our way), **(ii)** we know, somewhat, what 'being' generally, is.

So much for the lemma of any ontology, i.e. its starting point, however vague.

1. From the duality of questions and answers (L.6), above, the basic concept of 'being', namely as being in itself (independent reality) is already exposed.

1. Indeed, the Scholastics (L.5) interpreted "being" (esse, ens) with the word "res"(thing, matter,--in the sense of "what exists in itself, objectively, independently of my and thine acts of thought").

2. And 'res' (reality) they interpreted dichotomously:

a. as 'essentia' (from Aristotle 'ousia', being(s)), i.e. as an answer to the what - question, i.e. as a way of being;

b. as 'existentia' (existence, factuality), i.e. as an answer to the or-question, i.e. being as 'being there' (factual being).

Summary

Something (res, in itself, with like features:

a. being something other than the rest (complement of "being");

b. being there, amidst the rest (complement of "being").

Behold the conceptual content of 'being' as being in itself.

This is our first analysis of the lemma "being.

2. From the same twosome of questions and answers, we see, at once, the conceptual scope of 'being'. - Note 'the rest' ('complement' of 'being'; whenever we describe a 'note' (conceptual trait): we cannot avoid it! Without total being, one moment, element, member, of that overall or total being is, after all, that same moment unthinkable and unspeakable.

As Clauberg, in his definition of ontology, said (L.5),

(i) all "beings" (being) together and

(ii) each being individually (singularly) they are, all and every one, 'being', so that we label them as 'beings' modes of being and facts).

L 8

The “proof” from the incongruous.

(i) We have, just now, designed an ontological ‘model’ (idea, concept): starting from a previously vague usage, we have clarified the idea of ‘being’ (being, substantial) to the duality ‘essence/existence’ as existing in itself.

a. To clarify - to speak of formal ‘proof’ regarding being is difficult - that what we, as a model, have designed is correct,

b. we posit the counter-model, i.e., ‘something’ (?) that (i) does not exhibit a being and (ii) does not exhibit a factuality: such a thing is and unthinkable and above all unreal (unreal)

We say ‘unthinkable’ in the sense of ‘not imaginable as real’. For we did ‘imagine’ it as a counter-model (but to show that it is unreal (unreal, non-real, ‘nothing’).

Since there is no third possibility between ‘being’ and ‘non-being’ - here - the model must, then, be real and the counter-model unreal. So much for the conceptual content.

(ii) As to the scope of concepts. see the diagram.

Stated: the counter-model, viz. ‘something’ beyond the scope of being. Evidently

(i) it is, then, not something different from the rest of being (for it has no being of its own) and

(ii) it is not there, amidst the rest of being (for it has no factuality of its own).

Conclusion: twice we state, that we ‘find such a thing (?) to be unreal (unreal). One also says, “Such a thing (?) is situated in ‘absolute nothingness’ (to say that it ‘absolutely nothingness’ ‘is’).”

In a single word, one says, concerning the all-encompassingness of being (outside of which there is absolutely nothing), that being is “transcendental” (all-pervasive), because “absolute” (i.e., relating to absolutely nothing and completely independent).

Note:-- One can substitute ‘ontology’ for reality theory: the reader(s) sees, now, in why.

Note:-- R.A. Koch, *Die Uraxiome in ihrer Bedeutung für die philosophischen Grunddisziplinen*, (The Uraxioms in their Significance for the Basic Philosophical Disciplines), in: *Tijdschr. v. Fil.*, 31 (1969), 4: 749/766, expresses this as follows.

L. 9.

(1) “Es gibt ein All mit allen seinen Teilen. Jedes Seiende ist (a) ein Teil des Alls oder (b) das All selbst”.

(1) “There is a universe (transcendental whole) with all its ‘parts’ (moments, elements). Each ‘being’ is either a moment of the universe or that universe itself”.

“(1) Es gilt ein All mit allen seinen Teilen. Jedes ,Seiende ist ein geltendes, das Teil des Alls oder das All selbst”.

“(1) There is a universe that ‘holds’ (represents value), with all its moments (‘parts’) Every ‘being’ is something that ‘holds’ (represents value), either that universe itself or a moment of it.”

Explanation.

Many misunderstand the idea ‘really’ (be(de)). If the idea of ‘being’ (reality) is to be understood as ‘really’ unbounded (transcendental), in order to be ‘really’ ontological - and not the all too vague commonsense concept (see our lemma; L.6), - then the following remarks should be taken into account.

1. Being, philosophically (metaphysically) understood, as terminus technicus (strict professional term), includes everything,-- both all that we, in everyday language, call “real,” -- and what we, in it, call “imagined.

Reason: what I, you, all imagine is not-nothing, but something, namely a merely imagined reality, but then a (admittedly poorly imagined) reality.

Similarly, the philosophical idea of being includes everything that has already been thought, as well as what has not yet been thought.

2. Being, philosophically understood, includes the rhymed (consistent, contradiction-free) as well as the incongruous (L.8), -- the latter insofar as it is merely thought and formulated.

Reason: the merely thought, though impossible (incongruous, after all) ‘is’ not-nothing, but ‘something’. Thus when I ‘purely think’ a square circle (as impossible, of course). Otherwise, a proof from the incongruous would be impossible.

3. Being, philosophically conceived, includes both the merely possible and the utterly impossible.-- The latter, admittedly, as a merely assumed counter-model of real, resp. possible.

Reason: nothing can’t, by our thinking (which is, essentially, being), be ‘considered’.

L. 10.

In other words, even the unthinkable - unthinkable - can be 'considered' ('thought') (albeit as 'unthinkable', resp. 'unthinkable').

(II) -- *Something, then one, true, appreciable.*

O. Willmann, *Geschicht des Idealismus*, III (*Der Idealismus der Neuzeit*), Braunschweig, 1907-2, 1036f (as well as his *Die wichtigsten* (L.5v.), 62; 88; 123; further, in his *Historische Einf.* (L.5), 353ff.), names a invariably, in the ontological tradition, recurring set of basic ideas (fundamental concepts).

1. *Origin of the series.*

O. Willmann, *Die Gesch.*, 1036f.,. says that the series of transcendently used (and therefore called 'transcendental') ideas are the aggregation of, on the one hand, the paleopthagorean (between -550 and -300) basic ideas, the one (indivisible, coherent, aggregate) and the thinkable (the so-called 'true' in the sense of 'what corresponds to thought'), and on the other hand, the Platonic (dating since Plato of Athens (-427/-347) basic ideas, the being and the valuable (the so-called 'good').

2. *Essence of the series.*

a. Regarding the "being" (of Platon), we refer to above.

b. The three other basic ideas are nothing but being (being), insofar as it is the necessary and, transcendently, sufficient condition of three human acts of work.

a.-- *The transcendental one* (10/13).

a. As M. Heidegger says, man is that kind of being which, while and because it "is" itself (as an actual existence gifted with its own beingness (L.7v.)), possesses a transcendental understanding of being.

We saw, now, that this always implies (involves) complementation, i.e. division or, rather, division, of being into one considered being (something) and the rest of being.

This proves, in actuality, though, as good as always, unthinkingly, that being human involves divisive collecting. we compare (confront among ourselves) the one (being) with the rest (of being).

The comparative method seems to be innate to us. From what? Because being, as a coherence or unity of a multitude (elements), is clearly before our eyes, from the beginning.

L. 11.

In other words, being as a multiplicity of actual modes of being, which, by mutual comparison -- this is the human activity, of which being is the condition of possibility - proves its coherence (unity), is, at once, a light that for lights. Jean Piaget (1896/...), the genetic psychologist, and his school has conducted thorough research on the structuring behavior of children. The results seem to be summarized as follows.

(i) - Children aged four to five years order a sequence

(i.e. see a coherence or unity) sticks S_1, S_2, \dots, S_n , well pairwise (two at a time but get, apparently, not much further.

Piaget himself writes, *Genetic Epistemology (A Study of the Development of Thinking and Knowing*, Meppel, 1976, 36 : “The young children from four to five years old, whom I, together with A. Szeminska, examined ,

(i) knew how to find their way from home to their school and vice versa, excellently on their own;

(ii) but they were not yet able to imagine them through play materials, which depicted the different main landmarks (buildings, etc.).”

(ii) - By five to six years, the same children are ordering,

also, like in the previous model, the sticks according to size. However, -instead of only being able to manage this in pairs (“This stick is bigger than that stick”), as before, -- they order, by size, the whole set by trial and error.

In other words, the size of a unit (coherence) is increased. And that is, to the total series.

Piaget himself writes, o.c., 45v.: “The transitive (transitivity) ‘if a is greater, smaller, equal to b and if, at the same time, b is greater, smaller, equal to c, then also a is greater, smaller, equal to c’ becomes, at this stage, not yet transparent (mastered).

E.g., if the subject (child) sees two sticks together, of which S_1 is smaller than S_2 , and, then two sticks, of which S_2 is smaller than S_3 , it does not conclude that S_1 is smaller than S_3 , if it does not see all at once.”

(iii) - By the age of six to seven, only, does methodical ordering begin

posed for the problem always order the same set of sticks, by size, the children choose, now:

L. 12.

(i) first, among all the sticks (the total set), the smallest (which they, according to actual being, distinguish from the rest (complement (L.7; 10)));

(ii) then, they choose, within that remainder (complement), again, the smallest; etc.-
- Says Piaget, *Psychology and Theory of Knowledge*, Utr./Antw., 1973, 38v.:

(A) *The fact.*

Take, as an example, the preservation (identity - through - changes) or 'invariance' of a collection of objects. E.g. ten to twenty beads in a glass.

a. (the act).

We ask, then, the test subject (child) to put himself an equal number of blue beads in glass Z and red beads in glass B of the same shape and size(...).

b. (the act).

When, now, thus, two equal sets have been formed, one asks the child to pour (change) the contents of glass B into a vessel C, which is different in shape (change) (e.g., C is a glass that is taller (lower) and narrower (wider) than the two previous ones).

(B) *The requested (sought).*

One asks, then, the child whether there are still the same number (conservation, identity throughout variations, invariance) of beads in A and C.

One can repeat this test (testing of identity insight) with ever changing forms (configurations) of glasses, of course: in that case it becomes inductive testing.

(C) *The answer.*

(i) The little ones deny conservation. Or still: they do not consider it necessary. Thus, for some, there are more beads in C than in A "because the level of beads in C is higher." For others, again, there are fewer beads in C, "because the glass, in which they, now, sit, is narrower".

(ii) Around six - seven years of age - Piaget always says - the children grasp the set (unit-in-the-quantity), however, as invariant, independent of the perceptual (i.e., sensory) configuration (geometric form).

(iii) Around eleven to twelve years of age, the child learns to compare through word-by-word communicated tasks.

L. 13.

a. Until now, the child did not, except hesitantly, come away from the physical-actual data (actual modes of being (L.7)), realized in - what Piaget calls - observable configurations.

b. Now, however, it begins, through words (language signs: semiological, semiotic stage), to compare and order them:

(a) Given: Edith's hair is blonder than Suzanne's, but darker than Lili's;

(b) Asked: who, among the three girls, has, now, the darkest hair? To this the child responds, now, directly, without having to see the hair physically.

Conclusion.

Transcendental - one being is the light which, from childhood, enlightens man on the comparability and order of things (actual modes of being). - However, it is only in ontology that this transcendental-one being comes "into focus", i.e. man becomes aware of it.

b. -- *The transcendental true.* (13/16)

1. One noted: 'truth' - here - is meant as knowability and thinkability. Platonically expressed: idea.

In other words, as we (L.4) already said, all being is thought being, 'noèton', by the 'nous' (intellectus, mind) intelligible, understandable, being. Or still: being and all understanding are, mutually, existing together. Attuned to each other. Or still: being is intellectual by nature. Ideal by nature.

2. The notions of "truth," as they circulate, depend on the above transcendent notion of truth, as on the absolute condition of possibility.

a. Thus Heidegger's definition of 'truth' as unconcealedness (a.lètheia), i.e. as the emergence of actual modes of being (L.7) in the focus of our intellectual attention. Heidegger's definition is one that determines truth from what phenomenologists, with him, call 'the encounter' (Begegnung, Encounter, rencontre), i.e., the acquaintance with something (in its actual modes of being).

Indeed, law does not show itself (consider our lemma), remains hidden and, immediately, unknowable and unthinkable. Yet only what possesses **(i)** fact(s) and **(ii)** being possesses. And as such.

b. The other truth types rely, all of them, on Heidegger's encounter truth. Indeed, only after (or, at least, during) acquaintance with actual modes of being, can man compare.

L.14.

1. *The first comparison type is that of so-called logical truth.*

This exhibits two facets.

a. The first is that of the correspondence (similarity) between our understanding and the matter itself. The judgment (proposition) is, higher, par excellence, the bearer of the 'logically' called truth: it says, after all, out whether, yes or no, the predicate (saying) of the subject (subject) may be said out.

b. The second is that of the interrelationship or coherence between, on the one hand, the assertions concerning the matter, which is at issue (factual being), and, on the other hand, the moments (aspects, elements) of the matter itself.

2. *The second type of comparison is that of so-called ethical (moral, moral) truth.*

This is one type of agreement, namely between the insights (actual ways of being) confirmed with ideas or words and the actions (praxis) of the one who confirms. If you will: the agreement of the behavior with the word or thought.

3. *The third comparison type is that of so-called pragmatic (better: peirastic) truth.*

This is, likewise, one type of agreement, namely between, on the one hand, the leading idea (hypothesis, abduction) of an experiment ('peira', in ancient Greek, means test) and, on the other hand, the result (outcome) of that same experiment.

One special form of this is the truth of fate: the fate we experience is, indeed, one of the tests - though, in contrast to the experiment, outside our will or intervention - of our ideas and attitudes concerning the norms of life. Those who live life with ideas of 'moderation' will not so quickly have to expect the fate of a drunkard!

In other words, just as in a laboratory, our views of life are causes of fate (consequences), as truth concerning our actual way of being.

Conclusion.

From the encounter truth to the destiny truth, -- all these truth-types have as a condition of possibility the fact that man possesses, as Heidegger says, 'Seinsverständnis' (the idea of being), which, as we saw higher, works like a light that precedes (i.e. is necessary and sufficient transcendental condition of all understanding and comprehension, of all knowledge and thought).

L. 15.

That this is so is evident, for centuries, from the so-called laws of thought.-- Usually they are given, in the textbooks, in the form of three sentences.

a. *The identity law.-- "his(the) is his(the)".*

In doing so, the thinking person expresses that he/she:

1. once confronted (encounter; L.13) with some actual mode of being (L.7), think of Heidegger's unconcealment --, and above all honest (this ethical truth is always, of necessity, present in the act of beaming itself),

2. cannot but confess, in conscience, that law he knows (perceives, interprets) to be the cause and nothing else (exclusion of the complement of being; L.7), must be acknowledged, confirmed, confirmed.

b. *The contradiction or incongruity law. "Being(s) and non-being(s) cannot possibly be affirmed at the same time".*

In this way the thinking man, confronted both with the facts of something and with his conscience, expresses that 'something' (being(de)), factuality and mode of being, -- always L.7 --, are either present (being) or absent (not being). In other words : being and its negation (negation) do not go together (are contradictory, contradiction). They do not 'rhyme together'!

c. *The law of the exclusion of a third possibility.*

This 'law of the excluded third' (which one can think away in semiotic, but not in ontological logic) reads: "Either something is being(the) or it is absolutely nothing. There is no third 'being' (l.8: proof from the absurd): There is absolute disjunction between the 'being' model and the 'nonbeing' model.

These phrases express determinations, not "axiomata" in the semiotic- logistic sense (i.e., arbitrarily predicated statements).

L.16.

Whoever offends against this basic truth -- threefold worded -- “that his is his and nothing else”, undergoes, sooner or later, clearly, his fate (L.14). also says: “the laws of thought are inviolable”, -- not in the sense that they can never be violated (transgressed): we bless that both the absurd and the rhymed can be thought (L. 9); we add, now, that they can also be transformed into life, praxis, “with all its consequences” (truth of destiny).

c.-- the transcendental good. (17/)

1. Again, one paid attention: being is only necessary and sufficient (transcendental) condition of value and appreciation. No more.-- So it was also with the properties ‘one’ and ‘true’. The transcendentalities -- being, one, true, good -- make up the all-encompassing horizon of our lives. ‘Horizon’ here means: condition of possibility.

2. It is claimed, by some, that the term ‘value’, put in place of ‘goodness’, comes from modern appraising economic language. In any case, one can also use the same term ‘value’ in a general, i.e. both - economic and non - appraising way. The fact is that today’s axiologists (value specialists) use the word in this way.

Let us depart, as above, ven the common sense (L.6).

Do not A. Decoene/ A. Staelens, *Paedagogische zielkunde*, (Pedagogical soul science,), Ghent/ Leuven/ Leiden, 1920, 7, say the following? “The faculty of estimation is a sensuous (sense) faculty of knowing, common to animal and man, to,

(i) in material things - compare with (L.12 (below)) what Piaget says about ‘perceptual configurations’,

(ii) perceive the useful or the harmful”. - Indeed, even John the Baptist can observe this: his little dog refuses some feedings and eagerly bites at others - without thinking! Also children - mutatis mutandis, for they are already human, even in the unthinking stage - quickly act similarly!

Both types of unthinking choice (like and dislike) mean, apparently, more than the sensory: in the perceptual configuration (i.e., sensory-experienced reality) they are oriented toward “value” (admittedly, (still strongly) biological).

L. 17.

Rigorously philosophical, Vladimir Solovjev (1853/1900), the first Russian thinker of international stature among the Christian Russian realists, can characterize value feeling, on a higher plane, as follows.

1. “When we distinguish ourselves from what is not ourselves, we triple delineate what we are not:

- (i) Now once it is something that, by nature, is among us;
- (ii) then again it is something similar to us, as of the same nature of being (homogeneous);
- (iii) finally, it is something that, compared to us, is higher.(...)”.

2. Logically, it follows that the conscientious (ethical, moral) relationship, as it should be, will also be threefold.

Ad (i). -- It is clear that we should not take what is situated below us (e.g. an instinctive inclination, insofar as it arises merely from our material nature; think of the pursuit of profit or extravagant sex) as if it were of a higher nature (e.g. when we see in purely instinctive pursuit of profit or equally instinctive sex something “divine”).

Ad (ii).-- Likewise, when confronted with something that we regard as a being just as we are one (e.g., a fellow human being), we treat it as if it were something beneath us (-- think of mistreatment, without reason, of fellow human beings or of racial contempt).-- Nor should we approach the fellow human being as if he/she were a higher being (think of the pop star cult or of dictator idolatry).

Ad (iii).-- Finally, what we know to be higher than ourselves and our equals, we need not knock down without reason (think of authority criticism or atheism).

Conclusion.

One sees, from this brief phenomenology (description of being), that Solovjev situates, i.e. orders, according to actual modes of being (L.7). Yet, now, not instinctively (as in estimation), but morally.

L. 18.

To this Solovjef attaches the three basic ethical attitudes that characterize our conscience.

(1) *First of all, the sense of shame*

(especially morality, i.e. the sense of shame regarding gendered data. Thus he writes: “The sense of morality (...) is, already, (...) an attribute which radically distinguishes man as man from all that is beneath him (think of the animals). No living being (other than man) possesses even the smallest degree of this sense of morality. On the other hand, since time immemorial, the sense of morality has shown itself, yes, that it is susceptible of growth and development, in man.” (*La justification du Bien*, (The justification of the Good,), Paris, 1939, 31).

Yet there is more.

a. One pays attention to what is implied in that fact: this gives that fact an even more profound meaning.

1. The sense of morality is not just an attribute, which, for a behavioral description (from the outside, detaches and delineates man from the rest (complement) of the animal world.

2. The same sense of morality, phenomenologically speaking (from within), proves that man, in fact, detaches and delineates himself in the face of purely material (material) nature as such (in its entirety). - Both the material nature which surrounds him (Ad 1) -- and that which is his own, as a biological being.

b. Solovjef explains (o.c., 31s.).

The fact is that man is embarrassed in his own purely bodily tendencies and functions.

1. This fact reveals one essence : in it man shows that he not only ‘is’ a material being (in the sense of ‘totally coincides with’), but also something else and higher.

2. Reason.

In the psychological act, proper to the sense of morality, the one who is ashamed distances himself from that about which he is ashamed...(…). If, in my merely biological nature, I am ashamed, I prove, by that very fact, that between me (as I) and that biological nature there is no creature identity.(...). A being, who is ashamed in his animal nature, proves to be more than mere animal nature.

L. 19.

(2) *Then, as the second basic attitude, endearment and altruism.*

The true essence of empathy, including compassion, is certainly not the simple identification of ourselves with our fellow human beings, but rather the insight into and recognition of the dignity inherent in our fellow human beings; in particular, their right to:

(i) actual existence, (L.7) and

(ii) a mode of being (L.7), which includes happiness.-- One observes that, with Solovjef, to found ethics (moral philosophy) is to tie in with what ontology teaches us.

(3) *Finally, as the third basic attitude, reverence.*

If - according to Solovjef - we are aware that, above us, there is 'something omnipresent', then the sense of truth demands that we behave towards it as towards something omnipresent above us. Here Solovjef situates, among other things, religiosity.

Conclusion.

Both what common sense sees regarding estimation, and that law a phenomenological analysis, style Solovjef, teaches us regarding the ordering of ethical attitudes to life - shame, endearment, reverence -, is only possible, if, intrinsically in all being(s), something like value (goodness) is at work as a condition of possibility.

General Conclusion.

As, L. 5, promised, we have,

(i) after the definition of the word 'ontology' (metaphysics);

(ii)a. in an initial analysis, clarifies the lemma 'being(s) as an actual mode of being'.

(ii)b. in a second analysis we have clarified the lemma 'being(de) as a horizon of life' (condition of possibility, but on a comprehensive or transcendental level), also, threefold, -- as coherence (the one), as truth, as value), in such a way that we have laid bare the basis both of an order doctrine and of a theory of knowledge and thought (logic) and of an ethics (moral theory).

O. Willmann, Einf., 453, says, with Aristotle, that 'being(de)' is a 'psilon' (an empty word). In other words, to say that everything is 'factual being' is to say 'nothing new'. But it is, as a lemma, guiding for all further research.

What we will establish.

L. 20.

I.B. Harmological Introduction.

Linguistic comment.

Linguists pointed out that the words “alarm”, artist, harmony, aristocrat, Arithmetic, poor, Aryan” have the same semasiological (meaning learning) root, i.e. °ar, - which expresses the idea of “aggregation”.

1. So, too, the Latin word ‘ars’ -- we translate it by skill, art, originally means ‘interlocking’ (to an interlocking or work of art). Or still : the Latin ‘arma’ (armor) is derived from ‘armus’ (shoulder,-- arm; the weapon, after all, is interlocked with the arm and the shoulder). In the same sense, with ‘articulation’ (joint) understands.

2. The ability to put numbers together, whether or not via numbers and/or geometric figures, is what the ancient Greeks called ‘arithmètikè (techne);

3. Very commonly, the same (proper) insertion was called “harmony” -

4. Social: in Sanskrit, the most harmoniously developed are called ‘arya’, ‘noble’ (whence ‘Aryan; ‘Aryan’). The Greek ‘aristos’, the best (noble, ver.noble), is in the compound ‘aristo.craat’

Philosophy and harmology (interlocking).

One of the most famous Paleoputhagoreans (L.2), Archutas of Taranton (-400/-365), expresses the relationship “thinking (wisdom) / ordering (interlocking)” as follows:

“If someone was able to dissolve (‘anulusai’) all generations into one and the same principle (‘archa’, principium, principia) and, starting from that one principle, to reconstitute (‘sun.theinai kai sun.arth.mèsasthai’) then - it seems to me - such a man is the wisest, equal to the one who has all truth as his share,-- equal, too, to the one who takes a stand from which he can know god and all things as god has put them together according to (the model of) the pair of opposites (‘en tai sustoichiai’) and the order (‘kai taxeì’).”

This text is one of the oldest orderly texts.-- So many centuries later, St. Thomas Aquinas (1225/1274), the top figure of Scholasticism, would write, “Sapientis est ordinare” (It is the work of the philosopher (‘sage’) to order”).

L. 21.

Bibliogr. sample:

-- Descamps, *La science de l'ordre (Essai d'harmologie)*, (The science of order (Harmology essay)), in: *Revue Néo- Scolastique*, 1898, 30ss.;

-- Josiah Royce (1855/1916), *Principles of Logic*, New York, 1961 (1912-1), where, o.c., 9, it is explicitly stated that traditional, so-called General or Formal Logic is only a part -- and then a very subordinate part -- of a doctrine, whose name is "the science of order.

-- Franz Schmidt, *Ordnungslehre*, (Order theory), Munich/Basel, 1956,-- in which, o.c., 11, it is said, "The whole metaphysics (ontology) of the West -- from Platon of Athens (-427/-347) to Friedrich Nietzsche (1844/1900) -- allows it to be seen as order science, such that each of its systems occurs as one way among many of order thought."

Note.-- Our reference to some more recent works should not hide the fact that already Aristotle of Stageira, Platon's pupil, in his *Metaphysik (Book Delta)*, a kind of lexicon of orderly basic ideas (a.o. element (it is not G. Cantor (1845/1918), the founder of set theory, who was the first to introduce 'element'!); one and many; same and not-same (the other); difference; equality and inequality; opposite; earlier and later; quantity and quality, relation completeness; boundary; configuration; part and whole, etc.).

According to Schmidt, o.c., 12, *St. Augustine of Tagaste* (+354/+430), the top figure of Patristics (Church Father Thought), was the first, who wrote a deliberate and distinct doctrine of order (at least, in the West): *the ordine* (About Order).

The great saint was then, in +386/387, a baptismal student and on his way to his Christian baptism. In his world-famous work, *De civitate Dei* (On the State of God), he defines order:

"Order is that configuration (aggregation of places), which, to the - by comparison - identical and non-identical (parium dispariumque) data, designates their due place."

One senses, still, the Paleopthagorean, rather geometrising basic idea, namely in 'loca tribuens' (assigning a place, typical of our concept of 'configuration'). Here S. Augustine was inspired by Cicero (-100/-43).

L. 22.

The lemma.

The exposition on organizing will:

(i) bring up the basic operation of all ordering, namely, what is called, classically, the Aristotelian (summative, 'formal') induction or generalization.

(ii) On that collection theory basis, we will be able to talk about:

a. further appl. models (in which the distributive and/or collective ordering types are already, unspokenly checked);

b. the two fundamental harmological structures (units), as already mentioned (the distributive and the collective);

c. the comparative (comparative) method;

d. the lemmatic-analytic method.

B.(i).1.-- The sumative induction.

1. As a 'model' (i.e. image) we may take the inventory, -- and well, in its broadest sense. 'Inventory' is

(i) the whole (the total, summering (sum), collection)

(ii) of the objects present somewhere (the common property defines

a. the mode of being (L.7) and

b. the factuality (L.7) of elements (here; objects), which:

a. 'somewhere' (place making = being)

b. 'present' (existence as attainable = factuality).

So much for the regulatory model.

2. As (appl.) models are listed in *Van Dale, Groot Woordenboek der Nederlandse Taal*, (Large Dictionary of the Dutch Language), Utr./Antw., 1982-10, 1066v, estate description,-- the list (i.e. sum) of the 'pieces' (elements) of a 'file' (body of texts), which are submitted to the judge, etc.

Bibl. sample.

-- A. Lalande, *Vocabulaire technique et critique de la philosophie*, (Technical and critical vocabulary of philosophy), Paris, 1968-10, 506/509;

-- P. Foulquié/R. Saint - Jean, *Dictionnaire de la langue philosophique*, (Dictionary of the philosophical language.), Paris, 1969-2, 357s.;

-- John Stuart Mill, *A System of Logic* (1843), 3: 2;

-- Father I.M. Bochenski, *Philosophical methods in modern science*, Utr./ Antw., 1961, 146;

-- R. Verhulst et al, *Mathematical curriculum*, 1(Textbook), Antw./ A'm, 1980-3, 210;

-- Ch. Lahr, *S.J Cours de philosophie*, I (Philosophy course), (*Psychology - Logique*), 1933-27, 595.

L. 23.

(A). 1. *Two appl. Models.*

(I) Take a day-to-day teaching experience.

As the structure concatenation method (L.20) of our description, we take the reduction (L.4 (method)).

(A) *Observation.*

a. The fact (L. 12). --

The classifier has, just now, improved a bunch of homework.

b. The requested (sought) L.12).-- He wants to know if he has improved all of them.

(B) *Answer.*

(B)I. Regressive (= abductive) reduction.

Since he remembers not skipping anything, he assumes (= hypothesis) that he did improve them, all.

(B)II. Progressive reduction (= deductive ed.).

Starting from the impression (= lemma) that he has improved them all, he deduces that, if he **(i)** checks them all **(ii)** one by one (trial, testing, peirastic truth (l.14) for their improvedness (actual beingness (L.7)), i.e. common property), he will then have verified certainty.

(B)III. peirastic reduction (= full red.).

He checks, one by one, (ii) all the copies.

(B)IV. evaluative reduction.

Now he possesses absolute certainty ('absolute', because verified). His value - judgment (L.16vv.) reads : "I have fulfilled my improvement task well!".

Reason: he summarizes a multitude of verified facts (homework improvements) into one unit (summering).

Especially in the evaluative reduction he acquires new information: he has improved them all; his task is completely finished; in front of him there is the set (= 'gestalt') of improved work.

(II) Note, before continuing the analysis of our lemma (summative induction), that Ad (B) III (peirastic ed.) is decisive (relevant, decisive) as the first step concerning summering: one cannot make the sum, if one has not, first, one by one, checked (verified).

Note: that verification is an act (operation). The operative (= machining nature) J. St. Mill puts on thick in his appl. mod.

L. 24.

First, however, two definitions.

(1). -- What the ancient Greeks called ‘kuklos’ (cycle, circuit), can be described as a line such that all its points, once passed through one by one, make the beginning point coincide with the end point. In other words, such a summering (aggregation) that the beginning and end form a single point.

(2).-- ‘Operational’ we call, for the time being, a prescription for a behavior as the antecedent (AnteCeDens (the Latin word for ‘omen’: ACD) of its own consequent (ConSeQuens (idem for ‘sequel’: CSQ)).

In short: (i) ‘do something’ (ACD), (ii) ‘and ye shall have the result (CSQ)!

John Stuart Mill (1806/1873), *A System of Logic* (1843), a famous work of logic, provides an operational summering.

(A) Observation.

a. Given: a landscape.

b. Asked: provide operational evidence of the fact that said landscape is an island.

(B) Response (L.12).

(B)I.-- Regressive (abd.) ed.

“All landscapes, explorable, by water, in the form of a loop road, are islands.-- If said landscape is an island, then everyone can go around it, by water, in the form of a loop road.” (hypothesis).

(B)II.-- Progressive (deduct.) ed.

“If I take a boat, with which I make a round trip such that, on water, I perform a loop route around said landscape (indeed : operationally) then I provide proof indeed that said landscape is actually (actual being (L.7)) an island.”

He who speaks in this way designs an experiment (trial by ordeal). His design is a deduction, based on a general (universally valid) hypothesis (‘all landscapes...’). “If all (loopy circumnavigable landscapes), then this (loopy circumnavigable landscape) here-and-now”. (From the universal set to the singular member of this set).

(B)III.-- Peirastic (full) red.

I perform, in actuality, the circumnavigation.-- By that performance I show -- not merely by reasoning (which designs its model), but by reasoned performance of the designed experiment -- that, in actuality, the reasoning ‘fits’ with reality (his(de), i.e. actual being (L.7)) (i.e. point - for - point agrees).

(B)IV.-- Evaluation

(evident).

L. 25.

Note.-- One sees that, in both appl. models, the “answer” (the actual reductive reasoning) is structured:

(A) *Perception* (cf. Heidegger’s idea of truth: acquaintance (encounter); L.13);

(B) *Pragmatic* (better: peirastic) *truth*

concerning what is in the first acquaintance (encounter) as a lemma (i.e. rather vague and imprecise). In other words, in the brief outline of the various truths, a reductive structure (arrangement) is hidden.

(A).2. *Regulatory model*

We are going to formulate the general idea of “summative induction” in two different ways.

1 -- *Starting point.*

Intuitively’ (mathematicians and logicians like to say ‘naively’) the common mind quickly sees what, first of all, summative induction is and, secondly, what type of factuality (L.7) it represents: if one brings together all the parts of a whole (all the elements of a collection), then one has that whole (that collection). - Or still: if all parts (elements) are there, separately, then they are there, also, collectively.

2.a. *Initial wording.*

Fr. Bochenski, o.c., 146, formulates as follows.

(i) “Are g_1, g_2, \dots, g_n . elements of the class (*note.--* ‘Class’ is an idea related to collection, totality, sum, meaning) of the given g and are all its elements (i.e.: no other element (complementation; L.7) occurs - apart from these elements) and if (after separate verification) the attribute (common property) k accrues to g_1, g_2, \dots, g_n , then k accrues to all (summed) elements of that class’.

Mathematically; “if g_1k, g_2k, \dots, g_nk , then $k(g_1, g_2, \dots, g_n)$ ”. Which, clearly, established for the first time in our analysis, indicates a distributive structure.

The if - sense does not differ, in a certain sense, from the then - sense! And yet: the ‘gestalt’ (form) is different. the totality as totality comes out better (way of being).

Consequence: summative induction is also rightly called ‘formative’ (formal) induction ‘formal’ in the sense of ‘Gestalt-creating’.

L. 26.

Note:-- On the comparative nature of summering.

Consider an application of the distributive summering formula (L.25);

so e.g.: $5.10 + 5.3 + 5.2 + 5.1 = 5 (10 + 3 + 2 + 1)$;

letter math: $a.x + a.y + a.z + a.r = a (x + y + z + r)$.

Only by comparing the first, one by one named, digits or letters, i.e. testing for their similarities (identity) and differences (non-identity, one perceives the distributive (immediately, the summative) structure.

2.b. Second wording.

We can also formulate the regulative - model in the form of a capstone (= syllogism).

M(aior) = preposition 1 (regulatory model).

“if k (kentrek, common property), for **(i)** all data g **(ii)** is separately, verified”, then k is, immediately, verified for the sum (totality, collection, whole) of all g.

m(inor) = preposition 2 (applicative model).

Well, k is, for all data g and for each individually verified.

C(onclusio) = Nazin.

Thus, k is, immediately, verified for the sum of the data g”.

Again: reductively (i.e. emphasizing the peirastic (tested truth (L.14)), the minor (second preposition) is decisive: the hypothesis with deductive experiment of the first preposition (Maior) is checked for its effective (verified) truth. The Conclusio is only the evaluation.

Compare with the reductive structure L.23/24.

(B). Cultural-historical review (verification).

To make up a theory, even starting from its applications (appl. mod.), may be an easy work.-- Yet testing (always the peirastic truth (L.14)) is always desirable. One compares one's own ideas with those of earlier generations.

L. 27.

1.-- Summering, primitive archaic view.

An appl. model.-- Verhulst et al, *Mathematical Learning Package*, cites the determinations of German physician and naturalist M.H.K. Lichtenstein (1780/1857).

1. This one stayed, for quite some time, in Southern Africa, among others with the Xosa (Negro-African people there (= Transvaal)).

(i) “Although they have counting words, they rarely use them.

a. Few, among them, get counting beyond ten.

b. Most cannot even name this number.

(ii) Compared to this Xosa, certain California tribes were even more limited: +/- 1850, a number greater than six was called “very many.

2. Notwithstanding this - to our Enlightened Western methods of thought and calculation - “backward” state of affairs, Lichtenstein establishes the following facts.

(1) The Xosa possess a summering type of their own.

If herds of four to five hundred cattle are driven home, the owner notices, immediately,

a. whether animals are missing (factuality: 1.7)

b.1. how much and

b2. which are correctly missing (being mode (L.7)).

We, Western enlightened ones, will not imitate this so easily! It is, here, about summations (= both one by one and all together)! This type of summative induction seems rather mantic (paranormal seer).

(2). In West Africa, among Negro Africans, again, summative induction proceeds in the following manner.

The chief delivers to the village heads a set of sticks such that, if, from that day forward, all days separately, just one stick is taken away, then, finally, the meeting day dawns, when all the sticks together are taken away.

a. A pure appl. model of summering; every day one, all together!

b. And, then, by projection : one pictures (projects) the sum in a pair of sticks such that, (i) to each stick, (ii) exactly one countdown answers (mathematicians, style Bourbaki, speak of ‘bi.jection’ (addition)).

2.-- Summering, antique, resp. ‘classical’ seen.

What archaic people did in their “primitive” (paranormal or non-paranormal) ways, that redubbed, especially since the ancient Greeks, thinkers in “rational” terms).

L. 28.

2.A.-- The ancient, mid-century and modern views on the subject.

First, the ancient Greek, starting point of the rest.

a. -- Aristotle of Stageira (-384/-322),

in his *First Analytic* 2:23, dealt with summative induction.

Fr. Lahr, Logique, 591, quotes:

1. Man, the horse and the mule live

2. Well, they are the only type of “beings - without - bile

3. Thus, all living “creatures - without - bile” live long.

Here, in this appl. model, summering tucks itself away behind “only” (“unique”) and “all,” as well as, behind the enumeration (enumerative summering) of species.

b. -- The Scholastic (800/1450),

the Church’s medieval philosophy, spoke, in her Church Latin, of ‘inductio per enumerationem simplicem’ (induction or generalization by simple enumeration. Cf. L.22 (inventory)).

c. -- Rene Descartes (Lat.: Cartesius; 1596/1650),

the founder of modern philosophy, assumes, in the traditional sense, that induction can be done ‘par dénombremens entiers’ (complete additions, - inventories.

d. -- Antoine II Arnauld (1612/1694)/ **Pierre Nicole** (1625/1695),

Logique de Port-Royal (1662), 3: 19; 4: 6, speak of ‘induction entiere’ (generalization. ‘Complete’ induction is also used).-- The logicians of Port - Royal describe complete induction as follows: “

(1) the information (insights, intelligence) provided by the major and minor together,

(2) returns in summary in the *Conclusio*”. (cf. L. 26).

In other words, (1) what the two prepositional phrases teach, (2) that results, summarized in the after sentence of the syllogism.

2.B. Current views (28/30)

a. -- Father Ch. Lahr, S.J., Logique, 595 (591), calls summative induction, simply, “aristotelian induction.” or also : “formal induction” (L.25 (below)).

His description:

“(1) What is said of each member individually, (2) that is said of the collection (which he calls, in Middle Ages language, ‘mere logical whole’).”

b. -- Georg cantor (1845/1918), the founder of the “formalized” set theory, which he published, from 1874 to 1897.

L. 29.

However, his contemporaries were so closed to his new approach to mathematics that Cantor, deeply disappointed, finally died in a psychiatric clinic in Halle. Which proves that mathematics, from a cultural-historical point of view, is more than pure reasoning!

1. In 1895 *Cantor*, describing rather than defining strictly mathematically, formulated the idea of ‘collection’ (ensemble, set, menge) as follows: “By ‘collection’ we mean any summation (L.25) into a whole (L 22: inventory as one type) of certain, well-defined objects either of our contemplation or of our thought (which are called the ‘elements’ of the collection).” (*Beiträge zur Begründung der transfiniten Mengenlehre*), (Contributions to the foundation of transfinite set theory).

2. In other words: the summative induction (each data by itself, if verified under view of trait k , -- all data together exhibit k) returns here:

(i) certain, well-defined objects, called ‘elements’;

(ii) ‘summed up to a whole’ (Jede Zusammenfassung zu einem Ganzen), (Any summary to a whole).

Conclusion: There is form equality (model identity) between the “sum” of summative induction and the “summary to a whole” of (cantorially conceived) collection.

Note.-- *E. Bouqué, De algebra der verzamelingen*, (The algebra of sets,), Ghent, 1967, from whom we derive the above description of Cantor, says, o.c., 13, that, in two ways, of each ‘thing’ it can be determined (verified) whether it belongs, yes or no, to the collection about which one is talking:

a. by enumeration of all the elements (L.28);

b. by specifying a characteristic or feature (mathematicians call this “abstraction principle”) (L.25:k).

As one can see, throughout the history of the idea of summative induction, we have seen the two verification criteria applied.

In fact, there are two - three characteristics ‘ k ’, basis of full enumeration.

1. The fact that more than one given g is present in the field of attention of consciousness;

Bouqué speaks of “a man, a book and a building” (o.c.,12);

L. 30.

a. In themselves they do not show any connection (neither the connection of resemblance nor the connection of coherence) - unless - but the proposer does not mention this - man, with a book, is in the building.

b. Yet, expressed antiquely Greek, they are ‘one’ (i.e. interconnected (L.10vv.)), i.e. as objects of my attention, With E. Husserl (1659/1938), the phenomenologist, and his teacher Franz Brentano (1838/1917), the leader of the Austrian School of Philosophy, we can call this type of ‘unification’ (collection, summering) ‘intentional’: our conscious attention, after all, is ‘intentio’ (as the Scholasticians said), i.e. directed towards (something L.7; 9/10).

Behold the first type of k, trait (characteristic feature), basis of collecting.

2.a. *The fact that more than one data is interconnected, in itself, by similarity;*
so e.g. all the ants of an ant colony.

2.b. *The fact that more than one piece of data is interconnected, in itself, by coherence (connexity);*

E.g. a human being, in a building, reads a book (merely local or local coherence); similarly, an ant’s nest: the nest is the enclosure, structured by the ants, who lead a strong collective life (local as well as biological coherence). In both cases - objective similarity and objective coherence (connexity) - in addition to intentional connection (as objects of attention or ‘intentio’), there is also connection in itself, in the data itself.

Consequence: the trait k is, in addition to being intentional, “objective.

(C). *Logical classification of summative induction.*

Usually one speaks, about induction, at least, without adding the type name. We are not going to do this.

G. Thinès/ A. Lempereur, Dict gén. D. sciences. hum., Paris, 1975, 495, distinguishes, clearly there, summative induction from amplificative (‘amplifiante’) induction. The authors say that it is also called ‘Baconian induction’ (after Francis Bacon (or Verulam) (1561/1626), the man of causal induction). As a description, We state: scientific procedure, which:

(1) relying on a finite set of verified factual modes of being (L.7) = what summative induction is

L. 31.

(2) generalizes (extrapolates) to the belonging infinite collection of possible verifiable factual modes of being (L.7);

a. It is this ‘extrapolation’, which makes the difference with respect to summative induction: the name ‘extrapolating induction’ seems to us, therefore, the most appropriate name.

‘Extrapolate’, after all, means, to cross the boundary of the verified, for whatever (valid, invalid) reason.

“The amplifying induction (according to Thinès, o.c. 495) exceeds the known the lived to predict, immediately (meant: without first verifying), a future state of affairs.”

b. This implies that extrapolating induction is, simultaneously, abducting, hypothesis-formulating induction:

(i) from the established actual modes of being (summative),

(ii) one extrapolates, i.e. ‘decides’ on, endlessly repeatable, future determinable actual modes of being of the same nature of being (or ‘actual mode of being’).

In other words, the summatively determined factual mode of being functions as a lemma (L.6), which, thanks to further ‘analysis’ (determinable factual modes of being), will become clearer as true.

c. Expressed still differently, summative induction holds as a sample (‘sampling, Stichprobe, random sample) taken in a collection of essentially similar phenomena.

If it is thus conceived, it turns into a very likely verifiable hypothesis (abduction), i.e. it becomes, literally, amplification, extrapolation.

Conclusion.

In contrast to what we, above, have done, i.e., to evaluate summative induction very highly, it has, traditionally, been scorned more. However, the unmistakable connection with the amplificative induction so highly valued - it is the verified heart of it - should have called for a different evaluation long ago,--not to mention the idea of ‘collection’ contained in it, obviously and inductively.

L, 32,

Schematic Summary.

Again, cast in reductive reasoning form (L.12; 26.).

(A) Observation.

a. Given.

On the one hand, a dose of guano (i.e., a phosphate attested by the skeletons and excrement and of fish and of sea birds, living on cliffs and preferably uninhabited islands especially in Peru; from guano one extracts phosphorus (P, a reactive element (a solid non-metal)) from group V of the periodic table).

On the other hand, the appropriate equipment to produce, from guano, phosphorus.

b. Requested.

The structure of the logical - consistent evidence that all guano releases P,

(B) Answer = reduction.

This can be summarized, with Jan Lukasiewicz (1878/1956), from the Polish School of Lwow (= Lemberg) - school of thought analysis founded by Twardowski (1866/...) as follows:

M = VZ 1: If all quantities of guano give off P, then also these quantities h_1, h_2, \dots, h_n here and now.

m = VZ 2: Well, these quantities h_1, h_2, \dots, h_n here and now yield, actually, experimentally, verified, P.

c = NZ: Thus, all quantities of guano give off P.

(Cfr I.M. Bochenski, *Philosophical Methods*, 94v.; 126).

Note.-- Like L.26, but now more clearly, the thought-analytic scheme appears:

M=VZ 1: If general rule (universal set, regulative model, then (all) applications (subsets or members, examples, applicative models).

m= VZ 2: Well, applications (h_1, h_2, \dots, h_n).

C= NZ Thus, general rule.

In this syllogism one sees that:

(i) hides the summative induction in the minor (= VZ 2);

(ii) the amplifying (lemmatic, extrapolating) induction is hidden in the conclusion (NZ): one pretends that also the unverified quantities will actually be verified,

In other words, in school language: **(i)** from the applications **(ii)** one decides on the rule!

L. 33.

B.(I).2.-- introduction to comparative ordering.

a. Summative induction (L.22/32) is a.k.a. the foundation: one who works methodically first and foremost takes stock. Only then can he proceed.

b. Summarize, once again:

(i) summative induction is: “if all separately, then all together”;

(ii) amplifying (lemmatic) inducing is: “if at least one (some), then all”. With reference to the distributive structure inherent in summative induction, reference was made to the comparative actuality (L.26 (top)), which underlies it. Now we analyze that comparison itself.

A.-- The lemma. (33/42)

(L.6; 32).up: *L. Davillé, La comparaison*, XXVII (1913), 23, says:

“(a) **Instead** of dealing with individual cases (understand elements, moments,-- subsets), when it comes to dealing with phenomena or objects,

(b) the comparative method seeks to highlight collections (‘ensembles’), **(i)** either similar **(ii)** or complementary”.

The summative and the amplificational (lemmatic) inductions have taught us what Davillé means by “ensembles” (L.29): they are, after all, central on collection;--and in an operational way (L.23).

But the idea of ‘collection’ - if it is to become more operational, in terms of comparison - must, as a matter of urgency, be defined more precisely. We shall do this twofold: first, by means of the brief analyses of the appl. models of comparison, later on; then, by means of an explicit consideration of the structures of comparison themselves.

The lemma.

Apart from the fact that methodical comparison means collections (the comparatives ‘intentio’ (L.30 (direction of attention))), there is the pairing ‘inward and outward comparison’, which, mentioned in passing, Davillé already points out.

1. The distinction ‘factual mode of being/complement of being (1.7) is the basis of it: the internal comparison, by dissection (analysis) into elements (constituents), remains within the factual mode of being; the external one stands still, also dissecting, but seen from the factual mode of being in question, at the complement of being (with what, in it, is related (or the opposite) to the considered mode of being.

L. 34.

2. One provisionally undeveloped application.

a. One may know what, in Germany, at the end of the past century, 'Das Grossische Prinzip' (the Grossian principle) was called. In his *Die Anfänge der Kunst*, (The beginnings of art), Freib.i.Br., 1894.

More so, in his *Die Formen der Familie und die Formen der Wirt(h)schaft*, (The forms of the family and the forms of the economy), Fr.i.Br., 1896, E. Grosse (1862/1927) defends - in a non-Marxist way, by the way - the following heuristic principle (*note* - 'Heuristic means: "lemmatic", setting one on the way when investigating):

"Economic activity (1) is the life center of every cultural whole; (2) is its own antecedent (ACD L.24) ('influences') -- in the most profound and irresistible way of the other (complement: 1.7) cultural factors."

E. Grosse - apparently influenced by earlier statements ('intertextually' one might say, with Julia Kristeva) - explains his thesis with the following, somewhat challenging application: "Wenn man weiss was ein Volk isst, so weiss man auch was es ist" (If I know what a people eats, one also knows what a people is).

b. W. Koppers, S.V.D., *Die materiell-wirtschaftliche Seite der Kulturentwicklung*, (The material-economic side of cultural development), in: *Settimana Internazionale di Etnologia Religiosa* (IVa Sessione: Milano (17/ 25.09.1925)), Paris, 1926, 109, gives, in the spirit, incidentally, of Father W. Schmidt, S.V.D. (1868/1954), whom Grosse echo, following applicative model.

"(a) = In general we see how, in modern Europe, the legal position of women is undergoing a serious change. Thus, today (1925), women often have the right to vote, the right to university studies, the right to a free choice of career (...), which, a few decades ago, were non-existent for them.

Who would, now, misunderstand or, even, deny that the modern,-- in particular: the capitalist-economy-development, in the first place, is to be blamed for that attribution? The internal comparison: Koppers stays within the present cultural context (main collection); therein he distinguishes, at least, two subsets:

L, 35.

- a. the legal status of women;
- b. the economy.

In other words, Koppers compares, internally, the sets of culture (woman, economy) within culture. - One says, now, also, since the more recent system or systems theory, that woman and economy are two subsystems, within one supersystem.

Then the text continues.

“(b) Now, however, what is lawful for the present time can only be fair for the archaic time in human development. After all, many data indicate that, once upon a time, in substantially the same way, out of well-defined economic states, the mother right arose.”

1. The author is talking, here, about maternal law or matriarchy (a legal system, in which, in well-defined early civilizations especially, authority rests, essentially, with the woman, especially with the mother of the family and the family).

2. However, note: the proposer compares, now, externally, the modern fact with an archaic situation; he sees a similar possibility, i.e., the economy, according to Grosse’s model of culture, as the reason (ACD (antecedent, sign)) of women’s legal status (CSQ (consequent, continued)).

However, now, he externally compares the modern main collection, with respect to those two subsets, with the archaic main collection, with respect to those two subsets. (L.24: ACD/CSQ).

The lemma.

We now have to abstract some structures, which govern the above internal and external comparison of sets. We outline them in differentials, among other things.

- a. The identitive link.

Identity and non-identity are, here the criterion :

totalidentical (overall the same)	partly identical (partially the same) (analog, similar)	total non-identical (overall different)
--------------------------------------	---	--

Thus, one can see that, regarding the relation “woman/economy,” modern and archaic culture are part-identical (analogous).

L. 36.

Cultural History Verification.

(i) Antiquity:

the Paleoputhagoreans (-550/-300) worked with a type of ‘sustoichia’ (systechy, pair of opposites), namely ‘tautotès’ (identitas, identity)/ ‘heterotès’ (alteritas ‘distinction’ (non-identity, difference)). (Cfr *O. Willmann, Gesch. d. Id.*, I,273).

Platon of Athens (-427/-347), the founder of Academic philosophy, and Aristotle of Stageira (-384/-322), the founder of Peripatetic philosophy, worked, likewise, with the same pair of opposites.

(ii) Scholasticism (800/1450),

ecclesiastical-medieval philosophy, strongly influenced by both the Puthagorean and the Platonic-Academic and the Aristotelian-Peripatetic philosophies, thought on in the same style.

(iii) Modern - Enlightened philosophy

R. Descartes (1596/1650), the founder of modern thought, held that “(most) knowledge is attained by the comparison of at least two ‘things’ (choses): (Regulae ad directionem ingenii, xiv);

More so, “one must analyze in terms of identity and difference (en termes d’identité et de différence), of measurement and order(s).” (Thus *M. Foucault (1926/1984), Les mots et les choses (Une archéologie des sciences humaines)*, (Words and Things (An Archaeology of the Humanities)), Paris, 1966, 66, where this structuralist summarizes Descartes’ method).

Yet David Hume (1711/1776), the empiricist-Enlightened mind, in his associationist interpretation of comparison, also stands for that:

- (i)** similarity and contiguity (appurtenances, belts, contacts) and
- (ii)** cause-and-effect relationships allow us to “collect” (associate) elements.

Continuing in the line of Hume, yet typically French (en du intellectuel), Auguste Comte (1798/1857), the founder of positive philosophy (i.e., philosophy based on professional science), also thinks that facts, as elements, are associated according to **(i)** similarity and **(ii)** succession.

Bertrand Russell (1872/1970), the champion of human rights, also thinks in this same tradition.

Conclusion.

This little history of ideas shows that, with the pairing of “identity/non-identity (difference),” we are engaging in a solid tradition.

L. 37

b. *The more than merely identifiable connections.*

The essence of all other connections is identitive (i.e., has, or does not have, an identical character).-- We put some of them under the microscope.

b.1. As L. 29v, noted, all collections are only possible in virtue of intentional connexity: the human being, the book and the building of the applicative model, there, are identical, viz. under the point of view of 'being in the focus of attention' (actual mode of being), yet not complete. They are, under that point of view, namely, the intentional, part-identical.

b.2. Likewise the objective connections, basis of collection: so all the ants (L.30) of the anthill are, well, as singulars, different (non-identical), yet, as 'specimens' of the same species (specific), they are identical. Do we say that, specifically, they are part-identical. So, too, (L.30) the ants as a home in and around the nest: though existing apart, as mutually independent and freely living and moving, yet they belong to one and the same 'colony'; from the point of view of local and biological coherence, they are part-identical.

So, likewise, (L.33vv.) the complementary connection (in-and-outward): I consider, first, the (legal) position of women (internal); then, I confront them with the cultural context (Grossian, i.a., i.e. with the economic context), i.e. with the 'rest' (complement) (outward).

Now, if there is coherence (i.e. of the type acd/csq (L.24)) between the (internally viewed) object (the female position) and the (externally viewed complement, then both are, from the point of view of connexity (coherence-relationship), part-identical.

One sees that, here, is already an application of the second type of connection, i.e. the connexion.

a.- By the way, one recognizes, in the complementary connection, the age-old pairing 'part/whole', however, in such a way that the whole, starting from a part, is divided into two (dichotomy).

L. 38.

b. One recognizes, in every connection (connexity) the same ancient model ‘part/whole’, thus the ants are the ‘parts’ (moments, because living-moving elements) of the whole, the colony.

c. One recognizes, also, in the intentional coherence, the same couple ‘part/whole’: the whole is the view itself, - within which the ‘parts’ (take the man, the book, the building) are ‘situated’, just as one can say that the ants are situated within the whole of the colony and that the considered part (e.g. the position of the woman), in the complement (division), is, with the complement, incidentally, ‘situated’ within the whole.

c. *Distributive and collective structure.*

a. L.26 (distributive summation formula, based on ‘identitive’ comparison, by the way) already taught us that identitive data show, as it were, one and the same trait (k: L.2 spread over a multitude of data (L.10v.; esp. L.10: bottom). All identitive structuring (comparison) gives, as a result, such a spread of one and the same actual being (L.7).

b. What stands out, within the systechy (L.36) ‘part/ whole: is that:

(i) the identitive structure is, in any case, present (all moments, elements, ‘parts’, after all, show one and the same trait, namely belonging (for the part) (or encompassing (for the whole)) to one and the same totality (whole).

(ii) The collective structure, however, shows itself in the fact that they, only, collectively, make up the whole (totality),--whether they are, mutually, identical or different (non-identical).

That type of summering (L.22vv.), namely that all data show one and the same trait k (distributive), however in such a way that they (can) only show this k collectively, if they are to compose a totality, is to be called ‘collective structure’.

Conclusion:

in all cases distributive, in some cases collective,-- the structure, regarding comparison, is always there.

L. 39.

Cultural History Verification.

a. That both distributive and collective structures - within ancient Greek (and, therefore, within Western) thought, did play a role, will, further, gradually become more and more apparent; particularly, when systems theory comes up.

b. Meanwhile, just the semasiological (meaning theoretic) sketch of the Greek word 'su.stêma' (literally: assembly; system, system). Curiously, the ancient Greeks probably did not make such a sharp distinction between 'collection' (i.e. purely distributive structure) and 'system' (system: both distributive and collective structure). Let us see.

1.-- Physical.

Something like a bag of gems - the being together (i.e., both being collected and surrounded) of more than one datum within the space (but, then, contiguous space) of something - the ancient Hellenes called 'sustêma'.

2. -- Biological.

The body of plant, animal, man - as a total, as a mass, also, of its parts - was called 'sustêma'.

For example, Aristotle of Stageira (-384/-322) speaks of "to holon sustêma tou somatos" (the whole assembly of the body).

3.-- Culturological.

3a. Sociological: any group or grouping of people (crowd;-- association, guild, college, league) was called "sustêma". -

3b. Legal: a constitution - the summary and arrangement of institutions - was called 'sustêma';

3c. Doctrinal: a philosophical or other system of thought - the interconnection of doctrines - was called 'sustêma';

3d. Poetic resp. musical

(think of the 'choreia', i.e. the unity of dance, music and song (text), among the ancient Greeks): a rhyming verse, a musical chord - as an ordered whole - was called 'sustêma'!

c. Compare, with this, what *D. Nauta, Logic and model*, Bussum, 1570, 173v., says of 'system', in present systemic thinking. One distinguishes, now, also, three levels of 'system':

L. 40.

1.-- ‘Concrete’ (understand: physical, resp. biological or culturological) systems:

Thus, a (physical) crystal; a (biological) organism, a (culturological) usine;-- in ‘concrete’ systems, we are concerned with ‘concrete’ relations, as, e.g., the binding energy of an atom (o.c.,175).

2.-- ‘Conceptual’ systems:

so a set of points, a system of numbers, a diagram, an atomic model;-- ‘comprehensible’ systems occur -- says the author -- “in a theory, on paper, as abstractions, constructions of the human mind”; in these systems the relations are ‘comprehensible’ (o.c.,175);-- compare -- antique Greek -- with ‘doctrinal’ systems.

3.-- ‘Formal’ or ‘language systems’:

Thus the logistics (calculus) of judgments (propositions), a programming language for computers;-- any language, in which:

(i) of the physical (understand : ‘concrete’ in the language of D. Nauta) realities

(ii) a **a.** conceptual (conceptual) reconstruction **b.** described symbolically (i.e., in a coherent sign system), is a ‘formal’ or ‘linguistic’ system; in such a system, the relations are ‘formal’ or, as the proposer defines, ‘syntactic’ relations (‘syntax’ is the description of the interrelationships of signs within a sign language,-- therein distinct from ‘semantics’ (meaning theory) and ‘pragmatics’ (use value theory)).

Note:-- Although the ancient Greeks did not have an explicit ‘formalization’, as we do now, nevertheless their logic and e.g. axiomatic-deductive geometry (Eukleides of Alexandria (-323/-383)), somewhat, anticipated current ‘formalizations’.

In any case: they knew very well the two first layers of current systems theory, the “concrete” physical, biological, culturological) and the “conceptual” (understanding). They remain - again, here - the pedestal.

So much for the second sketchy, yet sufficiently relevant history (see L.35v.), which engages us in a solid and still “living” tradition of thought.

L. 41.

Note: -- It has, perhaps, been noted that D. Nauta describes systems by means of “relations.

Indeed, o.c.,175, he says that “he does not further define the term ‘relation’ (relationship), but starts from its ‘intuitive’ understanding (*note* -- ‘intuitive’ in the sense of ‘lemmatic’). This -- called ‘primitive’ (because not defined) -- term ‘relation’ is used by the author to describe ‘structure’: “the structure (of a system) -- according to Nauta - - is the total (L.22vv.: summative induction), the whole network, of relations between the elements (of that system)” (ibidem). One sees the order in the language: **(i)** relation, **(ii)** structure.

And now: ‘system’. “A system is a collection with a structure.” (ibid.).

Conclusion: **(1)** relationship; **(2)** structure; **(3)** system.

-- One can also do it ontologically (L.7):

(i) Actual mode of being;

(ii) more than one actual mode of being, which -- as actual modes of being -- exhibit a partial identity, are ‘involved’ (related) to each other;

(iii) if that relationship (partial identity) forms a network, then one speaks of structure.

General conclusion.-

From L. 33vv, we talk about comparative ordering.

a. And this as a lemma, i.e. as a working hypothesis, which, thanks to analysis (L.6), gradually becomes clearer. Or, if one wishes: as a regressive (abductive) reduction (= lemma), which, by means of progressive (deductive) and peirastic (testing) reduction (= analysis) is clarified. (L.12, 23vv.).

b. Summary:

1. To compare is to collect (L.33).

2. To compare is to dissect internally and externally (L.33/35).

3. To compare is to collectively, inwardly and outwardly decompose, o.g. (comparative structures (especially the identitive structure) (L.35/41).

The lemma.

Now that we possess the basic lemma, we can design the analysis, likewise (lemmatic determination).

With Father Pinard de la Boullaye, S.J., L'étude comparée des religions (Essai critique), II (Ses méthodes), (S.J., The comparative study of religions (Critical essay), II (Its methods)), Paris, 1929-3, 48, we can, already, say:

(1).-- Diachronic.

The comparison of the order of states (of something, i.e. life, for example) leads to the idea of ‘organic evolution’.

L. 42

2.a. Synchronous

Experimental-Scientific. The comparison of influences undergone (ACD = influence (L. 24 ; 34v.)) and changes (CSQ = change (L. 24 ; 34v.)) proves its usefulness, if it is experimental (L.32; appl. mod.: 11/13).

This is the case for phenomena, which can be repeated randomly by the researcher.”

(2).b. Synchronous.

non-experimental-scientific. “The comparison of different cultural forms that have arisen in the course of history replaces experimentation when it comes to phenomena that cannot be repeated at will. For example, institutions that have disappeared”.

This outlines, lemmatically, the far-reaching domain of application of the comparative method: it is, indeed, as will be shown, far-reaching.

Bibliogr. sample.

-- In addition to named works or articles, reference is made to:

-- *L. Davillé, La comparaison et la méthode comparative (en particulier, dans les études historiques)*, (Comparison and comparative method (especially in historical studies)), in: *Revue de synthèse historique*, XXVII (1913): 4/33: 217/257; XXVIII (1914): 201/229;

-- *H. Pinard de la Boullay, L' étude comparée des religions (Essai critique)*, II (*Ses méthodes*), (The comparative study of religions (Critical essay), II (Its methods)), Paris, 1929-3, 40/87 (*Méthode comparative*),-- which remains one of the most thorough studies on the subject;

-- *M. Foucault, Les mots et les choses (Une archéologie des sciences humaines)*, (Words and Things (An Archaeology of the Humanities)), Paris, 1966, 66ss, (*Descartes' theory of order*),

B.-- The analysis (appl. Mod).

We dwell, now, on a limited number of applications of the: comparative method.

1.-- The measuring equation.

L. Davillé, a.c. XXVII (1913), 20, says: “The comparison can be either direct or indirect.

a. - One can, viz, confront at least two data directly with each other, without a third data.

b. - Should one, however, in order to compare them, introduce at least a third data, one has to do with indirect comparison. That calculated, occurs whenever a common measure is used”.

L. 43.

H. van Praag, Measuring and comparing, Hilversum, 1968, writes in this regard: “As the French mathematician Henri Poincaré (1854/1912) has shown, :

- (a) the choice of measure a subjective one,
- (b) the use of the once chosen measure an objective (L.29v.) given”.

Appl. mod.

(a) It depends on my free choice whether I measure the distance travelled in meters, yards (three feet = 0.9144 m., since 01.07.1959) or toises (une toise, vadem (six feet = 1.95 m.)).

(b) But what our ‘I’ decides, has to do with the objective length (traveled way): the result will, in other terms (meters, yards, vadem), reflect exactly the same actual being (L.7). Or still: every other human being will be able to verify my result (L.23v.). The measurement result will, in itself, be identical.

Already *Eukleides of Alexandria* (-323/ -283), in his *Stoicheia* (Elements), cites a first axiom: “The data, which are identical with the same third, are mutually identical”.

Expressed with letters: If A is equal to B and B is equal to C, then A is equal to C. (*L. Brunschvicg, Les étapes de la philosophie mathématique*, (The stages of mathematical philosophy,), Paris, 1912-1; 1947-3, 88, where the proper interpretation (spatial or purely logical) is debated). - At least here, indirect comparisons are performed.

R. Descartes (43/47) (1596/1650) in his *Regulae*, XIV, explains the comparative nature of Eukleides’ axiom: “By means of comparison we find ‘the figure (external form of a body; Gestalt), the expanse, the movement and the like more’, i.e. the singular natures (actual modes of being) - in all the data, in which they can be present.”

On the other hand: given a derivation of the type “Every A is B; every B is C; therefore every A is C”; it is clear that our mind “compares the sought term and the given term (L.12), viz. A and C, among themselves, yet under the viewpoint that both are B.”

L. 44.

Consequently,

(i) if one disregards the contemplation (intuition) of a separate reality,
(ii) then - one may say - “one obtains, by the comparison of at least two realities, mutually, all knowledge” (Regulae, XIV). (*M. Foucault, Les mots et les choses*, 66).

Descartes further explains the latter by distinguishing two types of comparison (he even claims, that only two exist), namely the comparison by measure and that by ‘order’.

Explanation.-- The measuring equation cf. R. Descartes.

a. Descartes - according to Foucault, o.c., 67ss. - claims that one can measure both continuous and discontinuous data. In both cases:

(1) one considers, first, the totality (L.22vv.: summative editing);

(2) divide that totality up (division) into parts called ‘units’.

a. If we are talking about continuous data, then those ‘units’ are agreed upon (conventionally: think of the meter, the yard or the fathom to measure a line). The unit, here, can be called ‘measurement model’.

b. If we are talking about discontinuous data (think of a series of blocks, which one wants to measure), then those units (measurement models) are the units of arithmetic.

b. - Descartes concludes, then, twofold.

a. “Comparing two quantities (continuous data) or two discontinuous data requires, in any case, that one applies, in the analysis both of the first kind and of the second kind, a common unit (measurement model).” (o.c., 67).

b. “Thus the measuring equation, in any case, amounts to the arithmetical relations of equality and inequality. The measure (model of measurement, unity) allows us to analyze the similar (le semblable, the analogous (L.35)) according to the calculable form of the identity and of the difference (L.35vv.)” (ibid.).

In other words, the measuring equation divides, first, up (distribution) and, then, applies a common unit (measure, measurement model) (ibid.). It is an analysis through units, to make out equality and inequality (ibid.).

L. 45.

Conclusion.

One hears it: Descartes is and remains traditional. But he innovates: not identity - and-difference (non-identity), but its calculable form. That, for him, is analysis (comparative ordering). The mathematical (computational) form of analysis emerges.

Explanation.

1. The 'mathesis universalis' (general 'mathematics') cf. Descartes.

a. M. Foucault, o.c., 70ss., emphasizes:

(1) not the mechani(ci)stical model of thought (i.e. the denotation of reality as 'machine', as e.g. in the XVII- th century, in medicine, resp. physiology);

(2) nor does the model of mathematization (i.e., interpreting reality as an embodied mathematical formula, as in astronomy (astronomy) and in part of physics) make up Descartes' total intent

b. Descartes' fundamental (total) intention is called 'mathesis universalis' (literally: comprehensive, calculating theory of order). Not to denote as a machine; -not even to denote mathematically,-- but to order by means of a proper means of order,-- that makes up Descartes' full design.

'Analysis' means, both machine thinking and mathematics and general order theory, but, then, especially the latter.

c. In this - in a mathematising theory of order, which spans the whole of reality, - Descartes is not new: the Paleoputhagoreans - (-550/-300), with their arithmology (theory, which works with number, geometric form and 'harmony' (interlocking)), held an analogous (L.35) doctrine.

And every Platonism (Platon v.. Ath.: -427/-347; the older Platon became more and more Puthagorean) continues that tradition, at least in part.

2. We explain this in more detail. (45/46)

a. Ordering, according to Descartes, differs from measuring comparison. "I see through the order that exists between e.g. A and B, without considering anything but these two terms. In measuring, a third something intervened.

b. The order of things is not known by looking at them in isolation, separately; doch:

(i) one recognizes first, the singular fact,

(ii) after which one recognizes the closest reality (given).

This creates a sequence (serial side).

L. 46.

c. The order of things is recognized, secondly, by beginning, in the above sequence, with the singularest data and ending, so long that sequence, with the most complex data (complexifying side).

In summary :

(i) Series formation - of which the series of numbers, playing a leading role in the arithmetic centralized above, is only one type -;

(ii) Complexification (the course of analysis from the singularest to the compoundest data).

An appl. model.

Stated - in contemporary algebraic terms - follow the propositional formula:

$$a/b + c = d.$$

Cartesian “ordering” would come down to this:

(i) First, the singular data: a, b, c, d;-- - (division sign), + (aggregation sign), = (equality sign).

(ii) then, the less singular : a/b.

(iii) Finally, the most compound: a/b + c = d.

An appl. model.

Stated (L.37) the ant colony.

Cartesian ordering (as series formation and complexification in one) would come down to this :

a.1. I take, on my fingertip, just an ant (singular fact).

a.2. I see the ant (analysis) in itself: internal vgl.

b. I look, now, at all the other ants (dichotomy = complementation).

b.1. I see that the others are similar in form (model identical), i.e. I collect (L.22vv. (summering); 35vv. (identitative aspect)) the whole series of ants into one biological type.

b.2. I see the little ant, on my finger, floundering,

To (i) be with the other (locally (L.37))

and (ii) **sympathize** with the other (L.37 (biological connexion)).

c. I now look at the nest and the surrounding forest :

c.1 The nest situates “society” (system; L.35).

c.2. The nest itself is located in the forest aggregate (supersystem; L.35).

Results:

(1) The series (a to c.2.);

(2) Complexification.

L. 47.

3. The relationship between measuring and just ordering equation.

a. This is expressed, by Descartes himself, as follows. “One can reduce the measurement of continuous and discontinuous data to the foundation of an order: the numerical values of arithmetic are always susceptible of being ordered in series. (...).

In this precisely exist both the (Cartesian) method and its ‘progress’: to reduce every measurement (...) to a series formation, which,

(i) starting from the singular,
(ii) exposes the differences (non-identities) as as many degrees of complexity.” (M. Foucault, o.c., 68).

b. In other words, the ‘universal doctrine of order’ (mathesis universalis) subjects every analogy (‘resemblance’ (L.35 (bottom)), the heart of ancient Greek and Scholastic philosophy, to the testing by comparison - thus: comparative method, in any case, where this testing (verification/falsification) is twofold:

1.-- comparison using the measurement model (the common unit).

2.-- comparison through ‘arrangement’ (i.e. identity and set of differences (non-identities)) (M. Foucault, o.c., 69).

Note:-- Needless to say, Descartes, in his criticism of the vagueness (not of the principle itself) of ancient-Greek and Scholastic comparatism (= comparative method), in addition to complexifying ordering, lays very strong emphasis on complete enumeration (L.28) or summing. This can take three forms :

a. -- The exhaustive census (inventory (L.22));

b. -- the classification into ‘categories’ (types)

c. -- the analysis of a necessary and, somewhat, sufficient sample (from the set).

What matters, in each of the three types of summative induction, is that one tests the totality, as exhaustively (completely) as possible.

Reason: only then - says Descartes - is there absolute certainty concerning identity and; (the range of) non-identities (differences) (L.35). Cfr. always Foucault, o.c., 69).

L. 48.

Note:-- Cultural-historical comparison.

As, already, stated (L.45), Descartes, consciously or unconsciously (there is, after all, a clear Renaissance Puthagoreanism and Platonism) (cfr *O. Willmann, Gesch. d. Id, III (Der Idealismus der Neuzeit)*, Braunschweig, 1907-2, 24/69 (*Der Pythagoreĭsmus d. Ren.; Einfl.d.Pyth. auf Mathematik u. Astronomie*); 70/101 (*Der Platonismus d. Ren.*), to a tradition.

1. Puthagorean series formation and or complexification.

a. Eukleides, Elements, 7/9 (Arithmetic), begins with two definitions, among others:

(i) “Monas (= monad, unity understood as element (micro-unit)) is she, to whom each of the being (‘onton’) is called one”;

(ii) Arithmos (= aggregation, ‘number(form)’) is the set (‘plèthos’), as far as composed of microunits (‘monads’).” (*Fr. Krafft, Geschichte der Naturwissenschaft, I (Die Begründung einer Wissenschaft von der Natur durch die Griechen)*, (History of Natural Science, I (The Foundation of a Science of Nature by the Greeks)), Freiburg, 1971, 319).

With these two descriptions Eukleides inserted himself, in his time, in an old, Paleoputhagorean tradition concerning number conception: “The one(s), (understood as element, stoicheion), is there for all numbers (‘arithmoi’); it is not itself a number (‘arithmos’, collection of units). However, she is in all ‘numbers’ (‘arithmoi’, unit-collections), as the necessary condition of them.” (*O. Willmann, Gesch. d. id., I, 2721* where the proposer speaks of the Paleo-puthagorean number idea (i.e. from -/--550).

When, around -300, Eukleides wrote his Stoicheia (Elements), he was still living from that older tradition. In other words, it is only from the two (the smallest possible collection of units) onwards that the older Greeks speak of ‘number’ (i.e.: collection of units). Number theory is set theory! (L.28v.)

Ancient Greek set theory is unitary theory (L.10/13).

“In doing so (i.e., in that type of gathering), the double meaning of ‘them,’ ‘one,’ which is also in our word ‘unity,’ came to mind.

1. Now once, ‘them’(€V) is the ‘one’ as an element, constituent of all unit collections (‘numbers’).

2. Then again, that same ‘one’, understood as a connection (L.30; 37v.) is ‘henosis’, that which makes each ‘number’ (unit set) into ‘number’ (unit set), - ‘number’ (unit set), which, itself, is something once, i.e. a unit (= connection) of a multiplicity.” (*O. Willmann, o.c., 272*).

L. 49.

Willmann, the great philosopher of education, could not express it more clearly: the antique-Greek unified theory (understood micro-monadically and macro-monadically) is set theory *avant la lettre* and this in the field of the specifically antique-Greek unification or harmony theory (about which we will elaborate further).

2. Platonic 'stoicheiosis' (series formation and/or complexification).

We cite the translation of a passus from *Platon, Theaitètos* (Theaetetus) and id., *Filèbos* (Philebus) - the latter in a favorable sense, taken from *E. W. Beth, The Philosophy of Mathematics (From Parmenides to Bolzano)*, Antw./Nijm., 1944, 36v.. However, up front, two word-meaning comments.

1. Thot (= Thoth, Theuth) is the ancient - Egyptian both power (life force - personal deity, who controls the intellectual operations, writing, language etc.' (i.e. provides the necessary 'fluidic'(fine or rarefied) foundation)

2. 'Stoicheion' (mv.: 'stoicheia') is, in ancient Greek, "that which joins, as a member of it, a series, -- especially when that series is either e.g. a rank or e.g. still a line (A. Bailly, -- *E. Egger, Dict. Grec/Français*, Paris, 1903-4, 1795).

a. Above all, 'stoicheion' means any part of a text written on one line, i.e. letter sign.

b. In one of many metaphorical meanings, "stoicheion" means "element" (micro-unit). On this, on these two meanings, Platon elaborates.

Listen.

"When someone - either a god or a divine man (*note* - 'divine' means, here, 'psychic' gifted) - (according to an Egyptian myth ('story') his name was Theuth) noticed that sound was infinitely diverse (= multiplicity), he was the first (= prototype), who realized:

(1) that, in that infinity (multiplicity), the vowels were not "one" but "many" and

(2) again, that there were other sounds (compl., L.7), which - though not vowels, yet - possessed a certain sound value, and that of these also there was a certain number (multitude) and

(3) he distinguished a third kind of letters, which we, today, call consonants.

L. 50.

Then he divided (L.47 (near bottom: division into ‘categories’))

1. the consonants, until he distinguished each one separately (L.46 (at top: singularest given)) (L.47: differences);
2. in the same way, the vowels and
3. the semi-vowels,--until, of these also, he knew the number.

And he was called (each of these and all together (L.25 (elements / Gestalt(form); 29 (Cantor’s concept of collection); 33 (summative)) ‘stoicheia’, letters.

But Theuth recognized that none of us

(a) one of them separately

(b) without all the others (L.7 (compl.) could learn.

Theuth considered that this (not one separately without all the others) was a connection that made them all one (L.10vv.).

Consequence;

Theuth assigned to them a single science, which he called ‘speech theory’ (grammar)’’.

Conclusion.

a. Not the slightest doubt - on close reading of the text, at least - that Platon too, incidentally in purely Puthagorean tradition, somewhat prepares the Cartesian precise method of comparison.

b. Yet there is more. E.W. Beth, o.c., 103, literally says the following.

“In this connection, further discussion deserves the Letter of 30.11.1629 to le P. Mersenne (le Père Marin (1688/1648), mathematician and thinker, friend of Descartes).

In response to a kind of esperanto (an international language designed around 1887 by the Pole Dr. Lejzer Ludwik Zamenhof), Descartes explains how, in his opinion, the word roots of such a language and the letters (characters) that go with them should be composed (L.46 (complexification)).

The counting words and numbers serve him in this regard, as an example.

One should establish, among human thoughts, an order of rank (L.46: series and complexif.), as it exists, by nature, among numbers. Then calculated, one could construct a language (...). Only “true” (in the Cartesian sense, that is) philosophy would, however, make possible the implementation of this plan.

L. 51.

Reason: only she enables us to the human thoughts:

- (1) to distinguish (L.47: differences)
- (2) to enumerate (L.28; 47 (exh. tell.)) and
- (3) to rank (L.47).

Would one, once, have at one's disposal an inventarium (L. 22) of the singular representations (*note.*-- As Beth, o.c., 116, says: G.W. Leibniz (1646/1716) conceived, later, such an "inventarium" as an "alphabetum cogitationum humanarum" (alphabet of human thoughts)), from which all thoughts are composed, then a universal language would be possible, which would support judgment to such an extent that error would be almost impossible.

Beth summarizes, correctly (*ibid.*), "the mathesis universalis (...) generalization of 'analysis' and algebra (...)"

General Conclusion.

1. M. Foucault sought to make true that Descartes (and, with him, the Cartesian era) wanted more and different than mechanicism (L. 45) and mathematization of all reality (L.45).

2. E.W. Beth, however, relying, equally, on Descartes' texts, nuances Foucault's judgment very sensitively: is and remains paragon (main model) of Descartes' intent the mathematics. she, and they all, is authoritative.

J.-P. Sartre (1905/1980) the great French existentialist, in his *Situations* (1947/1976), I (*La liberté cartésienne*), claims that Descartes, in his youth, went through the experience of the rational compulsion, which the mathematical truths impose on the thinking mind, to such an extent that this "existential" (understand: personally lived) experience imposed a new rationalist style on his whole thinking, philosophy included.

This does not, however, prevent Descartes, on comparative method, from taking a distinguished step forward, which we, in turn, accomplish along with him,--even if we do not yield to the "rational" compulsion of mathematics, as Sartre claims to discover him in all that is Cartesian.

The mathesis universalis, not rationalistic (modern), but antique-Pythagorean, i.e. agogic (aimed at independent thinking and salvation), is and remains a great achievement in terms of exactness.

L. 62.

2.-- The differential equation.

(1) 'Different' (cfr. the Latin 'differentia' (Gr.: 'diaforma'), difference, distinction) means 'what corresponds to difference(s), resp. differences!

Thus "differential" psychology is concerned with the differences (distinctions, yes, opposites), regarding behavior, resp. inner life, of the types of people (animals, if animal psychology).

It is clear that here we remain within the view of the identitarian mentality (L.35vv.).

(2) With *H.J. Hampel, Variabilität and Disziplinierung des Denkens*, (Variability and Disciplining of Thought,), Munich/Basel, 1967, 82/104 (Variologische Denksysteme), we could speak of 'variological' comparison, i.e. comparison directed at variation (variants), -- were it not for the fact that this thinker, in that term 'variological' lays his own ideology (to which we shall return later).

Introduction.

a. On page 35, above, we saw the list 'identical/ part-identical (= analogous) / totally non-identical (different, distinct): The emphasis, then, was on identity.

1. But comparing is always (learning to) see both identity and non-identity. Therefore, now a word about the typology of non-identity.

2. Descartes (L.47) taught us to avoid well-defined vague comparison types. Therefore, as none before him, he emphasized the differences (L.47), although retaining the identitarian way of thinking. This Cartesian sense of (rag)fine differentiation (the unraveling (L.6: analysis)) gets, here, its application.

b. *Kard. D. Mercier* (1851/1926), the forerunner of today's neo-scholastics (L.28), in his *Logique*, Louvain/ Paris, 1922-7, 107/109, emphasizes that non-identity ('opposition') can be understood, among other things, in four different meanings.

a.-- The contradictory (incongruity) contrast (difference).

Thus the ideas 'white' or 'non-white'; 'just' or 'non-just': it is one of the two (dilemma). In Latin, the 'or' between two irreconcilable ideas is represented by 'aut' (not 'vel'). Cfr L.15).

Remark. - Mercier should have added 'being white or non-white', after all, posed a wall:

L. 53,

a. if it is white (limed) (the emphasis is on actual being (L.7v.) and not on ‘white’ as not red or something), then that wall IS white;

b. With Herakleitos of Ephesus (-535/-465), already in antiquity labeled “the dark one” for the reason of his statements challenging the common sense, we may say: “That wall is both white and non-white”; but, then, we do not mean actual being as actual being (as above), but rather something like “That wall is white (at first sight), but (in fact) it is not so pure white”; or still: “(Now) that wall is white, but (already it discolors, through weathering etc. and, thus, it) is also non-white:’

b -- the privative opposition (difference).

In that case, the “negate” (the negating sentence form) expresses the gap or the deprivation of something that should be there.

Thus: “That lady does not see” (is deprived of the exercise of the sense of sight, which she should have had), -- by e.g. (congenital or acquired) blindness).

Mercier expresses it humorously: “the stone, e.g., does not see. yet he is not deprived of it; (it is, i.e., for him, not a gap).

c.-- The contraire contradiction (ordinary contradiction).

Here the Cartesian series formation (l.45/47) finds application. given: some kind (type), e.g. a color, quality of conscience, state of health, etc.

‘White’ and ‘non-white’ (which includes red, black, etc.) are both colors, yet each other’s negate; ‘conscientious’ and ‘unscrupulous’ are both conscientiousness, yet each other’s negate: ‘healthy’ and ‘non-healthy’ are both health types, yet each other’s negate.

Note.-- Systechy, pair of opposites, (Cfr L.36)

O. Willmann, *Gesch.d. Id.*, I, 273, speaks of an important doctrine of the paleoputhagoreans (-550/-300), namely, a list of systechies (pairs of opposites);

(1) form/shapelessness; solidity/ unsteadyness; orderedness/ unorderedness; straight/ crooked; right/ left;

(2) masculine/feminine (non-male);

(3) light/darkness (light absence);

(4) good/ evil (non-good).--with ‘identity/non-identity (difference)’ they form a curious piece of differential equations.

It is true that, seen from our classification (typology), with which we, now, are concerned, they are disparate;--i.e., ‘not-good’ is, in fact, privative; reason: normatively speaking, ‘good’ action is, e.g., a demand,--‘doing evil’ is a lack, gap, yes, sinful gap.

L. 54.

Note.-- Why did we, above (L.53,--Ad c), mention “series formation”?

Kard. Mercier says, after all: “The just opposites (*les ‘contraires’*) make up the two extremes of a series of elements, brought together under the same type (type;--meaning: collection (L.29).

Supposed, e.g., that the shades of light -- mentally -- are placed in a row (‘disposés en série’) (L.46), -- then the two extreme terms ‘elements’ of that row (series’) are two opposites.

There is (ordinary, contraire) contradiction where data,

(i) though traceable to the same ‘class’ (‘classe’) (L.26),

(ii) yet cannot simultaneously exist (L.7: actual being; 15; 52v.) in the same being.” (o.c.,108).

Immediately we see that Kard. Mercier, in virtue of purely scholastic ordering, nevertheless thinks in a similar direction to Descartes (L.47 (classification into types)).

d.-- *The merely relative contradiction.*

This - says Mercier, o.c., 108 – is rather a symmetry (i.e. mutual relation) than an outright exclusion: it exists where two terms (elements),

(1) though distinct (different),

(2) yet make sense only in virtue of each other.

Thus e.g. the idea ‘father’ and ‘son’: without son no father and vice versa (= symmetrical). Similarly - says Mercier - the ideas ‘double’ and ‘half’ or ‘knowledge’ and ‘known object’.

One would, perhaps, better speak of “correlative” opposition (mutual relation).

Conclusion.

This introduction to differential comparison proves how ambiguous (one word for more than one meaning) negation (‘not’, ‘on-; -less, etc.) can be. We have analyzed Cartesian gossamer! Let us now return to Herakleitos of Ephesos (L.53): the play on words with opposites without such an analysis à la Descartes does not mean much.

L. 55.

Part 1.-- The idea of 'logical differential'. (55/60)

(1) Starting point.-Take, as a basis, the placing of elements in 'boxes' (places),--and that is: boxes on one horizontal line. This is a type of 'combinatorics' (i.e., construction, analysis, etc., of 'configurations' (a set of places, provided with a certain order)).

(2) Second point of departure is the Paleoputhagorean systechy (pair of opposites; L.53v.) we place ('combine') such a systechy in at least two boxes; thus:



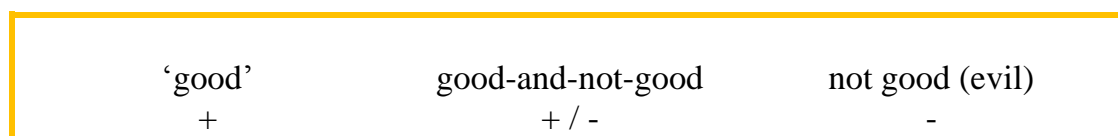
Such a 'bi.nomium' (algebraic term) or - in Greek - duas, dyad (= duality, binary mode of being) covers one of the above analyzed opposites, but unified ('harmony' of opposites) in the framework of a configuration.

(3) The differential.

On the basis of the two previous bases, we can, now, describe the differential as it belongs in an order theory (not as in mathematics).

(a) The same term (element) - e.g., 'good' - is affirmed, placed on the left (+) and, placed on the right, negated (negate (L.52/54)) (-). Thus polarization (bi.polar opposition) is literally 'analyzed' (clarified by dissection) combinatorially (i.e. by placement)....

(b) Combinatorially we introduce, now, a third, viz. middle place (create, therefore, an interval between the two extremes):



So we now have a 'triad' (antique Greek for triad, triplicity, a type of trinary being). Behold what is the elementary (singular) differential (L.45v.).

Appl. models' of the idea 'differential'.

We take examples, in which the idea of "scale" (small, large scale (L.42/44: measuring comparison)) emerges.

Economic model.

One distinguishes (under the same idea) small (small scale) enterprises from medium and large or even giant enterprises.

L. 56.

Since Lord J.M. Keynes (1883/1946), in addition to microeconomics (popular economy at small or medium school), one also speaks of macroeconomics (popular economy at e.g. national or, even, international level (scale)).

Est(h)etic model

a. C. Lefèvre, S.J., *La composition littéraire*, (Literary composition,), Bruxelles, 1936-3, 13s., writes: “The terms (ideas) ‘pleasant’ (i) graceful (gracieux), (ii) beautiful (beau), (iii) elevated (sublime) -: these ideas express what may be called ‘a progressive sequence’ (une progression) (*Ricardou, De l’idéal*, 112s.)”

The question arises: what is the distinction between these three aesthetic categories (L.47 (types))?

b. - *Appl. model* of the graceful (the graceful).-- Every artist, yet most certainly Guido Gezelle (1930/1899), in e.g. his poem ‘Voetjes’ suggests the small-scale beauty (= graceful). Listen.

Editor’s note: Gezelle’s poems were written in an older dialectical Flemish and cannot be translated. We reproduce the original text. This applies from p. 56 to p. 58.

“Dit voetjen -- en dat voetje -- gingen, te gare (samen), de kalvekes wachten (hoeden).-- De kalvekes liepen in ‘t kooren.-- Dit voetjen -- en dat voetje, ze liepen al zere (snel) vooren (voorop).-- Dit voetjen -- en dat voetje zal ik, te gare, in het waterke wasschen.-- Het waterke zal ze spoelen.-- Dit voetjen -- en dat voetje zullen in ‘t water koelen.-- Ze zullen zoo rood, als de roozeke, blinken.-- Ze zullen zoo wit. als de melk, zijn.-- Lijk bezekes (besjes) onder de blaren. (1858(?))”. (*Fr. Baur-, inl., Guido Gezelle’s dichtwerken (Tijdkrans, Rijmsnoer, Laatste Verzen)*, (Guido Gezelle’s works of poetry (Time’s Wreath, Rhyme’s Cord, Last Verses),), Amsterdam, 1943-1, 722).

c. *Appl. model* of the exalted (large-scale beauty). Gezelle sees an old tree-an oak, felled. Listen:

“De reuze.

Uitgekleed, in ‘t zonnebranden,-- al uw leden, naakt en bloot,- heerscher in de nederlanden,-- koning van de bosschen groot,-- eekenboom, zoo sterk voorheden,-- wie dan heeft u neêgestreden? -- Winden vielen, vast en vele,-- stormend’ u en stootend’ aan;- grepen u, bij hals en kele,-- wilden u in ‘t zand gedaan:-- staan, zoo liet het al te booze -- windgevaart’ u, schrikkelooze!

Donderende drakentoten (drakenmullen) hemelmachten, onbekend,-- vonken viers (van vuur) en vorken schoten, -- dapper, u den top omtrent:-- niets en heeft ontroerd of onder ‘t bliksemvier (bliksemvuur) u neêgedonderd.-- wie, dan, heeft u omgestreden,- - groene reus, met al uw macht?-- Naakt en bloot uw’ schoone leden,-- effenvloers, in ‘t zand gebracht?-- Wie kon al uw krachten dwingen, haarlooz en in schand’ u brengen?-- - Staan en blijft, voor menschenhanden,-- niets, ‘t en zij dat eeuwig leeft.-- Koning van de nederlanden,-- sterk is hij (= God), die nooit en beeft:-- ‘t menschdom heeft u, baas bedegen (bedijgen = (sterk) worden),-- groenen. reuz, omneêrgekregen. - (01.10.1896)”.

L. 57.

A little further, Baur mentions an analogous (L.35 (below)) poem, of which, here now, title (*Van den ouden boom*) (of the old tree), and salutation:

‘Met uitgestroopten arm,-- ten halven afgeknuist (afgeknot tot er een knuist van rest),-- wie staat er daar, en steekt een onbestaande vuist -- ten hemel? is ‘t een reus -- in beelde? Neen’t, ‘t en is -- geen menschenbouw.’t Is eer een wangedaantenis, - een steenen berggedrocht (bergmassa),-- dat, staande fel en fier,- - de scherpe houwen torst -- van ‘t vonkend hemelvier (bliksem). (...)’.

Note.-- As every person familiar with art and aesthetics knows,

(i) Gezelle does see, naked reality;

(ii) but, existing together with that naked reality, an idea (so small-scale gracefulness, as in *Voetjes*; or large-scale elevation, as in the two previous poems). The choice of words, the syntax, the whole atmosphere is determined not so much by naked reality as by the idea. Whoever, therefore, does not grasp (contemplate, perceive) the aesthetic idea, does not grasp, at once, what the poet wants to say...

d. Also humor

(small-scale ludicrousness) and irony, resp. sarcasm (large-scale ludicrousness) serve the above aesthetic categories (basic ideas).

Listen.

J. Racine. (1639/1699), the French classical tragedian, also wrote a comedy (comédie), *Les Plaideurs* (1688), in which. the antithesis (contradiction; L.52vv.) plays, among other things, in the following sentence: (The summoned says, humorously, to the commissioner: ‘Monsieur, ici present, - M’a, d’ un fort grand soufflet (jaw-dropping), fait un petit présent (‘gift’):

Calamity (accident) can, likewise , be small-scale or, on the contrary, large-scale. The latter type of calamity is called, often, tragedy.

L. 58.

1. Something of this shines through in Gezelle's poem "*Van den oudeden boom*," where he speaks of "a monstrosity,--a stone mountain monstrosity (monstrosity is mass, yet, like monstrosity, ominous in stature, bleak).

2. Something along the same lines resonates in *Gezelle's Avondrood* (fourth stanza): "In 't heerlijk zonnenveld,-- dat donker wordt omhoog,-- en, langzaam, donkerder -- en dieper, staan ten tooge (d.i. als een schouwspel),-- geschreven, zwart op goud,-- een bende reuzen groot : -- het eindloos boomenvolk,-- in 't eindloos avondrood".

Weerom: de woordkeuze (grootschalig zowel 'eindloos' (tweemaal) als 'bende reuzen' of '(boomen)volk' (waarbij de onoverzichtelijke veelheid, uitgedrukt in 'bende' en 'volk', onheilspellender overkomt dan b.v. slechts één boom)), de sfeer (in 'avondrood' b.v.) wordt bepaald - niet door de naakte werkelijkheid, doch, - door de idee (grootschaligheid ineen bestaande met onheilspellende sfeer).

3. Also within the same aesthetic category (basic idea), sounds from the same *Gezelle*, e.g., *The Gypts* (Baur, I, 614).

The Gypts, in passing, are Gypsies.

" 't Is donker in 't houtgroen en 't beukloof is dicht.-- (...). -- Zij zijn daar, de gypten een dolende schaar. -- met vonkeiend' oogen en golvend van haar.-- (...).

Bij 't helblakend kampvier (kampvuur), in 't dagdoovend groen,-- daar leegren de mannen, verwilderd en koen.

Daar zitten de vrouwen: zij braden het maal -- en schenken vol wijndrank den ouden bokaal.

Gezangen en sagen herklinken rondom -- met klankvolle toonen, als klokkengebrom.

En toovrende spreuken, voor nood en gevaar,-- leert grootheer (= grootvader, voorvader) zijn kindren herhalen, te gaar.

Zwart kijkende meiden ontginnen den dans -en flikkren, verwandlend van schaduw en glans.

Daar ruischt de kithara, de muizelzak tiert,-- wijl, wilder en wilder, de dansronde zwiert.

Nu staken zij, moede van 't avondverkeer.

De beukeboomen zuchten; de slaaplust valt neer.-- En zij, zoo ver verwijderd van huis en van land,- Z 'aanschouwen, al droomen, hun zaligend strand.(...).

(November 1877)?

L. 59.

Gezelle, so they say, made this poem after Emmanuel Geibel' (1815/ 1864), who, once, lived in Athens for two years as an educator in the house of the Russian envoy, and, later engaged much in southern literature.

What does the individuality (within the uncanny as a category) consist in? In the fact that, in the Gypts, the sinister is situated - not in nature (e.g. the trees) - but in the people. Even more (and this is something we hope to return to later): the Gypsies represent, in our enlightened midst (the Enlightenment is situated from +/- the end of XVIIth century), a remnant (superstitio) of an ancient nocturnal religion, close to the earth (as Earth Mother).

Well, this religion comes across, at least to Enlightened minds, as “unsavory,” “uncannily menacing,” and “ominous. - Gezelle has given us something of that atmosphere (idea) in his poem.

Sociological model.

1. D. Szanton, *Cultural Confrontation in the Philippines*, in: *Cultural Frontiers of the Peace Corps*, Cambridge (Mass.) / London, 1966, 35/61(esp. 53), depicts how the adaptation of the lazy people of the USA Peace Corps, in the Philippines exhibited a whole gamut or spectrum (i.e., an enriched differential), with the “categories” being (L.47):

(i) rejection, aversion, (ii) aloofness, (iii) acceptance, fondness.-- This regarding the native population and its culture type. One could characterize the above triad as follows :

(i) acceptance/preference	(ii) aversion	(iii) rejection/re aversion
+	+/-	-

One sees how, in human relationships (attitudes), the triadicity, which characterizes the minimal differential (L.55), is, again, present.

2. Analogous to this is the polarity profile (cfr *Ch. E. Osgood, The Measurement of Meaning*, 1957).

In an opinion poll, e.g., regarding what “people” think about someone (take a teacher) -- image impression research, for example, one can let the differential triad “competent”/”undecided”/”not competent” act as a questioning method.

L. 60.

There is more: if one notes, per box, the number of persons who pass judgment, then one has, even, a mathematical method (L.45: mathematization model). One can, after all, then, compare the numbers.

Part 2. -- The impact of (gradual) quantitative change on quality.

First of all this: there are still people who see 'quantity' (mathematically expressed, as the case may be) as being in conflict with a sense of the qualitative in reality. And then they criticize mathematics and quantification! We believe, on the contrary, that quantity and quality exist together, to a certain extent.

a.-- Ainesidemos of Knossos (+/- -50) is a skeptic (philosopher, who focuses on inquiry, insofar as it ends in uncertainty and doubt). Immediately he is a follower of Herakleitos of Ephesos (L.53), which implies that he has a sense of paradoxical statements, in which real or apparent contradiction is formulated.

Bibl. stabpr.-- V. Brochard, *Les sceptiques grecs*, (Greek skeptics), Paris, 1887-1; 1969, 253/298; R.G. Bury, *Sextus Empiricus*, 4 vols., Cambridge (Mass.), 1961, I (*Outlines of Pyrrhonism*), xxxvii/xl.

a.1. Central to this Cretan are the so-called tropes (tropoi, modes of opinion), which serve to prove that both our sensory experience and our thinking are, fundamentally, relative (relativism : nothing is 'absolute (certain)).

a.2. Well, among these tropes there are those that are supported on the very object of our sensory or intellectual knowledge (objective tropes). Here, now, are situated the relations between quantity and quality. There is a connection (L. 35; 37) - apparently, several times, a connection ACD (cause)/CSQ (effect) (L.24) - between quantitative changes in the object and qualitative perception (leapfrogging).

As evidence, Ainesidemos cites.

A.-- Distributive changes (L.26; 38).

If a piece of data becomes either more frequent or rarer, within the same time frame or space, it comes across as qualitatively different.

Thus a comet (tail star), for the reason of its rarity, arouses sensation; the sun, for the reason of its daily appearance, is not sensational.

L. 61,

Which brings to mind a Roman proverb: “Assueta vilescent” (Things, to which one is accustomed, come to pass as “deadly”). One remembers a related observation: ‘One learns to live with it’. -- For example, an earthquake, in cities where it is frequent, is less or not sensational. - Differential:

frequent / infrequent	rare (some)	
+	+/-	-

B.-- collective amendments (L. 38).

If the mass of a given is changed, then, qualitatively, that same mass changes.

For example - says Aïnèsidèmos - a single grain of sand is prickly and grains of sand, gathered in a heap, are soft to the touch. Thus, a small dose (posological quantity) of wine ‘strengthens the soul’, while, if gradually increased, at some point, it turns into the opposite: too much wine is harmful!

Thus - to quote an experiment by Anaxagoras of Klazomenai (-499/-428), the founder of experimental (trial-and-error) natural science, in ancient Greece - a bag, filled with air, to which one turns the neck ever harder, will suddenly burst.

Wine dosage differential

few	more	too much
Beneficial	cover	harmful
+	+/-	-

b. Francis Bacon of Verulam (1561/1626), the programmer of experimental, causality-oriented natural science (*Novum organum scientiarum* (1520)), saw the same connection between quantity(s) changes and quality(s) changes. His famous “tables” prove it.

So where he talks about the rule on experimentation, called ‘productio experimenti’:

(i) if one changes, gradually, the cause (ACD; L.24), under point of view of intensity e.g.,

(ii) then, if there is really causation, the consequence (CSQ: L. 24) will also change, to a proportional degree.

Thus the law that the volume of a gas is inversely proportional to the pressure applied to it.

L 62

Thus, in medical science, it appears that a substance (a poison), if gradually modified, begets a modified medical effect, so much so that, at a given moment, “the effect does not proportionately modify itself, but, sometimes, abruptly changes its nature” (Ch. *Lahr, S.J., Logique*, Paris, 1933-27, 585).

Lahr articulates, here, the bond “gradual change (quantitative)/ sudden turnaround. Lahr concludes, “There are, therefore, cases where the quantity is an essential component of the cause.”

c.-- John Stuart Mill (1806/1873)

the empiricist and methodologist (L.24), has resurrected Bacon’s “table of degrees” (*productio experimenti*), in his famous “methods.

Thus, Mill’s “method of accompanying changes” is what Bacon called *productio experimenti*: “If a phenomenon is changed, while all the antecedents (ACD; L.24), except one, remain unchanged, dart this one antecedent is the cause sought. Thus:

- (i) Change the number or amplitude of vibrations of a sounding body,
- (ii) and thou shalt observe the image animal changes in the sound (qualitative phenomenon, as far as observed) (o.c. 589).

d.-- Iossif Vissarionovitsj Ojougatsjvili, nicknamed Stalin (1879/1953). Dialectical materialism and historical materialism (1937), sets forth the four major features of modern dialectics, as they existed since G.F.W. Hegel (1770/1831) - in the idealist variant - and Karl Marx (1817/1883) and Friedrich Engels (1820/1895),- in the materialist interpretation.

The third major characteristic reads as follows: “The movement (= change) and the becoming (of matter) establish something new”.

This movement (change) and becoming establishes news in two ways:

(i) in a circular manner: for example, with heat energy one can generate movement (in the mechanical sense) whereby that movement energy, in turn, decays into heat energy;

(ii) in leaps and bounds (revolutionary) manner, whereby an insignificant quantitative change generates a qualitative leap: so e.g. physically, the water, which, once it reaches one hundred degrees, suddenly begins to boil (qualitative change); so the chemical ‘ratweed’ (arsenic trioxide), a heavy poison, which, in small doses, is curative, while, in large doses, it is lethal.

Likewise, in the psychological field, when “one drop of water” causes it to “overflow”: think of a bullying, if repeated “too much,” which becomes hateful, where, once perpetrated, it is still, tolerable; think of a display, a piece of music, which, at first, is enjoyable, where, repeated too much, it becomes uninviting (*P. Foulquié, La dialectique*, Paris, 1949, 64s.).

L. 63.

One could add to the appl. models. - Consider the sociological phenomenon whereby a working mass, if not overly exploited, finds this tolerable, yet who, on the border of exploitation, finds the border crossing - what the ancient Greeks called “hubris” - intolerable and becomes revolutionary instead of peaceful.

General conclusion

1.- The facts (‘factual modes of being’ (L.7)) are there: quantity(s) change(s) embody(s) quality(s) change(s), if necessary leapfrogging and in the form of reversal-in-the-verse:

2-The question arises, “where exactly is the boundary of the leap?”

(i) Euboulides of Miletos (-380/ -320), belonging to the school of Megara (one of the Kleinsocratic tendencies), was a practitioner of eristics, i.e. a method, which refutes the theses of philosophers, rhetors and scholars by means of the method of the counter model (counter example).

In his name, two models of eristics have been bequeathed to us, which bring into sharp focus the problem of the qualitative leap (in the face of gradual quantitative change).

Model 1. The bald: To deprive someone of just one hair does not mean that he, thereby, becomes bald; to deprive him of two, three, etc., does not either; thus, one can deprive him of all hairs without him becoming bald.

Model 2.-- The heap of grain: Just one grain does not make a heap of grain; two, three, etc., neither; so, a hundred thousand grains do not make a heap of grain.

One reads, now, L. 25v. (summative induction).

Fr. Lahr, *Logique*, 701, says that Euboulides

- (i)** what is true by each member of a collection individually (in its separateness),
- (ii)** attributes to the whole set (as a whole).

L. 64.

-- We see, now, what enormous importance summative induction has! If, at least, correctly understood! For, here, either 'all' (finite set) or 'all possible' (infinite set) is ascribed, which, rightly, is ascribed to precisely one element (moment; L.7): that it is, in fact, non-decisive as to qualitative leap. we stand; here, before a false summative induction.

It is, now, clear, why we (L.23 (gestalt); 25 (form; formal induction) took such care to ensure the proper structure of summative induction (and not just of average numbering).

With *E.W. Beth, The Philosophy of Mathematics*, 85, we can, well, admit that eristics (in the form above), though 'petty' or near the 'trivial' (flat), nevertheless

- (1) is the introduction to a more in-depth investigation, and
- (2) can claim full evidentiary value

Yet it is immediately evident that the bald head (the barren) or the grain heap cover a - what the ancient Greeks called 'sophism' (sophism, fallacy). The common mind, even, sees this (perhaps without being able to name the formal fallacy) (L.6).

(ii) Both Gestalt psychologists and dialecticians are totality thinkers.

They also have an eye for the qualitative. These two together make them feel, instinctively ('naively', in the language of logicians and mathematicians), the laws of human appreciation (L.16/19: the transcendental 'valuable').

In our view the jump (border crossing) is a matter of

- (1) sensation,
- (2) threshold sensitivity (both threshold perception and threshold estimation) and
- (3) Perhaps above all, of agreement (resp. habit). to this end, one should check each case separately.

One examines the following differential.

All (possible), very much, much, fairly much (quite), little, rather (quite) little, very little, extremely little, almost none, one, none.

We believe that the three factors in that classification (L.47) play a role. Of course, from case to case, a varying role! Perhaps it is also, as with the primitives (L. 27).

L. 65

Taking into account what we saw higher (L.55), ONE differential (at least in the orderly - comparative sense) is

- (i) A systechy,
- (ii) opened up, as it were, in its middle, by means of an interval (what the ancient Greeks called ‘dia.stèma’ (Lat.: intervallum)).

Countless times we have seen - however alternately - that one, unifying figure of the earth (= basic form) ‘+ / ± / - ‘ slide before our eyes. And look: here she appears again.

all (well)	not - all (yes)	all (not)
+	+/-	-

In the three cases (placings (L.55: configurative)), ‘all’ (the sum or totality (L.7: bottom: L.33 (top); 45: comprehensive ‘mathesis’)) plays the role of starting point or - Kantian (I. Kant (1724/1804) - the role of ‘a-priori’.

With that a-priori starting point we combine namely The Contradiction (L.52/54) ‘well (+) / not (-) as a differentiator.

If we, now, remember summative induction, then we can consider the following extension of the summative induction idea to be completely justified.

There is (1) the total summative induction (L.22/32).

There is (2) the differential summative induction (L.52vv.).

After all - instead of total wholes (universal sets), as in ordinary induction - differential summative induction also works with wholes (and from the whole (all (well)/not all (well)/all (not)), but with partial wholes, partial wholes (subsets)

a. If differential-summative induction works with wholes (the sum), it is inductive (i.e., reasoning oriented to the whole (set, totality) and, thus, truly summative.

b. if, however, it ends in parts (partial wholes, partial sum), then it is differential.

c. If she is rather qualitatively - we say ‘rather’ (i.e. not exclusively) attuned, then we can, with confidence, speak of qualitative summative induction we have, after all, repeatedly established (verification) that even multiplicity (elements, moments) can also (not only) mean quality.

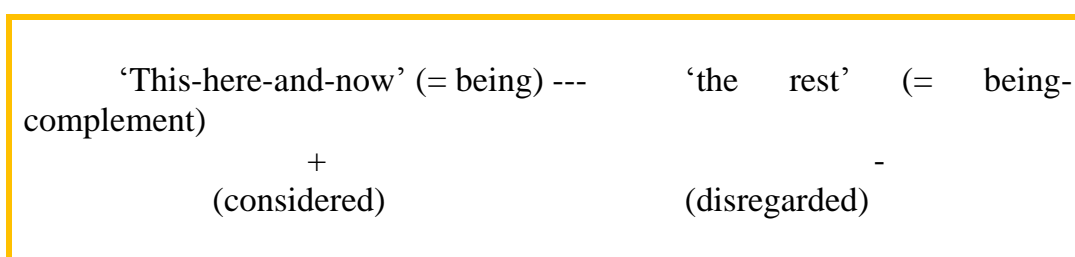
L. 66.

d. If she means dichotomy, then she is called complementary summative induction.-
- Something, of which we have met, so far, (as of L.7) more than one appl. model.

The expression ‘the sum and the remainder’ is but a single application of this very general rule of thought. All that we ‘view’(L.29v.; 37), we view **(i)** In itself, **(ii)** yet **a.** as distinct from and **b.** yet in any case connected with ‘the rest’ (complement).

In this sense we ‘think’ - observing or doing whatever - from being (the totality of the actual ways of being (L.7)), though split up into ‘this-being-here-and-now’ and ‘the rest’.

1. This type of differential summative induction is, fundamentally, always present. If not, we lapse into swooning. all consciousness (= awareness) of something (actual mode of being) has the following complementary summative induction to structure :



2. There is one exception: when we think ‘being’ as such (= as totality of all possible actual modes of being) (L.8: transcendental).

Of course, the ‘being’ as summative induction of each being (L.7: fact and being) separately: if all being separately and factually and represent being, then all being together also!

Conclusion.

Induction - but practiced in a reductive scheme - is, without doubt, a form of reasoning, which has an enormous scope. - We think we have proven this:

1. in the ontological introduction (L.5/19 (especially L.10/13 (the transcendental one)));

2. in the account of the most general form of summative induction (L.22/32);

3. in the introduction to comparative ordering (L. 33/66),-- very particularly in the particle on the differential equation (52/66).-- Behind the inductive-reductive method, however, stands the comparative method (L. 33/42).

L. 67.

B.(ii).-- The “new” and the “scientific” dialectic as harmology.

Comparative ordering we have, now,

(1) based on (summative and/or amplificative) induction,

(2) get to know as seeing connections (= partial identities, relations).--

Metalinguistic and differential comparison are two basic types.

Descartes mathesis universalis seems to be a solid, because accurate form of comparative ordering. Yet it seems to need to be supplemented by dialectics, as a relaxed mathesis universalis

1.-- The “new” (modern) dialectic.

A. connection with the above (especially with the mathesis universalis).

The idea of a mathesis universalis, a ‘scientia generalis’ (Lat.: general science), is:

(a) by Imm. Kant (1724/1804), the top figure of the (German) Enlightenment (L.36), fiercely contested;

(b) by J. G. Fichte (1762/1814), Fr. W. Schelling (1775/1854) and especially G. F. W. Hegel (1770/1831), the three top figures of German Romantic-influenced idealism, reinstated (*R. Scholz, Die Wissenschaftslehre Bolzanos*, (The Science Doctrine of Bolzano), SB 9, 1937, 407) (L. 62v.);

(c) adopted by K. Marx (1818/1883) and Fr. Engels (1820/1895), the founders of Marxism, in the sense of the dialectic of the Idealists, yet materialistically remembered (L. 62v.).

B. Critique of the dialectic

(a) The rejection of mathematics as a paradigm (L.45; 50v.) has led the dialecticians, mentioned above, to apply an argumentative style, which, for people committed to exact methods, can never be satisfactory.

(b) Yet *Father I. M. Bochenski, The Logic of Religion*, New York, 1965 48/51, who speaks disparagingly (disparagingly) of the above dialectic, says that as ‘a set of suggestions’ the dialectic is fruitful, insofar as it subjects itself to logically rigorous control.

WE translate: the dialectic is a fruitful set of lemmata (L.6; 12; 23; 41) or verifiable (working) hypotheses, while retaining Cartesian accuracy (L.47).

We therefore go over the main traits (lemmata), as I. Stalin (1937) formulated them (and made them world-wide).

L. 68.

The four main theorems (lemmata) of dialectics.

P. Foulquié, *La dialectique*, 62ss., adheres to the simplified, yet, therefore, not so invalid rendering of I. Stalin, *Dialectical Materialism and Historical Materialism* (1937,--just three hundred years after R. Descartes' *Discours de la methode* (Discourse of the method), (1637), in French (Paris, Ed. sociales).

This piece by Stalin is

(i) merely echoes the teachings of Marx and Engels (though in Leninian interpretation),

(ii) who, themselves, meant the materialist circumscription of German idealism (especially that of Hegel); so that *and Descartes' Discours de la methode* (1637) and his idea '*Mathesis universalis*' (L.50v.) - though in romantic-idealist version - resonate in Stalin's little work.

A.-- First lemma. - '*Marxism -- like Hegelianism -- is a type of organicism.*

Consequence: "Between the different parts of reality there is an active interdependence."

Stalinist rephrased: "The individual (the human person, thought separately) is only an abstraction (understand: a thing detached from its real context (L.35; 37)).

Reason: the few

(i) depends on the effect that the beings surrounding him (L.37vv.) exert on him; the individual

(ii) depends on of all his past (i.e., he situates himself in a diachronic whole (L.41: bottom)).

Consequence: one can only understand the individual if one situates him (L.38) at the intersection of all the influences acting on him and of his reactions to his life center". (o.c., 62).

Foulquié o.c., 63, notes that the Hungarian Marxist Georg Lukacs (1885/1971), known among other things for his *Geschichte und Klassenbewusstsein*, (History and Class Consciousness), Berlin, 1923, considers the above doctrine of the dependence of the parts on the whole to be the doctrine of Marxism par excellence. "It is not the primacy, given to the economic motives (L.34), concern history explanation, which, decisively, differentiates Marxism (L.52/54) from 'bourgeois science' (the anti-Marxist history explanation). No: it is the viewpoint of the totality".

L. 69.

Critical Consideration.

A thinker like Bertrand Russell (1872/1970), the champion of “human rights” (understand: the rights of man as an individual), who, himself, thinks atomistically (i.e. emphasizes the “atom” (understand: separate being)), will remark on Hegel’s and Marx’s (and, immediately, Stalin’s) way of thinking that it assumes, without necessary and, above all, sufficient reason, that the whole has priority over the parts (“atoms”, elements).

This, while it is not so certain that the primacy of the whole (‘the totality’ the dialecticians like to say,) is a provable thing. Collectivism, authoritarianism are, among other things, the inferences from such an interpretation of the relationship between ‘atom’ and ‘whole’.

Well, - said Russell and his thinkers - collectivism and, especially, authoritarian authority structures are not so benevolent, in praxis.

B.-- Second lemma.-- Marxism -- as e.g. Already herakliteism (L.53.60), in ancient Greece -- is a mobilism.

‘Mobilis’ (Lat.) means ‘mobile; ‘changeable’, ‘unsteady’, ‘Mobilistic’ is a philosophy if, as Stalin, among others, with Hegel and Marx and Engels, claims that “everything - the totality and. the moments (i.e. mobile elements) - is constantly in motion”.

As Foulquié, o.c., 64, says: “everything constantly transforms itself : both the world of inanimate matter and that of life and thought. For thought, ‘resting state’ would be equivalent to ‘death’. This is so for the Marxists as for Hegel”.

Foulquié, o.c., 64, cites *Friedrich Engels* (1820/1895), *Ludwig Feuerbach und der Ausgang der klassischen Deutschen Philosophie*, (Ludwig Feuerbach and the Exit of Classical German Philosophy.), 1886-1.

“(...) The revolutionary side of Hegelian philosophy (...). The great basic idea, that the world is not to be grasped as a complex of things, which are finished, but as a complex of processes.

1. In it, both the seemingly stable things and their ideal representations in our minds (cf. L.14: logical truth), which we call “concepts,” go through an uninterrupted change, peculiar to becoming and decaying.

L. 70.

2. In it, notwithstanding all apparent coincidences, and all momentary temporary regressions notwithstanding, a progressive development is taking place.

This great basic idea has, especially since Hegel, become so deeply rooted in day-to-day consciousness that, in its generality, it hardly meets with contradiction.” (*Institut für Marxismus - Leninismus*, Hrsg., Karl Marx/ Friedrich Engels, *Ueber Religion*, Berlin, 1958, 201).

Immediately one sees that English;

a. to the thesis of the first dialecticians and in our Western history of mind and ideas, Herakleitos of Ephesos, namely, that everything both changes and - in time - turns into its opposite,

b. adds the idea of progress, as it became prevalent, especially since the XVIII-d' century enlightenment (L.36).

Critical Consideration

Diametrically opposed to this philosophy of change, revolution and progress, typical of German Idealism and Marxism-Leninism, is e.g. *Agostino Steuco* (Augustine Steuchus; (.../1550), *De perenni philosophia*, Lyon, 1540-1 (On the continuous philosophy), in which this bishop and librarian of the Vatican Library updates the thesis defended by the Church Fathers (Patristics: + 33/800), in the contemporary manner of the Renaissance:

(i) Pagan philosophy (both the “hieratic” (= sacred) of the Near and Far East and the “classical” of Hellas and Rome)

(ii) is the forerunner of both Old Testament and New Testament thought and its philosophical processing.

Consequently: since archaic times, one and the same basic philosophy prevails, over all mankind, and this with an unchanging “eternal” (perennial philosophy) essence.

1. With this stance, Steuco rejected both rigidly closed traditionalism and the revolutionary enlightened interpretation of tradition and dissent.

2. None other than G.W. Leibniz (1646/1716; L.51) came out in favor of Steuco's thesis, even the name ‘perennis philosophia’, and felt that it answered a need. (*O. Willmann, Gesch. d. Id.*, III, 172/ 179).

L. 71.

Noteworthy is the fact that both Hegelianism and Marxism, in their further “development,” do indeed, in addition to “advancing development,” also know “becoming and perishing” and, even, turning into their opposite.

a. Witness: among Hegel’s disciples, there were, at least, three shades to be distinguished, namely, conservative-Protestant theists (God-believers), pantheistic-Enlightened idealists (pantheism is the conviction that God is not a personal and exalted being, but a kind of universe ground), and Leftist Young-Hegelians. This can be found in every history of Hegelianism.

b. Witness: *Esprit* (Paris), XVI (1948), 5/6 (mai-juin 1948), the well-known French journal, bore the title “*Marxisme ouvert contra Marxisme scolastique*” (Open Marxism versus ‘Scholastic’ (understand: closed) Marxism).

This title contains, in itself, the cover to the contrary!-- Every history of Marxism contains a chapter on it.

C.-- Third lemma.-- The movement (becoming/decaying) creates something new.
We refer to L.60/63 (vr1.62, Ad d).

D.-- Fourth lemma.-- Reality -- both totality and moments -- involves ‘contradictions’, understand: inner tensions.

This is the Stalinist rendering of the antique maxim “harmony of opposites” (L.55): “The things and phenomena of nature involve ‘internal contradictions (contradictions).’”

1. Reason: they have, all of them, a negative and a positive side (cf. L.55/66: differential). Thus, they have both a past and a future. Thus they have, all of them, both elements, which disappear and which develop.

2. The struggle of these opposites - e.g. the struggle between old and new, between that which perishes and that which develops, between that which dies and that which is born - is the inner sense (content) of the process (event) of that development, of the transformation of quantitative changes into qualitative changes. Dialectics, in the very sense of that word, - according to Vladimir Ilyich Oulianof, nicknamed Lenin (187/1924), the leader of the Bolsheviks (the majority of offensive Russian communists - is the study of the ‘contradictions’ in the very being of things. (I. Stalin, o.c.).

L 72

Note --

1. Again: Stalin reproduces, here, the teachings of Marx and Engels and, past them, of Hegel.-- Hegel himself had a partially different subject terminology. He spoke of affirmation (= thesis, thesis), of negation (=antithesis, courtship (cover)), and of negation of negation (= synthesis, summary (reconciliation)).-- This triad (trinity) occurs numerous times with Hegel.

2. We give, of that Hegelian triad “thesis/ assertion/ summary” (this is the terminology of Dutch Hegelians), now, a Marxist interpretation (= appl. mod.).

a. Thesis.-- In the first phase of the division of labor (a main concept or category (L.47), in archaic times,

(i) everyone can, still, by themselves, perform all necessary or useful forms of labor (picking, fishing, hunting, e.g.);

(ii) the only division of labor is that of man and woman, who, each, have their own type of labor;

(iii) consequence: so far, every human being is independent of fellow human beings and, therefore, “equal.

(iv) but nature controls a “divine” power alike, humanity (what Marxists call “nature religion”).

b. Courtship.

In the second phase, in addition to gender, now, other labor splits (specialization) occur (e.g., there are priests, farmers, slaves, etc.).

(i) not everyone can, now, handle all forms of work (classes);

(ii) consequence: increasing interdependence and, consequently, inequality.

(iii) but nature, thanks in particular to this specialization, is no longer experienced as a ‘divine-foreign’ power, but society with its class equality. In this context, the antagonistic structure ‘capital/ labor’ (plutocrat/ proletarian) emerges over time.

c. Summary.

In a future phase, collectivization (communalization) of means of production (land, factory’s e.g.) will

L. 73.

(i) neutralize the division of labor (specialization with its class formation);

(ii) consequence : interdependence will be eliminated and equality (though now no longer archaic, but modern) will be founded;

(iii) Thus, both nature and society (the fellow man) as a ‘divine-foreign’ power will now be replaced by a totally enlightened humanity (L.36), which will live without nature religion or its remnants. Which, now, since recently, is more commonly referred to with the term ‘secularization’.

Critical Consideration.

1. The dialectic is a variological system of thought: as *H.J. Hempel, Variabilität*, 97, says, this new mathesis universalis (L.67) dates from the days of German Romanticism.

He even gives one proof text of this. Fr. W. SCHELLING (1775/1854), unmistakably a distinctly Romantic thinker, writes the following, among other things:

“(...) The movement (L.69/73: mobilism) is the essence of science (*note* -- Compare with Lenin’s statement on the essence of dialectics (L.71v.)). If theses (judgements, sentences) are lifted out of this element of life (life as totality), they die, like fruits pulled from the living tree.

Unconditional (L.8: absolute); 15v.: thought-legal), i.e., once and for all valid sentences (cf. L.70: perennity) are contrary to the essence of ‘true’ (understand: dialectical or, at least, mobilistic) science, which consists in advancing.(...). Merely a restless wheel, a never stationary turning (...)”. (Hampel o.c., 97f.).

2. P. Foulquié, o.c.,67, notes that both Hegel and the Marxists use the word ‘contradiction’ (contradiction, incongruity, L.8 (proof from the incongruous); 15 (laws of thought); 53 (appl. mod.); 60 (Ainèsid.)) not in the logico-restrictive sense, but in the ‘variologically - looser’ sense of either ‘opposite’ (L.54v.) or simply ‘different’.

O. i., one would better speak of tension (conflictual tension) (taseological (‘tasis’ (Gr.) = tension)).

3. P. Foulquié, o.c., 68, says that Engels himself admits that there are final, irrevocable truths.

L. 74.

Thus, e.g., mathematical results exist in this sense, although mathematical science is also subject to historical development (according to Engels; which, e.g., with respect to the emergence and revolutionary role of Cantorian enamelment theory, turns out to be correct; L.28v.) (Cfr. also *P. Foulquié*, o.c., 91/94 (*La relativité en mathématiques*)).

Which is confirmed, among other things, in a purely scientific dialectical sense, without Romantic or any ideology, by *F. Gonseth*, *Fondements des mathématiques*, Paris, 1926.

Religious history moment.

It has been noted that among other things, the Marxists incorporate basic religious-historical (hierarchical) ideas. Thus, the idea of “divine alienation.

a. Of course, this idea is used in the enlightened (L. 36) sense, i.e. with the sovereign contempt for all that is religion, certainly for all that is archaic religion.

b. Yet that idea is truer than that Enlightened meaning itself covers.

W.B. Kristensen, *Collected contributions to the knowledge of ancient religions*, A'm, 1947, 273, says the following. He speaks of “the demonic gods of ‘totality’“ (o.c.,272), i.e., fundamentally, all the polytheism of archaic-antique mankind (the ancient East, Hellas, Rome). Listen,

“Salvation and calamity (L.56v. (the Gypts)) were from the (highest) gods: downfall and upfall (L.69; 71), the opposites (L.52vv.), which constitute the permanent life of the world and in which (the Babylonians) saw the divine totality (L. 55: harmony of opposites). The will of these gods was fate, the ‘Moira’ (ancient Greek for share in good and evil), ‘divine’ but inhuman.

‘Righteous’, in the ordinary (understand: our Biblically influenced) sense of the word, they were not: by their conduct, (the gods) denied the laws, which they, nevertheless, had established for men. And the ancients were perfectly aware of this ‘contradiction’ (op. -- ‘contradiction’) in the ‘divine’ being. Of this some of the most impressive pieces of religious literature, which we possess, testify: **(1)** the book of Job; **(2)a.** the Babylonian Lamentations; **(2)b.** the bound Prometheus”.

One cannot express it more clearly, religion historically!

L. 75.

W.B. Kristensen, o.c., 289, says, with regard to Heraklitean thought: “The ancients called Herakleitos ‘the dark one’, and not without reason. For, in truly ‘antique’ (understand: archaic-antique) spirit, he found the mystery of totality more important than the ‘rational’ (understand: secular, belonging to ordinary life) relations of existence.

Says Herakleitos (Fr. 54) “The hidden harmony (harmoniè afanès) is stronger than the perceptible”. Herakleitos means the following: the interpenetration (L.55) (= order) of things and processes can

(i) be based purely on what we all, without distinction, see, touch, feel and, immediately, reason about (perceptual harmony);

(ii) in addition, be based on... invisible, intangible, unfeeling, and, without special insight, unthinkable data (hidden harmony).

W.B. Kristensen, o.c., 289, adds:

“How important the idea of totality was found, even in later times, is shown by the fact that, from religious and philosophical thought, up to our days, it has never entirely disappeared.

Thus: (i) philosophically formulated, (ii) but religiously contemplated, this idea returns in Hegel’s dialectic, where thesis, antithesis and synthesis (L.72) form the trinity (= triplicity) of the self-development of ‘reason’ (vernunft).”

Indeed, neither the dialectic of the German Idealists (especially Hegel’s) nor the dialectic of Marx to Stalin and his successors are completely - i.e., also in its backgrounds - understandable, if one does not take into account what Kristensen says.

Also, it has been regularly observed that - especially in the Marxist-Communist interpretation - dialectics has ‘something’ of a religion, however profane and atheistic. But not of the religion of the pure, holy Supreme Being (high god, Hochgott) but of the demonic primal religions, of which we, in Gezelle’s *De Gypten* (L.58v.), still catch a glimpse.

Rightly says C.J. Bleeker, *The Mother Goddess in Antiquity*, The Hague, 1960: “(In three myths of Hellas) Gaia (= earth mother) exhibits a duplicity which reveals a demonic trait in her character.”

L. 76.

2. -- *The contemporary dialectic.*

(1) Let us summarize once more what (modern or new) dialectics, denoted as *mathesis universalis* (L.67), i.e. as a basic method concerning analysis of factual modes of being (L.7), entails.

With *H. Arvon, Le marxisme*, Paris, 1960-2, 33ss., we can say, “*Engels*, in his *Herrn Eugen Dühring’s Umwälzung der Wissenschaft*, (Mr. Eugen Dühring’s revolution of science), Leipzig, 1878 (‘Anti-Dühring’) and in his *Ludwig Feuerbach (...)* (L.69),-- *Lenin*, in his philosophical main work, *Materialism and Empiriocriticism* (1908) and *Stalin*, in his *Dialectical materialism and historical materialism*, cited above several times, they all clarified -- in that order -- the presuppositions (lemmata; L.6; 67) of the Marxist method (...).

It came down to putting forward four principles on which the dialectic rests:

1. The totality (L.68v : organicism)
2. movement (L 69/71. mobilism).
3. qualitative change (L.71 (62));
4. ‘contradiction’ (L.71/75)”.

These four principalities are explained, incidentally, in Arvon’s little work, o.c., 34/40 (analogous to Foulquié). -

(2) Foulquié, o.c., 76/122, dwells at length on what he calls “the scientific dialectic

Given its current importance, we summarize its main theses.

A. 1. The Hegelian dialectic and the Marxist or Marxizing had, among other things, as disadvantages that it arose purely speculatively, i.e. outside the results of stellar or positive sciences; also: it is “a simplistic schematism” (o.c.177). Nothing more.

2. Contemporary dialectics, however, though inspired by the purely speculative, are grounded in the results of professional science (L.1) and less rhetorical (L.1).

It recalls the motto of J. Fr. Herbart (1776/1841): “Everyone should respect all professional sciences. Everyone should, however, be a ‘virtuoso’, (specialist; L.1/2) in precisely one subject science”.

Foulquié, o.c.,78/97, demonstrates this for:

1. the human sciences, the **2.** natural sciences, **3.** mathematics (l.73v.), **4.** logic (logistics).

L. 77.

B.-- See here the lemmata (L.6; 41) of the present dialectic.

They can be arranged under two main viewpoints (L.42 (synchronous); L.41 (diachronic)).

This corresponds, roughly speaking, to totality **1.** (synchronically) and **2.** to movement **4.**; qualitative change; contradiction (diachronically). One can see: the fundamentals live on.

A.1.-- Intentional. (77/78)

See L.7;9/10;30,-- Current dialecticians-vocational scientists point out that all work of science (not so much results) is an interaction between investigating subject (= noetic side) and investigated object (noetic side).

a. Notes:--

The terms 'noetic' (subject) and 'noematic' (object) do not come from the dialecticians, but from Edmund Husserl (1859/1938), the great founder of intentional or subject-object joint phenomenology (L.13) If we use them here, in brackets, it is because they excellently express what the present-day dialecticians (and, incidentally, also Hegel, who saw the interaction 'subject/object' very well) want to say.

b. Note:-

In other words : science work is "encounter" (L. 13). This implies that

(i) the met material (object) with which the professional scientist has to deal must first, as it were, be vitally processed before it can be rationally-intellectually formulated (something, too, Hegel saw very well, as a thinker influenced by German Romanticism (L.67; 73));

(ii) the encountered researcher must first, as it were, "engage his whole existence" (i.e., with his whole personal commitment; L.51: Descartes as appl. mod.), before he can, intellectually-rationally, formulate the data (the object) (which, again, Hegel saw very well, for the reason of his romantic background: for the German Romantics - e.g., for Schelling (L.73) and Hegel, as well as for the Marxists, who, on a romantic basis, thought through - philosophy, resp. professional science and rhetoric is "life coming to full consciousness" (A. de Waelhens, *Existence et signification*, (Existence and meaning), Louvain/ Paris, 1958,75ss.)).

Immediately the dialecticians removed themselves from the life-altering enlightened "rationalism.

L. 78.

A proof text.

A. Lautmann, *Essai sur les notions de structure et de existence en Mathematiques*, II (*Les schémas de genèse*), (Essay on the notions of structure and existence in Mathematics, II (The patterns of genesis)), Paris, 1938, 147 (cited by Foulquié, o.c., 101): with Leon Brunschvicg (1869/1944) - who wrote, among other things, *Les étapes de la philosophie mathématique*, (The stages of mathematical philosophy), Paris, 1912-1 - A. Lautmann “recognizes the necessity of linking two things in an inseparable way:

a. Working out (designing) - or, simply, understanding the mathematical theories, on the one hand, and

b. The experience, which the mind, in that working out and/or understanding, gains concerning its own ability.”

A. Lautmann expresses it still differently: “Any attempt, in the field of logic, which would wish to guide the development of mathematics a priori (meaning: by starting from mere presuppositions), in other words, disregards the real nature of mathematical truth. It is, after all, bound up with the designing (i.e., lemmatical) work of our mind”. (o.c.,101).

A.2.(i).-- Lemmatic-analytic (l.6: 41).

The current dialectic associated with scientific (science theory) points out that all science work or science praxis constantly, accepts an interaction between, on the one hand, the lemma, called by them ‘a-priori’, and, on the other hand, the analysis, called by them ‘a-posteriori’.

Note:-- ‘A-priori’ means, in Latin, ‘beforehand’, ‘prior’, in advance; and ‘a-posteriori’ means, also in Latin, ‘afterwards’.

Note:-- We can also express the word ‘interaction’ - now that we are beginning to understand what today’s professional dialecticians mean by it - in a different way: Instead of “either (subject, lemma) or (object, analysis)” the dialectician states “and (subject, lemma) and (object, analysis).”

One proof text.

“No Categories (= basic concepts), springing from our mind (‘catégories mentales’), which could manage without any experience. But also no ‘intuition empirique’ without data, provided by the mind”. (Thus Foulquié, o.c.,98).

Thus in current theorizing, “The distance, which, in the past, was supposed between the axiom (theoretical premise, a-priori) and the experimentally established fact, simply does not exist.”

L. 79.

Foulquié, o.c., *ibid.*, further explains: “The axiom emerges from the facts and the fact only becomes known thanks to categories (= basic ideas), which transcend experience:

“The analysis, carried out as precisely as possible, of the means and methods, the methods, which serve our perception, compels the linking (‘rapproché’) of the so-called fact in itself (‘le fait brut’) and the theorization (‘spéculation’).” (This last sentence is borrowed by *F. Gonseth* (1890/1975), *Préface* in *Georges LeMaître* (1894/1966; the world-famous originator of the theory of the primeval atom), *L’hypothèse de l’atome primitif*, Paris, 1946).

We assume that the fact that someone like Georges Lemaître allowed Gonseth to write the preface to his work, could suffice as an argument of authority. Lemaître, after all, was fully engaged in the science praxis : he could therefore judge the theory of that work with intelligence. --

A.2. (ii).-- Abstract.

1. ‘Abstractly’ means that, here intake scientism (science theory), the professional scientist, usually, though not always (one thinks of the scientific determination of singular (= unique, one-off) and concrete (fused with other singular data) factual modes of being (L.7)),

(a) begins at the singular concrete,

(b) to end at the general (universal) and, therefore, alien to life (“abstract”). (L. 64v.).

Well, what either conforms to that ‘abstract’ or opposes it we call ‘abstractive’ (involved in the abstract).

2. In other words, dialectically. seen, there is interaction (and...and...(L. 78)) between, on the one hand, the once-with-the-environment-grown given and, on the other hand, the abstractive attitude, which the subject scientist, takes towards that singularly-concrete (‘this here and now’),

Proof text.

“A totally abstract term (idea, concept), without any reference whatsoever to concrete reality, would be meaningless.” (Foulquié, o.c., 99).

In other words, a regulative (= abstract model without applicative (= proving applicability) models is empty. - Conversely, applicative models without a regulatory model are blind.

In this context, ‘empty’ means as much as ‘not indicated by examples (applications), and ‘blind’ as much as ‘not indicated by conceptions’ (ideas, categories).

L. 80.

As one knows, this link 'blind/ empty' (L.55) dates from I. Kant (1724-1804), top figure of the German Aufklärung (L.36: Enlightened Thinking), when he wrote, in his criticism of John Locke (1632/1704), the founder of the English Enlightenment (= Enlightenment), who claimed that all knowledge came from the senses ('sensu' (Lat.) = sense), and in his criticism of Gottfried Wilhelm Leibniz (L.51;70), the founder of the German Aufklärung, who claimed that knowledge came from the intellect (=sense):

"Leibniz intellectualized the phenomena (i.e., the data insofar as they show themselves (L.13: 'truth' as unconcealedness), just as Locke had sensationalized the concepts of reason (...)"

To rectify this double one-sidedness, he pronounced, lapidary: "Gedanken ohne Inhalt (versta: examples, applications) sind leer; Anschauungen (versta: sensory perceptions, phenomena) ohne Begriffe sind blind".

In doing so, Kant overcame - see above L.71/73: thesis (Locke's one-sided sense-knowledge); courtship (Leibniz's one-sided intellect-knowledge); summary (Kant's 'dialectical' conception of knowledge) - two very one-sided Enlightenment epistemologies (theories of knowledge).

Immediately, he gave an applicative model of dialectics concerning abstractive knowledge. (*O. Willmann, Die wichtigsten philosophischen Fachausdrücke, in historischer Anordnung*), Kempten/ Munich, 1909, 94).

Fundamentally, Kant touched, with this, on the root of the two main types of Enlightenment, namely intellectualism (Descartes, Leibniz e.g.) and empiricism (Locke, Hume e.g.).

One also speaks of two main types of 'rationalism', but then, by 'rationalism', one does not mean 'rational - intellectual behavior', but 'Enlightened' (secular; L.74) behavior', in which, admittedly, 'reason' - understood as critical reason- plays a leading role, but, then, in two forms, an intellectualist and an empiricist one.

With these opposites (L.65: harmony) the dialectic reckons .

L. 81 .

Note:-- a. -- in educational method theory one speaks of ‘inductive method’ (cf. L. 30v.) and of ‘deductive method’ (L. 26; esp. 32 (M = VZ1)), in ‘programmed’ education.

To understand the peculiar terms, it must first be said that, in the Latin - Scholastic manuals, an appl. model was introduced with ‘*exempli gratia*’ (literally: in title of example, application), shortened: ‘e.g.’. Furthermore: in English, the language of high technology, one calls ‘rule’. Well,

(A) the inductive method of data learning offers, first, one or more applicative models, in order, from there, to detach bet regulative model (‘rule’). It is called “Egrule”.

(B) The deductive method, in this regard, offers, first, the regulative model (‘the rule’), to, then, illustrate it with appl. models. It is called ‘Rul.e.g.’ (abbreviated: Ruleg).

b. - Dialectically, it reads, again: not ‘or (inductively) or (deductively)’, but ‘and (inductively) and (deductively)’. (L.32, where both methods, put in a reductive framework, are actually, ‘dialectically’ together, rather than thought and practiced apart):

That, then, is the real reason, why, even in deductive matters, we still always proceed reductively. Reason: dialectically, the two belong together!

B.1.(i).-- Complementary (additional).

Now see first L. 33 (supplementary); 37v. (collective str.).

Historical explanation.

Foulquié o.c., 101, says that the idea “complement” (complement; L.7 (ontological); 33 (methodological); 66 (methodol.)), was introduced into epistemology (science theory) by Danish physicist Niels Bohr (1885/1962) Nobel Prize winner for Physics (1922).

This, in order to settle the struggle (L.71 (I. Stalin, on the subject)) between the (adherents of the) corpuscular theory concerning the ‘atomic structure’ (the atom as a collection, resp. system (L.38) of (the Latin) ‘*corpuscula*’ (‘particles’)) and the (adherents of the) wave theory (the atom as a collection, resp. system of ‘undulations’), - struggle, which, for two centuries, raged (in optics).

L. 82.

Proof text.

1. J.-L. Destouches, *Principes fondamentaux de la physique theorique*, (Fundamental principles of theoretical physics), Paris, 1942, 158 (Foulquié, o.c.,162), says: “The idea of ‘complementarity’ (complementary character), introduced by Niels Bohr, consists in assigning an equal partial reality and to the particle aspect (corpuscular) and to the wave aspect of phenomena.

Moreover, in this particular case, ‘complementarity’ means that, in taking tests (experimental; L.42), always either one or the other aspect emerges; in other words, that the two moments never show themselves together.”

One paid attention, then: the second aspect mentioned by Destouches is purely coincidental with the idea of ‘complementarity’.

Note:-- Rightly we note, herewith, ready that ‘complementarity’ tolerates contraire (L.53v.), privative (L.53), correlative (L.54), but not contradictory (L.52v.) opposites. Unless e.g. in the above case.

2. Foulquié, o.c., 105ss., further adds, “The idea of ‘complementarity’, first elaborated in microphysics, was later introduced into other professional sciences.

a. Bohr himself, e.g., applied them to the question of (the essence of) life (biological). What is called living shows itself, to us, under two forms:

(i) a physical chemical aspect and (ii) a ‘dynamic’ (understand : more than mere physical - chemical) aspect, which goes beyond both physics and chemistry.”

b. *Gonseth, Déterminisme et libre arbitre (Entretiens présidés par F. Gonseth)*, (Determinism and free will (Talks chaired by F. Gonseth)), Paris, 1944, 181ss., proposed to introduce the idea of ‘complementarity’ on the question of (the relation between freedom (‘libre arbitre’) and determinism (whereby everything is ‘determined’, i.e. predetermined and, immediately, unfree)” (o.c.,105).

So much for the outline of a psychological application.

B.1. (ii) -- Unit Science.

One recalls even, L. 33 (internal and external compar.).

Foulquié, o.c., 106, calls this “caractère organique du savoir” (organic nature of knowing).

The term ‘unified science’ strictly speaking, comes from the ‘wiener kreis’, a group of thinkers (R. Carnap (1891/1971) in the first place), in Vienna between +/- 1920 and 1938. This group is, usually, referred to as ‘Neo - positivism’ (L. 36: A.Comte founds Positivism) or ‘Logical positivism’ (‘logical’, because language research, on a logi(sti)c basis, was practiced) or, also, ‘Logical Empiricism’ (80: Locke, Hume and others, were pioneers of French Positivism).

L. 83.

a. Well, once in the USA, several members and supporters founded The unity of science Movement.

b. Although the Neo-Positivists were, anything but, “dialecticians,” they did, nevertheless, set in motion a movement, which was, merely, the “scientific” (purely professional scientific) re-foundation, of what the dialecticians, since German Idealism (L. 67) had actually been seeking: the organi(cisti)cation of all knowledge

Proof text.

“In fact, (not only the data of the sciences are mutually complementary, but) all branches of human knowing. Thought, after all, is not made of pieces and fragments that stand alone: just as in a (living) organism (L.68), there prevails, here too, a contiguous connection.

a. Thus, one cannot understand the role (le jeu) of a single organ, without the knowledge of (all other; L.7; 66, 81 (complement)) organs, with which it is related (synchronously; L.41v.; 77).

b. As Georges Cuvier (1769/1832), founder of paleontology and re-founder of comparative anatomy, demonstrated it, at the time, the modification of a single organ involves anatomical whitening in all other (L. 60/63) organs (diachronically). (...).

c. (...) The language (...). the meaning of the words already depends or on the context (L.7; 66: complementation).

1- It is enough to modify a single word ((L. 60/63) to give to all other (L.66) terms of the sentence (= pronunciation) a modified shading.

2. By the way, this shading (nuance) (...) one only sees, once the sentence is built up, just as if the synthesis (L. 38: coll. Str.) was relatively independent of the elements (moments), which it brings together. (Foulquié,o.c., 107).

This insight into coherence (L.39v.) has been confirmed by the current structuralists, intake language, although they too are not pure dialecticians.

L. 84

Proof text.

F. Gonseth (L.79), *Les mathématiques et la réalité*, (Mathematics and reality), Paris, 1936, 43 (Foulquié, o.c.,107), says: “the words, with their meanings as far as the dictionary assigns them, are only the materials, of which the art of word building (l’architecture verbale) avails itself. The meaning (sens) of the buildings (of language) is anything but a mere juxtaposition or, even, a concatenation of the separate meanings of all uses.

Likewise, the beauty (L.56) of e.g. a temple is not merely the individual beauties of the marble pieces, the porphyry chunks, the gold particles, etc.”

With these two proofs, the first term of analogy (comparison) is given, namely, the model (paragon).

Now the second term, namely, that in which the model is depicted, namely, thinking (knowing). Proof text.

1. A theologian (divine scholar), *H. Bouillard*, *Conversion et grâce chez saint Thomas d’Aquin* (Conversion and grace with St. Thomas Aquinas), (L.20), Paris, 1943, 219 (Foulquié, o.c., 108), writes:

“Each time man evolves, an immutable truth (L.70) only holds, thanks to a simultaneous evolution of all concepts, which, among those concepts, maintains one and the same connection.”

2. An educational psychologist, *P. Guillquær*, *Journal de Psychologie*, 15.11. 1925 (cited by *G. Bachelard* (1884/1962), *Essai sur is connaissance approchée*, (Essay on approximate knowledge), 250), writes: “In all education, progress consists less in connecting a response (reaction) to a perception (stimulus) than, rather, in modifying (L.60vv.) the perception (stimulus) itself.”

3. *F. Gonseth*, *Conférence à l’Institut Henri-Poincaré*, said, “Every advance in knowledge has its repercussion on (all other) parts of that knowledge.” Foulquié, o.c.,107s., quoting previous texts, says in this regard, “The new achievements (of science) are not simply added to the others: they become an integrating (L.38: coll. str.) component of them, so that they form a single whole with them.”

One sees it: there is analogy between an organism and knowing.

L. 85.

Note: -- As for language as an “organism,” it may be added, here, that German Romanticism (L.67; 73; 77) first confronted language, in its entire complexity.

Two German-language products still show, of this, the clear traces:

(i) Karl Ferd. Becker, *organismus der Sprache* (organism of language), (1827; 1841: on a comparative basis and starting from logic and syntax (grammar), Becker tries to expose the ideal structure of language);

(ii) above all, however, *Wilhelm von Humboldt* (1767/1835), the classical humanist, founder, in 1811, of the Humboldt-Universität of Berlin - who, from a linguistic point of view, studied the entire culture both of a single people (and its “folk spirit”) and of all peoples (and their in all their multiplicity, nevertheless one linguistic unity) (thus in his main work: *Ueber die Kawi-Sprache auf der Insel Java*, (About the Kawi language on the island of Java), 3 Bde., 1836).

1. “One will have to wait until the end of the 19th century to see how the ‘linguistic structuralism’ of von Humboldt is both taken up and justified by the research of Ferdinand de Saussure (1857/1913). The latter, after all, shows that the words form integrating components (L.83v.) within a system (L.39/41)”. (*H. Arvon, La philosophie allemande*, Paris, 1970, 109; 112/115).

2. However, in contrast to the present structuralists, von Humboldt insists on the individual (L.69) as a really existing person: “Within the agreement (both national and international), there is, nevertheless, such a wonderful individualization (Willmann now quotes v.Humboldt himself:) that one can, with equal right, assert that the whole human race possesses only one language that each individual possesses his own language.” (*O. Willmann, Gesch. d. Id.*, III, 774; for Becker, above: id., 784).-- Cf. ‘and ... and ...’ L.78: 82.

Note: -- Also Theodor W. Adorno (1903/1969), of the *Institut für Sozialforschung*, founded in 1924, in Frankfurt, in his *Die negative Dialektik* (1966), opposes the idea of ‘totality’ (‘ganzheit’) of Hegel (and of Marx) (L.68). Like many others, who were the witnesses of Russian Leninist Communism, he sees totalitarianism in it.

L. 86.

B.2.-- historical (evolutionary).

Finally, another word on the diachronic (L.41) moment.

“On pain of leaving all thought,

(i) we are compelled to use the terms, which our generation accepts and

(ii) which we, by our contribution, gradually (L.60/63), transform, by using them, to some extent, differently (newly): (Foulquié, p.c., 108, quotes F. Gonseth, (*Mathématiques et réalité*, 236,)

“A living concept (i) is not created out of nothing (...); (ii) it emerges from its ‘past’ and modifies (L. 60vv.; 71) itself, by being used”. (On this, Foulquié continues): consequence: the content of our concepts is not without ambiguity (‘ambiguïté’).”

In existential language: our thinking is:

(i) “thrown” into an existing situation, which we do not choose;

(ii) “designing” new thinking content. In other words, our thinking (i) has history and (ii) makes history itself.

Proof text.

Foulquié, o.c., 109, refers to the revolution (since clarified by *Thomas Kuhn. The structure of scientific revolutions*, (Meppel, 1972-1, 1976-2), that the, at least at the time, recent theories of the microstructure of matter (microphysics; L.81) meant for the time-honored idea of ‘matter’ (‘substance’).

Notwithstanding this revolutionary re-establishment of the idea of ‘Matter’, “the word ‘matter’, by which we, now, designate that reality, so different from what our ancestors thought of it, remains laden with the meaning, which they attached to it.” (o.c.,109).

S. Gagnebin, in: *Dialectica (Revue trimestrielle*, Paris/ Neuchâtel, depuis février 1947), No. 6 (juin 1948), 272, writes, therefore:

“Thus, while the scientist passes from a former face horizon to a new one, he continues, nevertheless, to support himself on a foundation, the soundness of which is no longer recognized at all.”

And Foulquié, *ibid.*, adds, “The notions must be revised or - as G. Bachelard and F. Gonseth put it - they must be dialectified.”

General Conclusion.

Open thinking. “Our minds should remain ‘open.’”

L. 87,

This “openness” - according to Foulquié, o.c.,114 - involves

- (i) Prepare for every idea and fact, which contradict the established thoughts;
- (ii) more so, go even beyond what contradicts established thought.

1. After all, we live with the fact of our natural tendency, which causes us, in a lazy way (paresseusement), to cling to acquired propositions.”

“We - says *G. Bachelard, La formation de l'esprit scientifique*, (The formation of the scientific mind.), Paris, 1938,7 - ruminates, uninterruptedly, on the same achievement and all become - in this to all misers - victims of the gold, which we cherish.”

2. “One should say ‘no’

- (i) both to the science of past
- (ii) as to the new hypothesis (lemma), which emerges.

Rationale: “Any knowledge, if one takes it at the moment of its creation, is a polemical (disputed) knowledge” and “There is a whole eristics (L.63) at the root of heuristics (finding method, art)” (both phrases are taken from *G. Bachelard, la dialectique de la durée*, (the dialectic of duration), Paris, 1936, 24; 68).

Conclusion: an open philosophy is first and foremost a philosophy that says “no” (ibid.)

3. “Yet the scientist should not harden himself in his denial (L.72): the ‘philosophy of the “no” is only denial in order to be all the more open.

a. Thus, e.g., a “non-cantorianism” is

- (i) absolutely not the pure rejection of what I. Kant (L.80) thought;
- (ii) but a Kantian-inspired philosophy, which transcends established (‘classique’) Kantian doctrine, i.e. opens it up to other points of view.” (ibid.).

b. Thus, also, concerning logic (logistic), the fact that “some modern thinkers, who ‘dialectize’ the principle of the excluded third (L.15) (L.86: bottom),

(i) juxtaposed with Aristotle’s divalent (i.e., either working with “true” or with “false” (L.15)) logic (L.4; 5),

(ii) designed a trivalent (with ‘true’ ‘false’ and neither true nor false’ working) or, even, a multivalent logic (= logistic) (Foulquié, o.c.,118),-This is, apparently, an openness, which is ontological (transcendental: L9) and, finally, rests on the idea of being.

L. 88

II. Thought-provoking models.

1.-- A doctrinal model of comparative ordering.

A.-- *G.G. Granger, Pensée formelle et sciences de l'homme*, (Formal thought and human sciences,), Paris, 1967,1/6, explains structuralism, in his view, goes back, among other things, to the following three types of thought.

(a) The science of language

The linguistics of B. de Courthenay and, especially, Ferdinand de Saussure (1857/1913), who assumed that language (as a “code” or available sign system) was a coherent whole, especially of pairs of opposites (L.85; 53).

(b) The mathematics

Bourbaki's mathematics;-- a group of young mathematicians, whose collective pseudonym is ‘Bourbaki’, rethought, since 1939, starting from such revivalists as G. Cantor (L.28v.), the whole of traditional mathematics and centered it around the idea of ‘structure’ (of a ‘system’) of mathematical ‘objects’ (think of order, algebraic and topological structures). Cfr L.41.

(c) The ‘system technology’

The ‘system technology’ of *Martial Gueroult* (1891/1976), who conceived of an analysis of e.g. the works of R. Descartes (L. 36; 50v.; cf. with Sartre's interpretation of Descartes) as the piecing together, on the basis of texts and testimonies, of Cartesian philosophy as a system with a well-defined structure; so in his *Descartes selon l'ordre des raisons*,(Descartes according to the order of reasons), Paris, 1953. Granger says that Gueroult fitted the logical consistency (coherence) of Desartes' claims into the idea of ‘(relatively) closed system’.

Note.-- The expression ‘systems technology’ is misleading, better true ‘systems analysis’ Cfr L.38/41.

B. -- On that background we grasp the importance of the genesis of *Ch. Bally/ A. Sèchehaye/ A. Riedlinger*, publ., *Ferdinand Saussure, Cours de linguistique générale*, (General linguistics course,), Paris, 1916-1 (1931), 7/11 (*Préface de la première édition*). In this, de Saussure's students outline the method, according to which, from the testimonies of their teacher's teaching, they - in this similar to M. Gueroult - put together the coherent system of semiological linguistics by systematic comparison.

L. 89,

C.-- We restructure, however, the preface according to the reductive scheme (L.6; 12 (= lemmat. analyt. form); 23; 26 (syllog. form); 24 (operat. form); 41). Cfr L.78!

a. Observation.

a.1. -- given (situation):

(i) The publishers had followed de Saussure's teaching (i.e., had an idea);

(ii) The corpus (i.e., the total collection of texts; L.22 (inventory)) consisted, after the thinker's death, in 1913, of very scarce notes: "It was necessary to resort to the notes recorded by the students - during three series, conferences, at the University of Geneva (1906-7; 1908-9; 1910-11)." (O.c.,6).

In other words, the summative induction or inventory (L.11; 30v.), which ensures the completeness of observation, was the first task.

a.2. A faithful reconstruction

(i) in virtue of the. available data (a.1.)

(ii) make a faithful reconstruction of the doctrine of Saussure both in its elements and in its totality (L.38; 63v.: coll. structure; organism).

b. Reduction

The corpus or bounded collection of texts is now being edited, - and twofold: substantively and textually.

b.1. - Abductive reduction (= lemma).

The question assumes (= hypothesis (L.6, etc.)) that, in the corpus, something like a coherent doctrine can be found.-- This is the regressive reduction.

b.2 -- Progressive reduction = analysis

If there is a consistent doctrine, it must be found by methodical comparison of the texts. One designs, in other words, the research.

b.3. -- Peirastic reduction (= analysis 2).

We summarize the study in two aspects.

(1) Content reduction.

"What were we going to do with these materials?"

a. An initial critical work (L.77 / 79: praxis) intruded

1/ for every course and 2/ for every trifle (L.46: singularly given).

b. One had to compare all (L.22: summative) versions (en comparant toutes les versions), (by comparing all versions), --in order to penetrate to a thought. B.1. of which we possessed only echoes and then sometimes contradictory (L.15; 52; 37) echoes". (ibid.).

L. 90

b.2. “F. de Saussure belonged to the type of people, who constantly renew themselves (L. 69. 86: dialectic)”, -- which made the comparative ordering (L.33/87), basis of the reconstruction, even more difficult, of course. The (dialectical) ‘living’ is difficult to ‘fix’!

(2) Rhetorical (textual) reduction.

Note.-- In anticipation of the course on “rhetoric” (L.1) (Second Year), we say the following about it:

A. “All products of the mind (‘oeuvres de l’esprit’) - according to Geruzez (a rhetoric specialist, cited in the text) - come about in the order of three operations:

a. the invention of ideas (heuristics. L.34; 87 (dialectics));

b. the arrangement of these ideas (harmology; L. 20vv.; also called ‘taxeology’,-- from the ancient Greek ‘cabs’, order(ning), arrangement of a multitude (elements) according to a unity (structure));

c. text formation (= design or, in Anglo-Saxon, ‘design’), which is traditionally referred to as ‘stylization’ (hence: stylistics)”. This triad dates, at least, from Aristotle.

B. “These three operations are **(i)** distinct and **(ii)** yet; they are highly interdependent (l. 81vv.: complementary).”

(A. Langlois., *Le style (La Chose et la Manière. Du XVIIe au XXe siècle)*, Bruxelles, 1925, 56 (*Rhétorique*)). More on this in the coming year!

A. -- “And after that? The textual form, peculiar to oral teaching, often in conflict with the form, peculiar to the book (to be made), presented us with the greatest problems.” (ibid.).

This shows - from the text of the French preface - that rhetorical or textual problems, do, **(i)** exist (l.7: factuality) **(ii)** as their own mode of being (L.7).

B -- First of all the authors of the texts proceeded summatively (L. 22/32) but, now, with respect to the possible forms of text. this, in order to carry out a rational-responsible choice out of that ‘sum’ of possible texts. All rational behavior proceeds, first of all, from the sum (collection) of possible types of behavior.

Here one had four options;

(1)a. Publish particularly original portions of text;

(1)b. one single course fully publish;

(2)a. publish everything in its original text form;

(2)b. from the totality of the corpus (including de Saussure’s personal notes) cfr L. 89 (summative ind.) - compose your own text.

L. 91.

Note.-- This method is typical of structuralism, which, as seen (L.88), feeds on de Saussure's linguistic method.

Thus, e.g., to study orderly the different forms (types) of "totemism" (an archaic religion), *Cl. Lévi-Strauss* (1908/2009.), the cultural anthropologist, first proceeds summarily. In his little work *Le totemisme aujourd'hui*, (Totemism today,), Paris, 1962, he explains this, briefly.

1. Once given the object of study, here: totemism;
2. the analysis can begin, but as an analysis of at least two terms (L.7: factual views), however related to each other (L.41; relations, structure, system).
3. This analysis, however, proceeds summatively (collecting) first.

In this case, Claude Lévi-Strauss, first, purely speculatively (L. 79), makes -- what is here schematically, render a collection ("sum"):

nature --	'category	'category	'single	'single'
culture --	'group'	'person	'person	'group'

Cl. Lévi-Strauss, o.c., 22s. adds, "All these terms are arbitrarily chosen,-- calculated, in order to distinguish in each (fourfold) series (L.46; Cartesian ordering), two modes of existence, one collective (= e.g., 'group'), the other singular (= e.g., individual, person)."

Cl. Lévi-Strauss adds, paradoxically, "In this preliminary stage (of analysis), one could choose any terms (in the place of 'nature' e.g. 'x' and in the place of 'culture' e.g. 'y'; etc.), if only sitting is distinct (L.51: exact)."

One sees: Lévi-Strauss, in France, the Cartesian country, continues the accuracy tradition.

4. Only then is it "empirically" (L.23v. (St. Mill); 36 (D. Hume)) given. (the object of study) - in that light - gone through empirical analysis).

L. 92

For example.

(a) Australian totemism, with its ‘social’ and ‘gendered’ contents, presupposes (L.78v. (dialectic)), as a lemma, a relation (L.41) between a ‘natural category’(empirical: e.g., a plant or animal species, a collection of phenomena or objects) and a ‘cultural group’ (empirical: a religious society, the totality of either men or women).

Existentially (L.13; 18; 30 ;77v.: the encounter of phenomenologists) it is the case that a social group makes a typically religious commitment to e.g. thunder (phenomenon), a lucky stone (object), the kangaroo (species), etc.

(b) North American Indian totemism, within which a “single person”, through sometimes very crude and severe “ordeals”, creates “union” between him (her) personally (singularly) and a “natural category” (as in (a) above).

(c) The Mota (Bank Islands) type, within which a newborn is considered to be some embodiment (commitment type) of a plant, resp. animal, either encountered or consumed by the mother, at the time she becomes aware of her pregnancy; -- which amounts to the commitment ‘natural individual’/’cultural person’,

(d) The Negro-African type, within which the cultural group (e.g., some local people) collectively (L.38) e.g., a single ‘consecrated (sacred)’ individual (a crocodile e.g.), locally, ‘worship’ and ‘protect’, this, as a form (type) of religious commitment.

Cl. Levi-Strauss, o.b., 24, says: “Purely ‘logically’ (doctrinal thinking) the four connections (L.35vv.: connections) are equivalent (‘equivalent’). Reason: they are begotten by one and the same (doctrinal) operation (*opm.*-- The list, middle L.91) but, in fact, only the first two (category/group; category/person) were ranked under the actual name used ‘totemism’“

In other words, the empirical language is not logically sound.

It gives a first insight into the structural method. It is entirely “comparative ordering” (L.33/66). Harmology is the support of logical work.

L. 93.

C -- *The empirical choice (from the ‘sum’ of possibilities).*

We quote, simply, the Préface.

a.-- “To publish everything in the original text form (L.91, ad (2)a) was impracticable. The repetitions, inevitable in a loose exposition, -- the overlaps (by which parts of the text are, in part, identical), -- the varying wordings,-- all this would have given, to such a mode of publication, an uneven appearance.” (O.c.,9).

b.-- “To confine oneself to a single course (L.90,, ad (1) b) - and, then again: which of the three courses given by de Saussure? -, amounted to stripping the book of all the riches, which were abundantly spread over the two others.

Even the third, the most definitive, would not, by itself, have been able to hang a complete picture (L.89: ad a.2. (task)) of **(i)** the theories and **(ii)** the methods of F. de Saussure.” (ibid.).

c.-- “It was proposed to us that well-defined particularly original portions of the text (L.90, ad (1)a) should be written as they were available.

Although at first we were glad of this, it turned out that this method of working would disfigure our master’s thought. Indeed, only fragments were brought to light,-- and this, of a construction, the value of which only becomes apparent when it is there in its entirety (L.89,ad a.2.(task)) “. (ibid).

d.-- “We have, in the end, adhered to a bolder way out, which -- we believe -- is also more rational (L.90, bottom):

(i) on the basis of the third course (L 90, ad (1) b),

(ii) a reconstruction (an overview), representation of coherence (‘synthèse’), yet in such a way that we used the totality of all available textual materials (‘corpus’; L.91, ad (2) b), including the very scarce notes of de Saussure.” (ibid.).

B.4. - *Evaluative reduction.*

The ‘evaluation’ or summary value judgment reads as follows: “In other words, we ventured into a re-creation, which was all the more precarious, the more it was supposed to be a completely accurate representation of de Saussure’s thought. (L.86 (historical/ evolutionary)).

From such work of comparison and reconstruction, the book emerged (ibid.).

L. 94.

2.-- Phenomenology as comparative ordering.

1.a. -- *M. Heidegger, Sein und Zeit, I, Tübingen, 1949-6, 27/39*, outlines, briefly, the essence of Husserlian phenomenology (L.13 (idea of encounter); 18 (lived method); 30 (intentio, i.e., consciousness orientation); 77 (intentio as interaction (labor) between subject and object)).

b. Heidegger typifies phenomenology, along the lines of his teacher Edmund Husserl (1869/1938), twofold :

(i) the correct information concerning the word ‘phenomenon’ (phenomenon, given) and

(ii) the utterance of what the phenomenon is (i.e. phenomenology). “The expression ‘phenomenology’ contains two components : ‘phenomenon’ and ‘logos’. Both derive from ancient-Greek termini ‘fainomenon’ (that which shows itself) and ‘logos’ (expressing what something, namely the phenomenon is)” (o.c., 28)

c. Phenomenon

None other than *G. van der Leeuw, Phäomenologie der Religion, Tübingen, 1956-2, 768*, expresses Heidegger’s idea with utmost accuracy. Here is what phenomenologists mean by (the term) ‘phenomenon’: “the phenomenon (...) is that which shows itself.

This involves three things:

(a) The phenomenon is “something” (cf. L. 7);

(b) that “something” shows itself (cf. L.13: truth, understood phenomenologically as “unconcealedness”);

(c) this same “something” is called a “phenomenon” precisely because it shows itself.

Whereby - according to van der Leeuw, *ibid.*, - the ‘showing oneself’ is a relation (L.41) between:

a/ that which shows itself (the so-called ‘noema’ (Husserl’s term for ‘object’)) and

b/ the one, to whom it shows itself (the so-called ‘noetic’ moment, the subject’).
Up to there van der Leeuw.

Explanation.

All phenomenologists will tell you that, by that definition, Husserl imposes a “reduction” (here in the sense of “elimination” (reduction to the pure (= pure) phenomenon; purification) (called the phenomenological reduction or purification).

Comparison.

Expressed in the terms of C.S. Peirce (1839/1914), who, in his pragmatic way, had a keen awareness of the phenomenologically understood “phenomenon,” one can say that following “impurities” should be banished from attention insofar as it is directed at the pure phenomenon.

L. 95.

IA. Does not belong to the phenomenologically pure phenomenon all that the “tradition” says about it .

1. Peirce calls this the ‘method of authority’. It consists in thinking about the pure phenomenon and saying what the others think about it.-- Strictly speaking, this is authoritarian thinking.

2. One can also call this attitude ‘rectitude method’. Reason: ‘rectitude (not to be confused with sincerity) means, in Dutch, ‘that which adheres to the thinking of others.- What tradition says is what others say. In other words, tradition is one type of righteousness basis.

‘Straightforwardness’ (adhering to what others, who hold a ‘belief’ for you, say) is a second type.

IB. Does not belong to the phenomenon, in the pure sense, all that can be labeled as “mere subjective judgment” of that phenomenon.

1. Peirce calls this “method of tenacity. Which can be translated by ‘method of tenacity’. Peirce himself speaks of someone who, on the subject of free trade, wanted to read only free-trade newspapers,--this, in order not to have his ‘own’ judgement compromised: for that man it was not - Husserlian expressed - about the ‘pure’ phenomenon of ‘free trade’, but about what he - obstinately (= non-open: L.86v.) thought about that phenomenon!

In other words, what we, all of us, taken separately (singularly, individually), think about the phenomenon, should be purified.

2. Peirce still calls this, in a second way, a-priori method’ (L.78). Peirce means, by this, a reaction against both the self-willed method and the rectilinear method. Those who, although adhering to either their own or to group judgment, break through it by introducing free discussion. If you will: the free-discussion form of the two preceding ones.

Their flaw is: they do not start from the phenomenon in itself, but from their own (individual or group) judgments (prejudices), called by Peirce a-priori’, concerning the phenomenon.

L. 96,

3. The Enlighteners who call themselves “freethinkers” but who lapse into preconceived opinions, are a type of “aprioritarian” - or, as one also says, “foundational” - thinking. The Western European Enlightenment (L. 36; 67; 70; 80 (two types of ‘foundational’ (understand: aprioritical) thinking, the intellectualist and the empiricist)) assumed, “authoritatively” (as Karl Popper and his pupil W. Bartley say), that ‘true’ knowledge

1/ or, as the axiomatic-deductive geometry, had to be intellectually ‘grounded’,

2/ either, if the experimental natural science, or sensory way had to be ‘grounded’.

a. People like *G.E. Moore* (1873/1958), the commons thinker - in his *A Defence of Common Sense* (1925) - and, from 1934, Karl Popper (1902/...), as well as e.g. *W. Bartley, Flucht ins Engagement (Versuch einer Theorie des offenen Geistes)*, Munich (Szczeny Verlag), 1962, have pointed to the foundationalism of the Enlightenment.

Consequence: the pure phenomenon is, even for that freethinking type, inaccessible. Reason: if the phenomenon does not fit into their frame of mind it ‘does not show’ itself.

b. Says Peirce, *The Fixation of Belief*, in: *Pop. Sc. Monthly*, xii (1877), 1/15: “Deeming the influence of natural preferences permissible,--once, however, such that, under the influence of those preferences, men ;

1. talk to each other and

2. view things (understand: phenomena), under different illuminations, in order, thus, gradually, to develop opinions corresponding to natural causes.”

Behold the type of aprioritarian thinking.

Peirce sees, of these, mainly, two types: products of art 1.; 2. some “metaphysicians” (philosophers), Says Peirce: “Systems of that type do not, ordinarily, proceed from facts of observation,--at least not to any great extent.

They were, above all, favored because their axiomata (presuppositions, a-priori) had the appearance of agreeing with ‘reason’ (understand: rationalistically devised ‘reason’).”

This expression ‘agreeing with reason’ is a technical term: it does not mean what agrees with perception, but that to which to believe we are inclined.” (ibid.).

Peirce explains this with an applicative model.

Platon, for example, finds it “contradictory to reason” that the distances between the orbits of the heavenly bodies are proportional to the various lengths of string that produce harmonic sounds in a musical instrument.

L. 97.

Many philosophers -- so far as their main conclusions are concerned -- have been guided by reflections of that type. (*Note.*-- Platon, indeed, especially toward the end of his life, thought Paleopthagorean (L.2; 48 ; 94); on the music (better: 'chorea' - bound) interpretation of planetary and stellar relations we shall speak later.

Peirce speaks, here, purely modern-physical).-- Peirce continues: "It is clear that another man (than, e.g., Kepler himself) would find Kepler's theory (*note* -- J. Kepler (1571/1630) is known for his laws concerning the solar system), which asserts that the orbits of celestial bodies are proportional to the (...) orbits of various regular bodies, 'more consistent with his 'reason'" (ibid").

IC. Does not belong to the phenomenon, in the phenomenological sense, all that can be called theoretical, such as e.g. hypotheses (=abductive or regressive reductions), proofs (so the ideological reasonings (L.1)).

Husserl himself captured this in a lapidary phrase: "zu den sachen selbst" (Return to the data itself).

1. Peirce expresses this in his way: 'external permanency'; or also: 'the scientific method'.

By the term "external sustainability," he means that the phenomenon is

1. is independent of our "internal" operations (representations reasonings, tastes) and

2. emerges in a repeatable manner as independent of our subjective edits.

2. Peirce, evidently, identifies, thus, 'representation of phenomena' and 'scientific method' (so that 'scientific' here is to be understood in the very broad sense). In other words, different from the above-mentioned rationalists (illuminators), who identified 'scientific' with 'intellectual' or with 'sensory experience' (L.96).

I.D. Do not, however wonderfully, belong to the phenomenon :

1. -- The "I" (subject) as a source of "deeds" (e.g., dislike for a theory or, e.g., for the myth, which one wishes to investigate as a phenomenon);

L. 98,

2.-- The acts (as Husserl says), i.e. the modes of approach, of that same 'I' -- except, of course, a type of act (and, immediately, of 'I' - involvement; as van der Leeuw says (L.94: the one, to whom the phenomenon shows itself)), namely, the 'pure' opening up; the pure 'attention' (as an object-, phenomenon-oriented act).

This involves the purging of all purely soulful (psychologically relevant) interest. In other words, "phenomenology" is not "psychology".

Says *Husserl* himself, in his *Die Idee der Phänomenologie (Fünf Vorlesungen)*, Haag, 1950, 44 (ed, and intr, W. Biemel): "The 'I' (as a person, as a 'thing' (comprehend: given) within the framework of the world) and the experience (as the experience of this person,-- happening, situated -- though, perhaps, completely vague - - in 'objective (comprehend: measurable) time'),-- these two, I and experience, are 'transcendences' (comprehend: data lying outside the actual phenomenon). (...).

The purely 'immanent' (viz: situated within the phenomenon itself) can be described by the 'phenomenological reduction' (viz: purification). in that case I (as a phenomenologist) mean precisely 'this there' (viz: the given, the phenomenon). and not what it 'transcends' (i.e. by reference to what is outside, him). yet, solely and exclusively, what is meant is what the given (phenomenon) is in itself". (ibid., 45).

II. Belongs, likewise, not to the pure (purified by the phenomenological 'reduction' - elimination) phenomenon, the actual and outside my consciousness situated existence of the phenomenon.

Were the expurgations, so far, expurgations intake the mode of being (L.7), the latter concerns the correct characterization of the factuality of the phenomenon.

Thus e.g. the flower 'molu' (*Homer, Odusseia*, X, 305), which Odusseus receives from the god Hermès (Hermeias), with black root and milk-white flower, in order to visit, without danger, the 'mooigelokte Kirkè', the magicianess, is - phenomenologically - nothing more than what Homer says about it. Whether, they beyond that textual fact, also e.g. (what Hans Reichenbach (1891/1953), member of the Wiener Kreis (L.82), called 'transempirical' can be verified, as 'magically working flower' remains "in brackets" (purged).

L. 99.

E.g., when someone believes they see a “lilac” color around someone’s body circumference; as a phenomenologist, one can only say that someone claims to see a so-called “aura”; nothing more.

Again: with Hans Reichenbach, whether this type of ‘lila’, which is certainly not a physical (and therefore either intellectually or sensorially experienceable (L.80; 96)) given (phenomenon), is experienceable and/or testable in a ‘transempirical (= supersensory, mantic-paranormal (L.27; 64) way, the phenomenologist, unbiased (L.94/97), leaves in the middle and merely notes the assertion (with its ideal content).

This, in contrast to the rationalist (Enlightener), who a-priori’ already ‘knows’ (!) that “there is no such thing”.

Note.-Cfr. L.9 (on the misrepresentations of the idea ‘being(the)’; 87(at bottom: dialectical openness)).-- Properly understood ontology shows the phenomenologist the way concerning factuality type, Cf.r L. 7.

In this way we interpret *Heidegger’s* words (*Sein und Zeit*, I, 35) : “Phenomenology is the mode of gaining access (...) to that which ought to become the theme of ontology”.

Conclusion:

L. 94/99 (Ad (i) phenomenon) has clarified to us (analysis; L.6; 41) what we, all of us, lemmatically (L.6; 41), know to be phenomenon (that which, however it shows itself).

That analysis proceeded comparatively: by comparing the pure phenomenon with what tradition, mere subjective judgment, theoretical processing, the self and its deeds, our inner consciousness say about it, we have distinguished (therefore not yet separated) it from what it is not. Husserlian: purification (‘Reduktion’).

Bibl. sample.

In addition to named works (articles):

-- *I.M. Bochenski, Philosophical methods in science*, Utr./Antw., 1961, 27/44 (*The phenomenological method*);

-- *H. Albrecht, Deutsche Philosophie heute (Probleme/ Texte/ Denker)*, (German Philosophy Today (Problems/ Texts/ Thinkers).), Bremen, 1969, 21/37 (*Edmund Husserl*).

L. 100.

c. (ii) Pronouncing.

a. The antique Greek word 'logos' (still resounding in phenomenologie, according to M. Heidegger, *Sein und Zeit*, I, 32 - means (...) something like 'déloun', make public (show) that, of which, in the exposition, there is mention.(...).

The logos, i.e. the bringing up, shows something ('fainesthai'), i.e. what one is talking about, - and this both with regard to the one who speaks (medium) and with regard to those who are involved in that conversation.

Bringing it up 'shows' ('apo-'), starting from that itself about which bringing it up is talking. In that 'speaking about' ('apo.fansis'), as far as it is real, that which is said (expressed), should be drawn from that, about which it is speaking (...). This is the structure (L.38; 41) of the logos as 'apo.fansis'. So much for a sample of Heideggerian 'speaking'.

b. After all we have said, above, this seems obvious. And yet: someone like *H. Arvon, La Phil. allemande*, 140 (speaking of Husserlian phenomenology), distinguishes stages in phenomenology. Thus, among other things, there is purely descriptive or descriptive and, on top of that, 'eidetic' (what Max Scheler (1874/1928) himself also an excellent phenomenologist, called 'ideative') phenomenology.

We explain this, using two appl. models in more detail.

Appl. Model 1.

E. Husserl, *Die Idee d. Phän.*, 56f., gives us "the porridge in the mouth.

(i) "I live through - he says - a singular intuition (Einzel. anschauung') or, also, several singular intuitions of e.g. 'red'".

This means, in common-sensical terms, I see e.g. this red here and now, then that red there.

(ii) *Purely descriptive phenomenology.*

This would consist in rendering (bringing up,-- to speak with Heidegger), as a novelist or poet does, these singular perceptions (intuitions are direct perceptions) as accurately as possible. Nothing more.

(iii) *Ideative (= eidetic) phenomenology.* Cfr L .22/32

(summative induction).-- "I without wondering what else that 'red' means (= phenomenological 'reduction' (purification)). (...).

L. 101,

I complete, purely contemplating the 'Sinn' (meaning, 'sense') of the thought 'red without more' ('Rot Uberhaupt'), (...), something like the general 'red',

(i) that, thanks to the (pure) beholding (= intuition, situated in perception), from this red here and now and from that red there and then, was abstracted and

(ii) which, in all cases of red taken separately, is identical.

a. Immediately the singular red, in its singularity, is no longer meant (= mere deskriptive phenomenology),

b. but 'red-without' (= ideative or eidetic phenomenology)"; (E. Husserl, o.c.,56f.).

Note: --

1. A little further on in the text, Husserl speaks of "pure beholding and ideating ('ideating') attention." This means that the pure beholding, of the general being (here: of 'red'), is at the same time, ideation, i.e. the foundation of the idea ('red'). Hence the name 'ideative' phenomenology.

2. Phenomenologists also use the term "eidetic" phenomenology.

The reason is that, in ancient Greek, 'eidos', idea, being, gives rise to the adjective 'eidetic' Which means the same as 'ideative'.

Note: --

One compares, now, what has been said about summative induction (L. 22, 32), with Husserl's ideation (concept formation). It is, immediately, clear that it is the same process. Yet approached differently. Husserl wants the phenomenon (given) 'pure', purified of all 'impurities' (L. 91). The emphasis is on the purified perceiving ('beholding'),--and only then on the inductive process (summering).

Historical Verification.

Again, the matter is older than the concept.-- Already Socrates of Athens (-469/-399), the founder of the philosophy of concepts, and Platon of Athens (427/-347), the founder of the philosophy of ideas, practiced, in their own way, the phenomenological method.

Reason.

(i) **Socrates**

a. departed from the common sense of speech (common sense);

b.1. awakened the contemplation (contemplation) of a given - so e.g. the just - by means of examples (= appl. mod.) and

b.2. sought to define, as purely as possible, the general concept ("just").

L. 102.

Appl. Mod.

In *Platon's* dialogue *Menon*, one shows us the process: Menon says that 'virtue' (understood all generally) is three- or even multiple-specified. For the man, 'virtue' (understand: virtue) is "helping to run the city-state soundly", for the woman "sound housekeeping", and for the child, -- the third-age man, a crowd of others, "something different each time".

Let us briefly articulate this socratic maieutics (= phenomenology) in reductive scheme (L.26)

(A) Observation.

1. Given.-- It is a fact: at Athens, on the agora, the word (= term) 'virtue' (or 'science') is used; -- and this in not always a totally identical sense.-- Consequence: a little 'Babelian' confusion of speech.

2. Task (asked).-- Socrates wants to arrive at understanding inductively. This, in conversational form ('dialogue') -- not authoritarian (L.95).

(B)I. Regressive (= abductive, hypothetical) reduction.

Suddenly one of the discussion partners, confronted with (L.13: meeting;77) the theme, - the lemma, -- thinks he has found a definition: "if virtue is sound policy management, then I understand both the word 'virtue' and the actual way of being (L.7) to be indicated by it".

Or: "if science is 'sense perception', then I understand AND term AND reality to be 'science'". A new lemma arises. it awaits analysis.

(B)II. Progressive (deductive) reduction.

(i) "If virtue is sound policy administration, what if it is claimed to be 'sound housekeeping' (feminine point of view)?" Let us examine.

(ii) "If science is sense experience, then what if another definition is 'true, (i.e., consistent with the given (L.14: logical truth)) opinion'?" Let us check.

(B) III. Peirastic (testing) reduction.

Socrates (or one of the dialogues) points to the identical in the multitude (L.35).

(i) Virtue is, for both man and woman, **1.** sound approach, governing **2.** approach. Though now once in the city-state, then in the family,

(ii) Science is e.g. sensory experience, in so far as it rings to true opinion.-- Falsification is there in part. Verification is also there.

L. 103.

(B) IV. *Evaluative reduction.*

Since there is both falsification (proving that the lemmata does not hold, unless partially) and verification (proving that the lemmata (proposed definitions) does hold), the analysis must continue,

(i) Virtue, as e.g. children embody it, is indeed sound approach and governing approach, but then e.g. of their own lives. Etc.

(ii) Science, as e.g. mathematics shows it, does not rely (immediately) on sensory experience, but on reasoning.

Consequence: true opinion can be based, in addition to sensory experience, on intellectual insight.

Result: as a general trait of knowledge (L.25v.: ‘k’), ‘true opinion’ can be retained, but then based either on sensory experience or on rational reasoning (cf. L.80 (intell. and empir. rationalism); 96; 99) or on a ‘transempirical’ basis (L.99).-- What then is natural, should be checked (tested).

(ii) *Platon*

a. departed, of course, also from the common-sense data, to, in virtue of

b1. applicative models

b2. to arrive at a single ‘idea’ (regulatory model) (ideation). Yet the emphasis is different from that of his teacher Socrates.

In the so-called *Seventh Letter*, apparently, if not by *Platon* himself, then by someone who represents his teaching very accurately, *Platon* says the following. “As regards every being (L.7), there are three modes of acquaintance, which allow one to acquire knowledge of it.

(i) *The first mode of acquaintance is the name.*

Thus e.g. -- says *Platon* (ibid.) -- ‘kuklos’ (L.23; below), circle(loop), circle. Behold something that is verbalized, -- that viz. what is called ‘kuklos’ (circle) by means of that ‘name’.

(ii)a. *The second mode of acquaintance is the definition (essence definition).*

This according to *Platon* consists of nouns and verbs (*note* -- *Platon* is the first to analyze the sentence structure as ‘onoma’ (nomen, name(word)) and ‘rhèma’ (verbum, predicate); -- which still survives in Noam Chomsky’s language as ‘noun and verb’ component of the sentence).

Here - so always *Platon* -: ‘That whose extremes, everywhere, are at an equal distance from the center’. Behold a determination of being of that being, whose name is ‘round’, ‘circumference’, ‘circle’ (circle).

L. 104.

It is clear that the regulative model (L.26) is articulated here: for all data ‘round’, ‘circumference’, ‘circle’, it is true that the extremes are, everywhere, at an equal distance from the center point.

(II)B. *The third mode of acquaintance is the image (“shadow”).*

Thus, in this case, the drawn circle, which one, afterwards, erases again.

Clearly the applicative model (L.26) is meant here : this circle drawn with chalk, which, afterwards, again, is wiped out, is a single (singular) case, illustrating the general idea ‘circle’. Nothing more. For there are countless others which, likewise, ‘represent’ the general idea or ‘are the shadow of it’.

So much for what even Socrates, as a conceptualist (philosopher of concepts), would have accepted. But hear what Platon says immediately afterwards: “the circle in itself (understand: the general idea ‘circle’), on which all these things (name, determination of being, representation) are involved, does not undergo - what they do undergo, viz. - coming into being and passing away, (here e.g. being drawn and being erased; being spoken and - verba volant - not being audible thereafter), because the circle in itself is different”

What is called ‘transcendental’ (‘transempirical’) idealism shines through here: the idea ‘circle’ reaches, somewhere, beyond both the word-sounds (name, definition) and the material realizations (drawing). This is also called ‘light metaphysics’:

“If **(i)** names, **(ii)a** defining descriptions by means of words, **(ii)b** sensory perceptions and observations (= pictures), which are related to statements about the nature of things, are recited in the title of information,-- if, further, we follow, without passionate pedantry, the correct ‘dialectical’ method, only then does the light of pure incorporeal perception and of the pure intellectual grasping of the inner essence of things appear” (*Platon, VIIth Letter*).

The idea is a light, which illuminates.

L. 105.

To sum up, both the name and the definition and bringing before us of one or more specimens (images) are only, the poor prelude to the higher idea, which a light equal, breaks through.

One can illustrate the leap from one to the other in a topical way.

1. A computer can be filled, with great ease, with

(i) The name,

(ii)a definition and his screen can, with great ease,

(ii)b display a visible specimen (shadow, image, example): himself, however, he is a blinds machine, nothing more

2. Only “the noble soul of man, the object of education” (according to *Platon, VIIth Letter*, in that it is related to the idea (although not completely, for the idea is merely the content of thought, while the soul is a living being), sees, through and the giving of the name and definition (as a formula) and example (exemplification), the pure phenomenon in its general form (= idea, concept).

Bibl. sample.

Except for the writers cited above:

V. Goldschmidt, *Les dialogues de Platon (Structure et méthode dialectique)*, Paris,. 1/12 (*Les étapes de la démarche dialectique*).

Note:-- Both Socratic maieutics and Platonic dialectics do contain, therefore, a phenomenological core.

1. And, yet: there is a big difference! Both thinkers thought, well, individually, of course. But what they thought - alone and lonely - was tested and clarified in the group (the discussion group), in dialogue, (philosophical conversation). That, precisely, is what is missing from Husserl (and many a phenomenologist).

2. Jacob Levi Moreno (1892/1974), though far from being a phenomenologist, has, in his own way, drawn attention to group process (“group dynamics”).

This founder of sociometry has - without realizing it - re-founded, for us phenomenologists, an antique Greek model: the clarifying-checking conversation.

3. Jules Romain (1885/1972), -- with us, Ina Boudier-Bakker (1875/...) and others, who are called unanimists because they drew up the mutual relationships of people (first of all, on the vital level (L.77: meeting levels)), have, in their own way, also sharpened the eye for us phenomenologists to the subcutaneous group relationships.

L. 106.

4. Let us listen to what Platon (ibid.) writes literally: “Precisely from repeated conversation (on that subject), as well as from intimate coexistence, suddenly, that idea in the soul, as, from a spark of fire, the light kindled, emerges and then, itself, paves its way further.”

In other words, our souls are in subconscious connection with the souls of our fellow men, especially when we search together.

Note: -- Phenomenology and phenomenological psychology;-- L. 98 we said that there is a creature distinction between phenomenology and psychology. Yet phenomenological psychology is quite conceivable. One word about this.

1.-- “Every intellectual (i.e., springing from the mind) experience and, even, every experience without more, because it occurs, can be made the object of a pure contemplation (L.100v.) and grasping.” (*E.Husserl, Die Idee d. Ph.*, 31).

2.-- “To every psychic experience corresponds (...), o.g., phenomenological ‘reduction’ (purification; L 94vv.), a pure phenomenon.” (ibid., 45).

In other words: in such a case, psychic permeation itself is object (thanks to introspection and retrospection) of ‘Wesensschau’ (i.e. ideation (L. 101)).

Appl. Model 2

Max Scheler (1874/1928), *Die Stellung des Menschen im Kosmos*, (The position of man in the cosmos,), Darmstadt, 1928 (1930), 60ff., gives us a second application of ideation (‘Ideierung’), i.e. one of the possible types of phenomenology (L. 100) which allows us a broader perspective.-- We ‘translate’ them into reductive schema (L. 26: 41).

(A) Observation.

1. **Given:** I have pain in the arm (according to Scheler’s appl. mod.).

2. Requested.

(a) the subject-scientific interpretation (which Scheler calls ‘technische Intelligenz’ (technical intelligence)). In other words, the positive-scientific approach (L.1).

(b) the phenomenological approach (and indeed its ideative form), as an illustration of what philosophy, as distinguished from professional science, is.

L. 107.

(B) Abductive (= regressive) reduction

(a) Subject matter.

“An issue, typical of ‘technical intelligence’ (propositional science) were something like this: ‘I have, here and now, a pain in the arm.

(i) How did this pain arise?

(ii) How can this pain be eliminated? To determine that was correspondingly a task (see ‘asked’) for positive science” (o.c., 60).

Ad (i) The pathologist (pathologist, nosologist) responds e.g. as follows: “if in that arm a tumor of malignant nature is proliferating, then the painfully-miraculous fact is explained”. The diagnostician then has his lemma (hypothesis).- Behold the first degree of ‘positive’ interpretation.

Ad (ii) The physician (doctor) indicates e.g. as follows: “if the above-mentioned diagnosis is correct, then, normally, this type of drug should work therapeutically and were explained the wayward effect”.

Behold the second “positive” response. With the second lemma.

(b) Philosophical (phenomenol.-ideative).

Listen how Scheler outlines the typical phenomenological interpretation. “I can, however, conceive of this same pain, also, as an example (appl. mod.) of the in the highest degree alienating and astonishing essential situation, that this world is just (‘at all’) stained with pain, evil and suffering.-- In that case, I shall put the question differently.”

(i) “What, then, is the pain itself (L. 100v.: pure beholding), apart from the fact that, here and now, I am enduring it?” (L. 7: actual being; -- this is the typical phenomenology).

(ii) “How is the universe (‘der Grund der Dinge’) supposed to be (attribute) that such a thing as ‘pain without more’ (L. 101: red without more) is possible?” (L. 7: complement; situational phenomenology).

Note.-- One sees that Scheler, here, unnoticed, presupposes as obvious the “more than merely identifiable connections” (L.37vv.), the distributive and the collective structure.

(B) II. Deductive (= progressive) reduction.

(a) Subject matter

Re (i).-- The diagnostician, starting from his lemma, will begin to analyze the symptoms, by deducing them from his diagnosis.

L. 108.

Re (ii) -- The physician, assuming his lemma, will infer that the drug present in his mind is tryable.

(b) *Phenomenological-wise.*

M. Scheler does not give any lemma of philosophical - phenomenological nature. We therefore propose to introduce here *P. Ricoeur, Finitude et culpabilité*, (Finitude and guilt), - (*II: La symbolique du mal*), (The symbolism of evil), Paris, 1960, 151/332 (*Les 'myths' du commencement et de la fin*), (The 'myths' of the beginning and the end), -- at least in part.

a. *The Sumerian-akkadian drama of creation* ('enuma elish').

In this, evil (suffering, pain, suffering) is situated in the primal disorder ("primal chaos").

The Babylonian, for example, who is still alive from this, will reason as follows:

"If, indeed, in the beginning, there was only disorder, and if our monarch, in the beginning of the year, did not properly perform the rites of order, of eliminating evil, then this pain in my arm, here and now, is understandable"-

Deductive: if I **(i)** meditate on the myth again and **(ii)** verify that the sovereign has performed the rites correctly, then I will obtain control (review) of the cause.

b. *The orphic pythagorean myth.*

In this, evil is situated in a primal error of the immortal soul in a past life (what is called, analogously, in India, "karma").

The Neo-Platonist, so far as living from that tradition, will reason as follows: "if, indeed, I, in a past life, committed an error, which includes punishment, then this pain in my arm is explained."

Deductive: if I **(i)** in my evening examination of conscience (as the Pythagoreans taught) or **(ii)** in a mantic (L.27; 99: transempirical) under old with a clairvoyant, concerning an error of inheritance on my part, 'obtain a definite answer', then I shall, at once, be able to exercise review.

c. *The tragic myth* .

In it evil is attributed both to human freedom and, above all, to deities (L.59 (Earth Mother); 74 (Demonic gods of totality)), who 'drag' that freedom into senseless acts with all the disastrous consequences that this entails.

The ancient Greek, still alive from that 'tragic' tradition, would therefore reason as follows: "If, indeed, I - dragged along by an 'alien 'power' ('being') - have allowed my freedom to be abused, then I understand that evil is done to me such that my arm hurts."

L. 109.

Deductive: if I, now, starting from that, verify whether this is so and, by means of an exorcism (exorcism), free myself from it, then I will, immediately, know where I stand.

d. *The adam myth.*

In the Bible, evil is attributed, now in its “metaphysical” (transempirical) root, to the fall of the first parents (Adam/ Eve) which includes as its aftermath the original sinful situation (lack of true insight, passionate behavior, suffering, disease, death):

“If, as a descendant of the first parents, I share in the hereditary aftermath of their ‘first sin’ (primal sin), I understand that I suffer pain in the arm, among other things.”

Deductive: if, now, in faith, I assume that, by interpreting suffering differently, i.e. as expiation and compassion for the suffering Son of Man, I gradually break free from that grip of original sin, then I must experience this, normally, in my life.

Note.-- Philosophy, taken by itself, in terms of thorough explanation (abduction, hypothesis, regressive reduction), has not made it much further than the myth, i.e. the story, which, in history form, explains the basic situation of humanity, yes, of the whole cosmos; (L.100: phenomenology as ‘explaining’, formulating).

Usually the role of philosophy is to translate the myth into more rational-intellectual or empirical (L. 99: to interpret the transempirical either intellectually or empirically) terms.

1. Indeed, the myth, as a story about the ground situation, moves not so much on the empirical and/or intellectual plane, but on the mantic (L.27 (64)) or transempirical domain.

2. Indeed, just as the Xosa-Negro-African, with respect to a herd of five hundred animals, ‘immediately’ (knowing mantically, psychically, transempirically) knows whether and how many and which animals are precisely missing, so too does the myth-teller, immediately (knowing mantically, psychically, transempirically) know what the basic situation of man and the universe looks like.

L. 110.

It should be noted that myth teller is supposed to be a real myth teller.

a. There are, after all, myths of art cobbled together, according to imaginary structures, by poets (this is nothing more than “poetry”). There are also, among the ‘natural peoples’, ‘fables’ which are also called ‘myths’ in circulation: these serve for entertainment (they lack the main content of life and world views).

b. One recognizes the true myth teller by this that he practices pure contemplation, peculiar (among other things, but not only) to Husserlian-derived phenomenology.

1. The true myth-teller does not merely say what tradition (L. 95) asserts; he does not - certainly does not - utter his own singular ‘subjective judgment’ (L. 95); certainly he does not assume apriority opinions (L. 95v); still less does he want to peddle mere ‘theories’ (proofs) (L. 97) I; if his I (L. 97) and his acts (ibid) play a role, it is merely that ‘act’ that makes ‘rein opening up to the phenomenon (= the mythical content) possible. (L, 98)

2. The true myth-teller extremely accurately (cf. 1.27) situates the myth content in reality (proper characterization of factuality: L. 98v.).

Conclusion.

The myth teller, if real, is (and phenomenologist on a transempirical (paranormal mantic) level.

That is also the reason why, in cultures that are friendly to myths, not just any ‘storyteller and miracle teller’ may lead the rites that bring about happiness (of the tribe, the individual). He should, after all, be more than a storyteller!

We say ‘to bring about happiness (= salvation)’, so as not to have to use the term ‘magic’ (for only that is real magic), with the odium (spitefulness) that clings to that use of the word in enlightened cultures (L. 98v.). - Better expression: ‘agogia’ (L.3).

(B) III. *Peirastic (= testing) reduction.*

(a) *Subject matter*

Re (i) The diagnostician, once he has noted the actually ascertainable (verifiable) symptoms, will quickly know whether his lemma (= provisional diagnosis) was correct.

L. 111.

Ad (ii) The therapist (doctor), once he has applied his medication, knows, on the basis of the result, whether - yes or no - he had the right lemma (his idea 'medication') in front of him. Cfr. L.14 (pragmatic truth).

(b) Phenomenological-wise.

1. One reads, now, first, carefully what (L. 14) has been said about destiny truth and about non-experimental method (L.42).

2. We take, within our Biblical-Christian culture dominance, the adamsmyth.

a. Ever since S. Paul, especially, and his exposition of the mythical (transempirical) fact "that we all - each of us, separately (singularly) - have sinned 'in Adam', our chief, this, at the behest of 'the serpent', (Satan), the Catholic Church (and, immediately, countless believers) believes that myth:

(i) insight (information) - light (L.104v.) - provided;

(ii) applied in a ritual way (in baptism, confirmation and Eucharist (= Christian initiation)), saves (agogic moment).

b. Do we compare, again, with the Xosa-Negro-African, who sees immediately (L.27; 109): in that case the phenomenon (=given, actual mode of being (L.7)) is empirically-intellectually (L. 98v.) testable (verifiable).

1. yet the actual being (phenomenon, given), which the myth teller describes, as it concerns the unaccountable basic situation of universe and humanity, is testable (many have, sincerely, thought it was), but not empirically-intellectually, as the enlightenment (L. 36; 67; 70; 7300; 95v.; 99) presupposes. And, if it is verifiable, it is usually in the form of destiny truth.

2. The magic rite, however, offers one type of more or less empirical - intellectually verifiable test (L. 14: pragmatic truth); e.g., if, after a ritual accompanied by a myth, one of those present, deliberately 'treated' in and through the rite, emerges physically healed. It is evident that, in that case, the myth is processed experimentally. in that case one could, as the case may be, speak of a real 'peirastic verification'.

L. 112.

Bibliogr. sample.

1. *Joseph Schelling* (1775/1854) - cfr. L.67; 73 - the romantic - idealist thinker, once wrote *Introduction to the philosophy of mythology* (published in 1825). In it he defends, after decades of study, that myth as myth contains truth (see *S. Jankélévitch, trad., Schelling, Introduction à la philosophie de la mythologie*, I et II, Paris, 1945;-- I, 81ss. (Quatrième leçon)).

2. *Lucien Lévy-Bruhl* (1857/1939), the friend of *Emile Durkheim* (1858/1917), like Lévy-Bruhl, strongly sociologically oriented thinker. Lévy-Bruhl is known for his thorough study and interpretation of what he called, first, the “primitive mentality” (attitude of mind), - later, the “primitive habits of thought” (“habitudes mentales”). His final position reads:

“(i) **There** is simply no such thing as a ‘primitive mentality’ that is supposedly distinguished from the others (the moderns, the ‘Kartesian’), by two features, namely, the ‘mystical’ and ‘the prelogical’.

(ii) **There is**, however, a ‘mystical’ mentality, which is more pronounced and more easily perceptible among the ‘primitives’ than in our (modern) societies. Yet it is present in every human mind (whether primitive or modern)”.

Behold what Lévy-Bruhl has left us as his definitive position in *his M. Leenhardt, préf., Les Carnets de Lévy-Bruhl*, Paris, 1949 (posthumous work).

Cfr. *J. Cazeneuve, Lucien Lévy-Bruhl (Sa vie, son œuvre, avec un exposé de sa philosophie)*, (His life, his work, with a presentation of his philosophy), Paris, 1963, 128.

Note.-- ‘Mystical’, ‘mystical’ - here, in this language, - means so much as ‘transempirical’ (L.98v.).

In his *La mentalité primitive*, Paris, 1922, *Lévy-Bruhl* says: “(...) Do we try (...) to distrust our own habits of thought; do we, rather, try to discover the habits of thought of the primitives through the analysis of their collective ideas and of the links between them. (...).

By not seeing the intellectual industriousness of the primitives from a mode of thought, which does not suit it, (...) we can cherish the hope of not distorting it, in the context of our description and analysis.”

L. 113.

3.-- 'Formal logic' as comparative ordering

The theory of thought, as founded by Aristotle of Stageira (-384/-322), is usually called "formal" logic. Cfr. L.25 (formal or formal induction). Indeed, 'classical' ('traditional') logic revolves around form (what the ancient Greeks called 'morpheme', (Lat.: forma)). The question arises, what is that form exactly? For, around this, misunderstandings exist.

1. The Scholastici (800/1450) spoke (L.30) of the orientation of our attention (consciousness) toward something ('being(the)'). This directedness was reiterated by Franz Brentano (Austrian School) as the intentional structure of our consciousness.-- Well, the Scholastics distinguished an *intentio prima* and an *intentio secunda*.

a. '*First orientation*' was called the fact that, in our day-to-day lives, we simply deal with things and processes without thinking (reflection), without returning to what we do and think. Prereflective. - That's how I look at that picture there. And at the movie star on it.

b. '*Second orientation*' was called the fact that once we look at e.g. the picture with the diva on it, we realize that we are looking and dwell on the fact that we are looking (and no longer on the picture of the diva). Reflective. Looping back on my own act (the looking). Na.thinking. Then the photo (and, along that photo, the star), as viewed by me, comes through.

Formal or form logic is concerned, first of all, with the *intentiones secundae*, the second orientations of our consciousness. Therein, namely, ideas (concepts), judgments and reasonings show themselves.

2. G. FR. W. Hegel (1770/1831), the dialectician (L.113), held, among other things, to describe all life as desire. This desire was, then, directed towards an object, which answers to one or another need.

a. An initial desire (orientation) was then e.g. the fact that I see a beautiful red apple lying around and want ('desire') to eat it. In that case I desire the apple itself as a physical (gross) reality. - Think of a paper-lusting mouse, eating the picture (instead of looking at it).

L. 114.

Even more, Hegel is so convinced that life, for man, is desire, that he calls it “desire for desire”: every man wants to be desired by fellow man, i.e. a desiring person (not just a desirable thing). On this, with Hegel, rests the intersubjective and social moment of life. Cfr. L.. 106 (conversation, living together).

b.1. A second craving (orientation) lies in the fact that I can also ‘crave’ the same beautiful apple, of a moment ago, in another way: I look at it, merely because it is beautiful. Without devouring it in its juicy flesh: the form, insofar as it is (aesthetically) beautiful (L.56), is, in this covetousness, the object; no longer the matter. It is still the apple, but only in its beautiful - being, which focuses me on it.

b.2. A second desire (orientation), though again differently tinted, lies in the fact that I, as a biologist e.g., look at the same apple, though, likewise, without coveting it materially, but in its form, merely because it is an apple (and no other fruit, for instance). Without eating it, for me it means value (L.16), but then knowledge value. He is concerned with form, insofar as it (cognitively) represents its own way of being (L.7). ‘Form’ here is ‘that by which something differs from the rest (complement).

It is this second form, object of the knowing and truth doctrine that causes traditional logic to be called a “formal” or “formal” logic.

3. A. Cournot (1801/1877), *Traité de l' enchaînement des idées dans les sciences et dans l'histoire*, (Treaty of the chain of ideas in the sciences and in history), I, 1911-2, 1/2, says that man, insofar as he seeks (‘desires’) order(s), seeks a form.

Well, the form (own actual mode of being) of phenomena (data) becomes information (form of knowing) in the idea (concept). Or still: the form of reality comes to (full) consciousness in the idea.

For example, the form, inherent in the matter of the apple, comes to consciousness (and becomes information, a form of knowledge) in the idea ‘apple’. Behold the pedestal of ancient logic.

4. G. Jacoby, *Die Ansprüche der Logiker auf die Logik and ihre geschichtsschreibung*, (*Die Ansprüche der Logiker auf die Logik and ihre geschichtsschreibung*), Stuttgart, 1962, 106/118, explains why and how Aristotelian (= traditional) logic is called ‘formal’.

L. 115.

(1) “ ‘Forma’ (= form), in the (...) meaning relevant to the technical language of logic, dates back to Marcus Tullius Cicero (-106/-43), the pre-eminent Roman rhetorician and politician. Cicero, viz. translates (the Platonic) ‘eidos’ (L.101), idea, understood as general idea (concept), (...), by the term ‘forma’, if it is about logical matters”. (o.c.,106).

The other common Latin translation, for the same ‘eidos’, was ‘species’ (think of the word ‘speci.fic’).

“The ‘forma’ of Cicero, so understood, became over

(i) Marcus Fabius Quintilianus (+35/+96), the great Roman rhetor (textualist; L.1),
(ii) as well as about the greatest Church Father of the West, St. Aurelius Augustine (+354/+430), known for his troubled youth, in Western logic.” (ibid.). Cfr L. 21 (S. Augustine as a harmologist).

(2) G. Jacoby, dwelling on the adjective ‘formalis’(= formal; formal), says; “‘Formal’ is what logic is called, at least from the XIIIth century on.” (ibid.).

As an adjective, Anicius Severinus Boëthius (+480/+525), the minister of Theodoric, the prince of the East Goths (ibid.), seems to be the importer.

Note.-- To what degree the general idea (= forma), was decisive already with the founder of logic, Aristotle, appears from what G. Jacoby, o. c., 107f.

“There is a second forma - idea in circulation: Aristotle calls the ‘forms’ of the syllogism (L. 26; 32; 43 (below)) ‘s.chèmata’ (= diagrams). The ideas, incorporated in that scheme, he calls ‘hulè’ (Lat.: materia, substance (= matter)), i.e. raw material.

‘S.chèma’ = schema) comes from ‘echein’ (to structure). ‘Schèma’ is therefore the structure (L.41), the model (understood as regulative or general model) (L.26), the cast, the stamp mark (...), of what has been worked through the ‘schema’ (form of thought and reason). (...).

The syllogistic forms (also, called ‘figures’ in Latin) order (...) the ideas that occur, substantively, i.e. in virtue of its identity relations (L. 35v.), i.e.:

(i) according to ‘genus’ (= universal collection) and ‘species’ (= partial or private collection),

(ii) according to ‘all’ and ‘not - all’ (= some) (L. 65)”. On that further.

L. 116.

(3) A.N. Whitehead (1861/1947), with B. Russell (L.36), the author of *Principia Mathematica* (1910/1913), the basic work on formalized or 'formal' logic (= logics), in his *Mathematics (Basis of Exact Thought)*, Utr./Antw., 1965, 11v., outlines, in three tenses, how the 'forma' or abstract-general idea pervaded mathematics - gradually - as the main idea.

Says Whitehead:

a. Mathematics began, as a science, when someone - probably an (ancient) Greek for the first time, attempted to prove theorems

(i) over all things (L.7: actual modes of being) and

(ii) about not all (= some) things (L.65), without specification (explanation) concerning certain separate (= singular) things.

Such propositions were, by the Greeks (L. 43: Eukleides of Alexandria), first posited (here: postulated and elaborated) for geometry. consequently, geometry (L.40: axiomatic-deductive) was the Greek mathematical science par excellence (L.48;-- Descartes:51).

b. After the rise of geometry, it took centuries (especially François Viète (Vieta; 1540/1603, who, instead of the earlier number arithmetic ('logistica numerosa'), introduced letter arithmetic ('logistica speciosa' (i.e. arithmetic with 'species' (L.115) or general ideas)), before algebra (called by Vieta 'letter arithmetic') was really effectively set up,--despite a few feeble attempts by the later Greek mathematicians.

Appl. mod.-- The ideas 'all' and 'not - all' (some) were introduced, in algebra, by using letters instead of the immutable (invariable) numbers of arithmetic (= number arithmetic).

Cfr. O. Willmann, *Gesch. d. Id.*, III (*Der Idealismus der Neuzeit*), Braunschweig, 1907-2, 46/69 (*Einfluss des Pythagoreismus auf Mathematik und Astronomie*), (Influence of Pythagoreanism on Mathematics and Astronomy), for details.

1.-- Instead of saying " $2 + 3 = 3 + 2$ ", we generalize, in algebra, and say "For all the numbers x and y , it holds that $x + y = y + x$ "

2.-- Similarly: instead of saying " $3 > 2$ (greater-than relation)", we generalize and say "for all numbers x , some numbers y exist such that " $y > x$ (greater-than relation)"

L. 117.

Note.-- We can further elucidate Whitehead's exposition by the following (elaborated according to O. Willmann's exposition) scheme (L.115: figura, Gestalt (L.25)).

idea (form):	'formula speciosa'	'formula numerosa'
either universal	either universal	singular
either private	either private	
. + . = . (sum)	$x + y = z$	e.g. $20 + 5 = 25$
non-operational	operational	operational

Cf. L.65 (all (well) -- not all (well/not) -- all (not)).

As O. Willmann, o.c., 49, notes, is:

- (i) formula the diminutivum (diminutive) for forma;
- (ii) our 'formula' (the dutch) only, properly understood, the form reduced to a diminutive task.

Furthermore, 'formula speciosa' is 'ideal formula' ('formula' formula) and 'formula numerosa' is 'numerical formula'.

We refer to the general idea 'operational' (L.24) "if acd, then csq" -- Which, here, becomes, "If the forma (universal idea) is literal than the forma is operational (in the mathematical sense)."

Note.-- O. Willmann, o.c.,50, notes that e.g. R. Descartes (L.43vv. (36)) and Pierre Fermat (1601/1665), who founded both the principles of the infinitesimal calculus and the foundations of the calculus of probabilities (in his correspondence with Blaise Pascal (1623/1662)), founded one type of application (appl. mod.) of both the literal calculus and the theory of functions, i.e. analytic geometry, simultaneously.

One thinks of the fact that one can 'express' the idea 'circle' (L. 23 (kuklos); 103 (Platonic)), by means of the 'formula' (semiotic idea or drawing form) " $x^2 + y^2 = r^2$."

Note.-- A. Warusfel, *Les mathématiques modernes*, Paris, 1969, 5, says that, one since Carl Fr. Gauss (1777/1855), all the great mathematicians have been keen to put ideas (through letters, of course) in the place of numbers.

c. Whitehead continues.--Only in the last (...) years has it been realized how much the ideas 'all' and 'not all' (some) belong to the foundations of mathematics.

L. 118.

This has made more and more subjects accessible to mathematical research. So much for A.N. Whitehead.

a. With regard to. this last point, cfr. L. 26; 74; 88; G. Cantor's idea of collection, which, in part, belongs to the foundations of the "new" mathematics.

b. One reads e.g. the preface of *M. Barbut, Mathématiques des sciences humaines*, I et II, Paris, 1967/1970. The author, Paul Fraisse, prof at the Sorbonne, talks about the dialogue between mathematics and the human sciences.

1. He expresses the stakes sharply: "research in the sciences - whether it concerns the humanities or not - continuously carries out a pendulum movement - "dans un mouvement dialectique" ("in a dialectic movement"; L.82v.) - from the 'facts' to their articulation and from their articulation to the 'facts' (L.77v.), yet in such a way that the interval (L.55) between formalized knowledge and the wealth of facts is made as small as possible".

2. But listen to what the author adds: "The necessity of providing a new basic mathematical language, also for the human sciences (alpha-sciences), is that of an instrument ('un outil'). Mathematical formalization does not relieve one of the knowledge of facts: all it does is to delineate the facts better and render them more precise (L.51; 91: Lévi-Strauss)".

Note

Sometimes the rule of three is ridiculed. Rightly so! One looks, just for a moment, at its structure (L.41; 115).

- (i) Starting from the form (universal collection ; e.g., 100/100, 5/5, etc.),
- (ii) passes the element (moment: e.g., 1/100, 1/5, etc.),
- (iii) to compute either the element or, especially, the partial form (subset or private form; e.g., 5/100, 2/5, etc.).

Millions of people, of the commons type (L.6), save themselves from their 'mathematical' distress, by means of a full structure!

One goes over what L.65 (basic form) says and recognizes this basic form, even, in something as simple as the Rule of Three: "From all (100/100 is just one form of saying 'all'!), over just one to non-all (some)."

L. 119.

4. -- *The idiographic theory of thought.*

The pedestal of traditional logic is the idea (understanding, concept, notion).

There is a multitude of conceptualizations (= definitions) of the idea, each of which illuminates one or more aspects of it.

a. Thus e.g. *Ch. Lahr, Logique*, 491: “The idea (...) is the pure mental representation of an object.” One can see that Father Lahr takes a rather psychological approach: ‘representation’ is a psychological concept.

b. *M. Müller/A. Halder, Herders kleines philosophisches Wörterbuch*, (Herder's little philosophical dictionary), Freiburg i.Br., 1959, 27f., says: “Representation of an object in its generality”. In other words, where Lahr leaves in the middle whether the idea always represents the general (L.100vv.: ideative fen.) in the object, Herders Wörterbuch puts the general, immediately, in the definition itself.

c. However, the same dictionary says, on the next page, that Romanticism (L. 67; 73; 112) redefines the idea. The “being” (L. 7: actual being) of something - so e.g. of a person(s), a work of art, a historical event or period - is located precisely... in:

- (i) the singular - (das einmalige, the uniquely occurring),
- (ii) together with (L.36: coll. Struct.)
- (iii) the concrete, i.e., the fusion with the rest (L.7: complement; 66).

The (romantic) idea of something exists, therefore, in the representation of the singular-concrete of an object.

Conclusion

(a) juxtaposed with the traditional idea (the general-abstract ‘form’ (L.113/118)), object of formal or formal logic,

(b) Romanticism accepts the singular-concrete form, represented in the equally singular-concrete idea (representation), object of idiographic (= concrete) logic. Cfr L.100: descriptive phenomenology.

Note

One does not think, now, that Romanticism (mainly German) is the only discoverer of the singular-concrete. - The proper name is, since centuries, the technical term with which the singular-concrete of a phenomenon (object, data) is expressed. It is, grammatically, set off against the species name (= abstract-general being).

But there is more: also philosophically one has tried to situate the singular-concrete objects precisely (order theorem).

120.

(a) Aristotle of Stageira (-384/-322).

1. “The thing - ‘ousia’ (something, actual being (L.7))- is not the general, but always something concrete - ‘sunolon ti’ (something that exists in itself as a whole). It consists of a singular form and of a singular matter”. (*O. Willmann, Gesch. d. Id., I (Vorgeschichte und Geschichte des antiken Idealismus)*, ((Prehistory and History of Ancient Idealism)), Braunschweig, 1907-2, 568).

2. “The content of the definition, which reflects the general (the ‘catholou’), is, for Aristotle, nothing more than something that is said to be excluded from singular data (‘epi ton hekasta’.)” (ibid.).

3. “As the factually existing, so also, with Aristotle, knowing (,...) runs into two spires.

Sometimes the knowledge of the concrete is the goal. other times the knowledge of the abstract is the goal.” (o.c., 560).

One sees that, already with this ancient Greek, the Romantic dichotomy is clearly present. But with a clear emphasis on the general, of course.

(b) The Conimbricenses (The School of Coïmbra (Portugal)),

a philosophy of the Jesuits, who, in addition to Scholastic, also directly studied ancient Greek philosophy, in their *in universam dialecticam aristotelis*, Coimbra, 1606, define the singular as “that, whose traits of knowledge (L.25; 38 (coll. str.), all taken together (L.26), can indicate nothing else” (Id, cuius omnes simul (all together) proprietates alteri (something else) convenire non possunt).

They describe this definition with a distich (two-line verse): “forma, -- figura, locus, stirps, nomen, patria, tempus, unum perpetua reddere lege solent.

(Translated: the form,-- the material appearance, the place, the origin, the (proper) name, the homeland (region of birth), the time,-- usually, over and over again, reflect the singular (‘unum’).)

Expressed logically, “If all these kentraines are joint, then the singular (of which those kentraines are).”

In other words, as the Scholastics say, “Individuum ineffabile” (The singular is indiscernible). But one can ‘describe’ it literally, by the roundabout way of the necessary and sufficient characteristics, which, each separately, are insufficient, but, collectively, sufficient,-- in order to characterize and situate the singular as singular

L. 121,

St. Thomas Aquinas (1225/1274), the top figure of Scholasticism, does claim that the collection of such characteristics ('huiusmodi formis aggregatis') is not sufficient to characterize the singular as such. But he understands them, apparently, abstractly -- generally,-- while they ought to be understood singularly -- concretely (In IV Sent., 1. II, dist.3, q.3, a.3c).

Appl. Model

Take Roxana, one of the Persian wives of Alexander III, the Great.

1. form (alg. - abstr. idea): a woman.

2a. figure (view) beautiful;

2b. place: Baktrianè (an area, which would partly, cover present-day Turkestan, Iran and (the north of) Afghanistan);

2c. descent: daughter of Oxuartès, the satrap of the Persian monarch (Baktrianè was a part of the Persian Empire);

2d. (proper) name Roxana;

2nd. homeland (region of birth): Baktrianè;

2f. time -327: married as a Persian princess by Alexander III, the Great (-356/-323); -319: departure for Epeiros (Epirus), to Alexander's mother, Olumpias; -316: imprisoned by Kas(s)andros, king of Makedonia (Macedonia) (-354/ -297); -310: murdered by the same monarch.

It is clear that all traits are singular traits, which together characterize (beautiful, woman, etc.) or situate (Baktrianè, daughter of Oxuartes, married to Alexander, etc.) the uniqueness of this famous woman. This, although they never exhaust the countless traits of the singular individual (indiscernibility of the singular).

Appl. Model.

Let's take *Philippe de Dieuleveult*, the treasure hunter from *La chasse aux trésors* (The treasure hunt), of the French-language TV stations. He has to look for example, in Cameroon, for the village blacksmith. That village blacksmith is a singular (singular something). Once out of the helicopter, he asks a group of Negro-African women, working in the fields, if they know him and where he is. They point, for example, in the direction of the village. This is a first trait (L.26: k = chracteristic).

The series (L. 46 (Descartes)) of knowledge traits, which the following interviewees, along the way, provide him, have a structure.

L. 122.

Despite the different signs (= traits) that may have occurred, *Philippe de Dieuleveult* (1951/1985, French journalist, disappeared in Zaire) experiences a growing convergence of signs, until - finally - in the blazing sun of the Black Mainland, he sees the village blacksmith sitting in front of his miniature blast furnace, at work... Just two hundred meters outside the village, in the wilderness!

(i) His “lemma” (L 6, 41) had been transmitted, from Paris:

1. a village smith,
2. somewhere in the vicinity of X, a village proper name unknown to him,
3. there somewhere, on the map, near the capital of Cameroon, Yaoundé. More than that three-element sequence (L 46. Cartesian ‘collection’) the lemma was nothing!

(ii) His “analysis” (L.6; 41) consisted of:

(a) in itself (= singular, separate) necessary, but insufficient, informations (= informations: L.114 (bottom)), which, if necessary, may be divergent (divergent);

(b) collectively (= collectively; L.22 (summative ind.), i.e., as a ‘gestalt’ (form: l.25) convergent, coalescing into one identically, singularly, given) and, immediately, adequately information (= informations).

Bibl. sample.

-- O. Willmann, *Gesch. d. Id.*, III, 112ff. (*Der Aristotelismus der Renaissance: die Patres des Kollegiums von Coïmbra*);

-- H. Pinard de le Boullaye, S. J., *L'étude comparée des religions*, II (*Ses méthodes*), Paris, 1929-3, 509/554 (*La démonstration par convergence d'indices probables*), esp. 511/516 (Nature du ‘singulier’); 517/521 (*La preuve par convergence dans la vie courante*).

Note -- Partial ideas/ total idea.

One rereads, now, L.120, the distich on singularity: after all, the enumerated ‘indicia’ (indications) are only partial or partial ideas of the total idea, which constitutes the features of the singular (L.37v.: part/whole).

(c) *The ‘Badische Schule’* (The School of Baden, (Heidelberger Tradition)) also dealt with the problem of the singular, yet ‘axiologically’ (philosophically of value; L.16) and historiographically (historically).

L. 123.

The Opposite Pair (systechny: L.53; 55; 88; 98) 'idiographic/ nomothetic' interests us here.

1. Analogous to Wilhelm Dilthey (1833/1911), who introduced the 'verstehen' (understanding, 'comprehending method'), as typical of the humanities (vis-à-vis what he understood by 'natural sciences'), -- where 'comprehending method' means "the grasping, as a phenomenon (L.94vv.), of the total structure (L.41: structure) of man, yet in its, repeatedly different, individual (= singular) form (L.119: singular form)."

2. introduced Wilhelm Windelband, the leader of the Neo-Cantian -Badener School,--he lived from 1848 to 1915 --, in the empirical or experiential sciences (L.80: type of enlightenment), the distinction "natural sciences" = nomothetic sciences versus historical sciences = "idiographic sciences.

a. 'Nomothetic' means 'that which establishes laws (universal characteristics - L. 115vv.);

b. 'idiographic' means 'what describes singular forms' (L.119vv.).

So that we find the duality, which O. Willmann, thought to discover in Aristotle (L.120: "two spires"), here in a new form. We refer to *Windelband's* rectorate address '*Geschichte und Naturwissenschaft*' (1894).

3. *Heinrich Rickert* (1863/1936),

also of the Badener Schule, in his *Kulturwissenschaft und Naturwissenschaft* (1899), reiterates Windelband's and Dilthey's distinction regarding the science of history, which he, as a cultural science, calls a science of the singular. This, in contrast to natural science, which "always has an eye for the general." As a typical philosophical task Rickert mentions logic, which, according to him, decays into two types :

(i) traditional logic, which allows the study of the general (L. 114/118), and

(ii) a 'new' logic, allowing for the studio of the singular (L.119vv).

Exactly what we, here, in the final pages, are trying to do.

Bibl. sample.

Geoffrey Barraclough, Scientific Method and the Work of the Historian, in his *Logic, Methodology and Philosophy of Science*, in: Proceedings of the 1960 International Congress, Stanford-University Press, 1962.

L. 124.

Conclusion.

If we take the ‘idiography’ of the Baden School seriously, then the introduction of the sense of the singular, both in logic and in empirical science, becomes imperative. Immediately also the introduction of method and structure in this regard.

It seems to us that, for the romantic theory of ideas (L.119), the Jesuits of Coimbra supplied the idea as methodically useful. Although it is, of course, open to refinement, it serves, further, as a lemma.

(d) Georges Canguilhem (1904/1995)

He is one of the most important epistemologists (= philosophers of science) in France. He works in the footsteps of G. Bachelard (L.86v.), a.o. where he wanted to give the history of science a philosophical first place. He can be compared with M. Foucault as epistemologist (L.42; 44/47),--also as historian of science.

Bibl. Sample.

Francois Guéry, *L'épistemologie (Une théorie des sciences)*, in: A. Noiray, dir., *La philosophie (Dictionnaire)*, 3 t., Paris, 1972, t.1, 156/163 (*De la philosophie à la médecine, de la médecine à l'épistemologie: Georges Canguilhem*).

From *Canguilhem's* book *Etudes d'histoire et de philosophie des sciences*, Paris, 1975-3, 389s., we cite an idiographic text, which proves, black on white, that the romantic theory of understanding “makes sense.

a. The physicians - literally Canguilhem says - have always experimented, in the sense that they have always expected an information, which was. in their behavior, when they introduced something (new). Usually the doctor has to decide in an emergency or urgent case. He always has to deal with singulars (l.119 singular-concrete form)

b. Well, both the urgent need and the singular nature of the objects of medicine lend themselves poorly to the knowledge of the type ‘more geometrico’. (*Note.--* This term is an allusion to the Cartesian *Baruch (Benedict) de Spinoza* (1632/1677), who elaborated a philosophical moral theory, *Ethica, more geometrico demonstrata* (published only after his death), in the style of Euklidian geometry (L.51 (mathematics as leading); 80 (intellectualism)).(...).

L. 125.

c. “Every day the physician performs therapeutic (healing or, at least, so intended) operations on his sick” (Cl. Bernard (1813/ 1878), French epistemologist) (...)

1. But - like Claude Bernard or anybody else - one cannot say beforehand where the borderline (L. 60/66) between the harmful, the neutral or the beneficial lies or, also, this borderline can vary from one (singular) sick person to another. Likewise, it is the duty of every physician to say explicitly and to make others understand that, in medicine, one experiments, i.e., That one cares, under one condition, namely, while trembling.

2. More than that: a medicine which is concerned with developing the sense of the singular (L.124) in the living human being, who is the patient, can only be an experimental medicine. Without experimentation no diagnosis, no prospect (‘pronostic’), in the treatment of the sick, is possible”. (o.c.,389).

d. Without wishing to pronounce ‘paradoxes’ (shocking statements): a medicine, which would focus solely on diseases -- either nosological (L.107) data or pathological (ibid.) data -- might well be, for longer or shorter periods of ‘classicism’ (*note*-- ‘Classicism’ stands, here, for ‘intellectualism’ (L.124; -- 51; 80)), a theorized, axiomatized medicine. ‘The a-priori’ (L.95; 110) does fit the nameless (*note*-- ‘Nameless’ = non-singular).

e. Canguilhem’s conclusion: it is not legitimate - and, incidentally, absurd (meaningless) - at the same time:

(i) the assertion that one is concerned, in the diseased, with attending to the singular being and

(ii) to want to defend the sentimental anathema (“condemnation”) against any experimentalist (i.e. primarily experimentalist) behavior in unclear philosophèmes, so typical of so-called “humanist” or “personalist” medicine.

Note -- “Humanistic” (emphasizing the human being) and “personalistic” (emphasizing the human being as a free person) medicine is, most often, also based on the singularity in the patient: “The doctor deals with sick people, not diseases.

L. 126.

5. -- The idea of the “understanding” (= “*erstehende*” *comprehensional method*).

The founder is *Wilhelm Dilthey* (1833/1911: L.123) with *Einleitung in die Geisteswissenschaften* (1883); *Ideen über eine beschreibende und zergliedernde Psychologie* (Ideas about a descriptive and dissecting psychology), (1894).

1. Its own object: are the expressions (projections) of the soul life.

a. Foreground object, for Dilthey and the “Geisteswissenschaftler” (adherents of the “humanities (= understanding) method”), are

1. the behavior

2. History,

3. The partial aspects of behavior and history, such as e.g. The language, law, economics, education, art, etc. Reason: these phenomena are manifestations of the human mind.

b. Background or depth - object is

1. Life (in the romantic (L.67; 73; 112; 119 sense).

2. especially soul life (hence the fact that psychology is so central), peculiar to the human spirit. Life, soul life, human mind express (‘project’ or ‘objectify’ itself) in aforementioned foreground phenomena.

Digression (excursus).

German Romanticism set in +/- 1797,-- first at Berlin, then at Jena; The four leading figures were:

(i) August Wilhelm von Schlegel (1767/1845; theology and literature studies; home teaching; professorship at Jena).

(ii) Friedrich von Schlegel (1772/1829) brother of the preceding one; studies in science and philology), the author of the truly Romantic-philosophical seminal work *Philosophie des lebens*.

One does not forget that the verse from *Goethe’s Faust* “*grau, mein freund, ist alle theorie, grün des lebens goldner baum*” (Colorless, my friend, is all *theory* and colorful *des lebens goldner baum*) expresses the atmosphere of Romanticism;-- Hegel among others learns from Fr. v. Schlegel the idea of ‘(culture) historical becoming’;

(iii) Ludwig Tieck (1773/1853. history and literature studies; travels throughout Western Europe), the revealer of “*Geheimnisvolles, dämonisches leben der natuur* (mysterious, demonic (L. 56/57; 57/59; 74/75) life of nature); great influence on Russian literature and on occultism in Europe.

(iv) Freiherr Friedrich von Hardenberg (1772/1801) poet name ‘Novalis’; extremely careful upbringing due to his educated mother; law and engineering studies), the poet of the *Hymnen an die nacht* and author of *Heinrich von Ofterdingen* (unfinished novel).

L. 127.

They published a literary criticism journal *Das athenaeum* (1798/1800). The name “romanticism” was given after *Romantische dichtungen*, in 1800, edited by L. Tieck.

c. Object structure.

This one is twofold:

(i) the singular life (I, thou - we,-- the groups, cultures (for there exists, besides singles or individuals, also e.g. the singular group),-- e.g. the four romantics, mentioned above; i.e. the singular can be collective);

(ii) the totality, in which singular life is, always, situated :

a. this totality is, to begin with, that of the singular self (L. 33; 82: internal comparison);

b. she is, moreover, that of concreteness (fusedness; L.119: complementary totality; situatedness), proper to the singular: I, thou,-- we,-- we are embedded in

(a) cultural totalities, such as, e.g., morality and law, economics and politics, education and the media, art and professional science, etc;

(b) cultural frameworks, such as society,-- the state, the church etc. (L.33: external comparison).

Note.-- It is, therefore, not surprising that there should be a comprehensional psychology (M. Scheler (L.106vv.) whose phenomenology already exhibits the main features of comprehensivist psychology; *E. Spranger* (1882/1963), with his *Structural Psychology*; etc.), a comprehensivist psychopathology and psychiatry (*Karl Jaspers* (1883/ 1969), with his *Allgemeine Psychopathologie* (1913)), a comprehensivist sociology (*Max Weber* (1864/1920), with *Wirtschaft und Gesellschaft* (*Grundriss der verstehenden Soziologie* (Economy and Society (Outline of the understanding sociology)) 1922), among others), exist.

There is a multidisciplinary spirit sailing through the understanding humanities. it is supported, intrinsically, on the sense of the whole (totality) (L. 82)

L. 129.

2. The appropriate method,

(1) First, a lemma.

a. “Dilthey and his school have,

(i) in addition to the natural-scientific-explanatory (method, including in psychology),

(ii) made the demand for an ‘understanding’ (method) (...). Karl Jaspers (...) placed,

(i) in addition to the study of “causal” (L.24: *acd / csq*) or “causal” relationships,

(ii) the study of ‘regal’ relationships.” (*Ph. Kohnstamm, Personality in the Making (Sketch of a Christian Education)*, Haarlem, 1929, 12).

b. “Man - it seems to me - has, inherently, two equally important, though not identical, yet complementary interests of knowledge:

(i) a- type of knowing interest, which proceeds from an understanding of natural laws -- this, o.g., the need for a technical praxis (course of action (cfr L.106: technical Intelligenz; 114: knowledge philosophy);

(ii) a type of knowing interest, which proceeds from the need for socially and morally meaningful praxis. This is - as, incidentally, technical praxis also presupposes - directed towards an understanding of possibility and of the rules of play (norms) which are proper to a meaningful human ‘in-the-world-ness’.

This type of interest in understanding meaning (purposiveness) has (i) to do with communication among contemporaries (synchronical) and (ii) to do with communication of the living with the past generations,--this in the form of tradition-transmission.” (*K.-O. Apel, Szientistik, Hermeneutik, Ideologiekritik*, in: *K.-O. Apel u.a., Hermeneutik und Ideologiekritik*, Frankf.a.M., 1971, 26f.).

Conclusion:

Interpersonal communication involves its own type of knowing, understanding.

(2). Now, the analysis.

A.-- It is well known that, from the Paleoputhagoreans onwards (L.2, 48. 94. 97), just about all the ancient Greek schools of philosophy placed an exceptional emphasis - - precisely, as part of the learning process -- on friendship in all its shades:

“In addition to the state and family bonds, the Paleoputhagoreans also had that type of ‘free association’ (L.39: social ‘sustèma’), which arises on the basis of *sumpatheia* (‘sympathy’): the friendship. Puthagoras called them ‘*enarmonios isotès*’, a resemblance based on understanding.

L. 129.

(*Note.*-- ‘En.(h)armonios’ literally means ‘well joined together; ‘in perfect accord’ (L.20)). The friendships of his disciples were ‘celebrated friendships’, as e.g. the fidelity of Damon of Surakousai (Syracuse; Sicily) and Fintias (*note.*-- Fintias, condemned by the turannos (autocrat) Dionusios, but favored with respite, is replaced by Damon in prison: nigh on the last Fintias returns to be executed). (...).’ (O. Willmann, *Die Gesch. d. Id.*, I, 333f.).

At L.105v., we have given a type of application of that ‘sumpatheia’ (and the knowledge inherent in it): the socratic-platonic conversation.-- Clearly, understanding is a component here.

B.-- Ph. Kohnstamm (once the leader of the Amsterdam School (continuation of the School of Mannheim (Selz) and the Cologne School (Lindworski) concerning thinking psychology, as well as a personalistic thinker) gives, in the above-mentioned book, applicative models and of scntistics (L.36; 83: positivism and related; 88vv: structuralism, also one type of scientistics) and of hermeneutics (understanding method).

B.I.-- Appl. mod. of scientist:

In reductive diagram (L.6; 41) this reads as follows.

(A) Observation.

(A)1. Given (= theme).

a. Robert Brown (1773/1858; Scottish botanist) discovers, at some point, the (apparently) disordered movement, rendered explicable by the word “dance” (L.35: analogy = partial identity), of the tiny particles (system 1: a highly partitioned, yet undissolved mass), in suspension in a liquid (system 2). Cfr. L.39v. (system theory).

b. When I look through a microscope at the particles of pollen or gut gum (*note.*-- ‘Gut gum’ is a kind of gum resin from the Siamese Garcia tree) (= system 1), floating in a liquid (= system 2), I see them ‘dancing’, without end, up and down. This is the ‘brownish movement’

(A)2. Requested (= problem)

A “natural law” or, specifically, causal (causal) explanation type.

(B) Abductive reduction.

a. The ‘molecular’ theory concerning material systems (so b.. the liquid particles);

b. the collision laws that govern the interaction between system 1 (the collecting fluid) and system 2 (the pollen and gum particles present in suspension form, respectively).

L. 130.

With this dual hypothesis, ordinary physics (physics) and/or chemistry (chemistry), both happening at the microphysical or microchemical level, can “explain” (“Erklärent says Dilthey).

It should be noted, that the “ideal” explanation type tries to be mechanic explanation as much as possible (L.45: mechanicism).

(B).1. *The both deductive and peirastic (experimental) reductions*

We will skip these here. They would be the “test-on-the-sum.

B.II.A. -- *Appl. mod. of humanities.*

By “human science” we mean, here, in contrast to humanities (hermeneutics), that type of knowledge of the fellow man, which behaves according to the model (paradigm) of scientificity.

Kohnstamm cites, in short, such an applicative model from *G. Heymans* (1857/1930), *über ‘verstehende’ Psychologie*, in: *Zeitschr. f. Psychol.*, 102 (1927), 6ff (o c 17)

Regulatory model (Heymans).

The experimental method (L.42) - according to Heymans - is twofold. Now it is ‘explanatory’, namely when we take tests with natural things outside ourselves. Then again it is ‘understanding’, namely when we take ‘tests’ with our own soul life.

Applicative model 1.

The experimental approach to another’s soul life.

Let us take - according to Heymans - the genesis of envy (envy, jealousy). Here Heymans proceeds in a typically Cartesian manner (L.46: beginning with the singular, concluding with complexification; 30/32 (beginning with the summative induction, concluding with the amplificative induction)). Thereby the mathesis universalis, consciously or, usually, unconsciously, stands as a model (L. 45/51).-- We translate in the explicitly reductive scheme (L.6; 41).

(A) *Observation.*

a. Topic

The fact is the repeatedly established fact of envy.--

b. Problem

Requested is a (natural) scientific explanation.

(B)I. *Hypothesis* (= abd. = lemm. = regress. Reduction).

If the genesis of envy is analogous to all physical genesis, which obeys, as far as possible, the sequence ‘acd (sign)/ csq (continuation)’ (L. 24: 128), then the genesis of envy will also be experimental and reproducible in the expression ‘acd/csq’.

L. 131,

Translation into the “stimulus-response scheme”:

- (i) acd = stimulus: if the pp (= subject) is confronted with:
 - a. (in his view) important
 - b. lucky goods,
 - c. to the extent that they benefit others (= fellow human beings)
- (ii) csq (= response) then this pp. responds to it with a. the symptoms, (‘signs’, ‘manifestations’) b. of displeasure (feeling).

(B) II. *Design of experiment(s)* (= deductive progressive ed.).

If the aforementioned hypothesis is correct, then it must be, in at least one (L.33: ampl. ind.) model, testable. Says, literally, Heymans:

“(i) To begin with - even if we ourselves had never lived through envy, we would (...) create the experiment, in which ‘people’ (understand: pp.), who hear of important fortunes that have fallen to others, react to this with signs of displeasure.

(ii) Then we would “collect” several such cases. -- Behold our intention”. (o.c.,17).

(B) III. *The actual experimentation* (= peirastic ed.).

Since Heymans, only “designs” (in cited article), we assume the actual execution as supposedly successful.

(B) IV. *Evaluative reduction.*

Says, literally, Heymans: “We could, further, enlighten ourselves regarding

- (i) the more precise conditions (= acd), under which this ‘feeling’ occurs,
- (ii) the other ‘properties’ of the persons (= pp.) in question. From this we could - e.g. thanks to the method of correlation calculation (L.51: Cartesian mathematisation) - reach a conclusion (clarification) concerning
 - (i) the general (L.101: the general red (Husserl); 115: formal; 123: nomothetic) antecedents of the feeling in question and
 - (ii) the favored states, which encourage their occurrence.

That would be - said Heymans - the non-insightful and non-comprehensive ‘inductive’ method (...)” (ibid.).

L. 132.

Appl. Model

The experimental approach to one's soul life.

(A) *Observation.*

1. "We could, however, in the second place also turn the gaze inward (introspective method).

Imagine the case

(i) *acd.* (stimulus): that some person known to us is the recipient of either a high distinction or the big ticket in the lottery

(ii) *csq.* (response): to which we, on supposition, respond with a sense of displeasure"

Up to there what we would call, reductively, the theme (the given).

2. "Whereupon we seek to account, with respect to the factors involved (factor analysis), in a more precise manner.--In that case, we would, at least in my opinion, create an experiment, which, according to the latest terminology (jargon) of psychology, however, would involve the 'verstehende' or 'insightful' method" (o.c.,17v.).

Thus, literally, Heymans, concerning what we reductively call the problem (the demand).

(B) I/IV. -- The abductive, deductive and peirastic reductions do not develop Kohnstamm" resp. Heymans. Which means that, here, it is only about a lemma. Nothing more.

Critical Remarks

(1) One does not quite see how, someone, who, in Heymans hypothesis, has never had envy experiences, would even know (i.e. see with knowledge) which test subject, with which *acd.n*, with which *csq.n*, he should choose! What is (L.7: actual being) 'envy' beyond any lived envy? Is envy, as - (even) not (unconsciously) - lived experience, even conceivable?

We believe so, but then in the sense, about which we spoke L.9: also the merely contemplable e.g. is 'non-nothing'.

(2) Kohnstamm, o.c., 18, objects to the term "experimentation.

Reason: inherent in the idea of "experiment" is (creature-like) what he calls "intentional intention

(i) That one places fellow human beings - intentionally intended - in a situation, in which they will - probably - react enviously, up to that.

(ii) But do you see yourself, in *appl. mod. 2* (own soul life), intentionally intended, to let envy, in you, "arise" or cause it to "arise"? Not only is envy not arbitrary (at least, in part: one can let oneself go into an experience); it is, still less, arbitrarily repeatable.

L. 133.

(L. 42).

(3) Kohnstamm, o.c., 18v., criticizes, then, the physical (L. 39; 99) systems theory, applied to not only physical data (as the people e.g. are there).

a.-- To investigate envy, we proceed - precisely according to Heymans' description - exactly as the physicist does.

1. (i) It opens and closes a current (= ACD; L.24);

(ii) he observes that - with that opening and closing - each time (= one - single relation) a neighboring compass needle changes position (= CSQ; L.24).

2. Transformed into physical systems theory:

(i) ACD: on well-defined events (current opening, - closing in a system (= electrical grid),

(ii) follow each time other events (compass needle position changes) in a system 2 (compass);-- from which we conclude that the former are the cause of the latter (the effect).

b.1. In Heymans' second applicative model,

(i) we - in a system 'I' (introspection), which turns its gaze inwards - make changes by means of acd (stimuli), in order to see what reaction that I-system, thereupon, gives the best (= csq = reactions),

(ii) to clarify a problem in a system 'ye' (the other, the fellow human being), i.e., his reactions to the stimuli he undergoes.

2. If, in the system 'I', on well-defined acd (omens), well-defined csq (sequels) follow each time,-- so e.g., on someone else's happiness, envy, -- then, in the system 'ye', -- at least so assumes (= lemma, hypothesis) Heymans method (not his explicit words) -- likewise, on well-defined acd (stimuli), well-defined csq (reactions) must follow with regularity.

3. Heymans introduces, immediately, the axiom (premise) of the essentiality of system 'I' and 'system' 'ye'. This is a hypothesis which the physicist, if he (see appl. model of scientistics - L.129v.) has non-human, data to deal with, can never or need never make: the reason is that this essentiality is simply not there.

L. 134.

Says Kohnstamm, literally : “Instead therefore, of the equality of both methods, by the argumentation of Heymans, proven, we can, by that very argumentation, sharply, show the difference (L. 35; 52; 73v.; 82) between the ‘explanatory’ (= human scientific) and the ‘understanding’ method.

The understanding method presupposes

(i) apart from the axioms, from which the explanatory method assumes,
(ii) at least still the axiom of the essentiality between ‘ourselves’ and the ‘system to be investigated’.”

B.II.B --Appl. model of humanities.

We pause, briefly, to consider what Kohnstamm, who lived with his times, informs us concerning what he, of course, in his day, called “the problem of the postwar dance of the young.” (o.c., 13v.).

Note.-- Kohnstamm names two types of “postwar dance” (L.47: classification into types (categories)), viz.

(i) the foxtrot, a fast, jerky four-time dance, - consisting only of runs (without figures), - originating in Anglo-Saxon America;

(ii) jazz, also from N. America, but from Negro-American centers, with as a ‘striking characteristic’ (L. 26: ‘k’) the either individual or collective improvisation (act made for the fist); as a substyle (L.47: categories), for Kohnstamm’s period, the ‘new orleans’ (1917/1930;--then Middle Jazz (1930/1944), Be-Bop (1944/1949), Cool (1949/1954) and, from 1960 on, the Free Jazz) followed.-- This as a culturological tome.

(A) Observation.

(a) Theme.

“(The fact that) ... for the most part, younger people (L.120: the (general) form), in the prime of life (time), judging by their clothing (L.120: material appearance) in not unfavorable circumstances (L.120: indistinct), both of them (= gender; L.120: the form) gathered (L.120: place), themselves, to the tones of lugubrious (= unsavory; L.58v.: unsavory = uncannily menacing) music (which we no longer sense, we have grown up in it) (L.120: indistinct),

L. 135

with the clear signs of boredom on the face (Kohnstamm describes here the demonic dance - Gypts dance differently than we do - Gezelle - cf. HA 93 Polydemonism - new in European gesch.: boredom) (L. 120: material view), in such a sinister way ('sinister' = unsavory) (L. 120: unclear), for considerable time (L.120: time), moving back and forth"

Note.-- This confrontation with the description of a singular phenomenon (the then (= time singularity) juvenile dance) proves how inadequate the description of the conimbricenses is in (somewhat) extensive verification attempts! Which the Patres of the Collegium of Coimbra, by the way, must have realized as well.

(b) Problem.

1. "When I enter a 'modern' dance hall : even then I wonder, I face a problem, I look for an 'explanation'. I do not 'understand' why (see now the text of the theme)".

In other words, asked is an explanation, however such that 'understanding' is also, in that explanation, present.

2. That the type of "explanation" includes understanding is clear from what Kohnstamm writes (o.c.,13):

"In seeking a solution to this problem (...), I proceed quite differently (*note* -- One takes the expression 'quite differently' with a grain of salt : meant 'partly' differently) than in seeking an explanation of the Brownian movement (L.129v.) (= scientific).

I do know that there are still people here and there who defend the opinion that one should approach problems - that of the brown movement and that of young people's dance - in the same way. Thus: that one should reduce the fox-trot or the jazz, in an analogous (L.35) way.

1. to the movement of atoms and molecules (L.129: molecular structure of matter), in brain, nerves and muscles;

2. to the movement in the gramophone (which plays, while the youngsters 'dance'); as did Paul Langevin (1872/1945); French physicist, a.o. fog in X-rays, theory of relativity) and Albert Einstein (1879/1955; mathematician and physicist of German origin, known for his 'Einstein's law' (the relation between photons (light particles) and electrons (atomic particles) (1905), as well as for the theory of relativity) have reduced the movement of gutteggum particles to molecular mechanics (L.129v.; 45: mechanistic model of thought)".

So much for Kohnstamm's literally rendered position (o.c.,13).

L. 136

(B)I. hypothesis (= abd. = regress. ed.).

1. We give, first, Kohnstamm's text on the matter: "What I, really, do, when the problem of postwar dance interests me, is:

(i) go and talk to those young people, to find out why their behavior has this, to me, strange stamp (L.59: the uncanny dance of the Gypts).

(ii) In other words, I try to come into inner contact with them, to experience their lived experience (L.132: lived experience),

(iii) to ascertain, thus, under what circumstances (L.133: system 'ye'/system 'I') I myself could arrive at similar (L.134: essentiality) behavior (L.126: conduct),-- As long as I have failed to do so, the problem remains unsolved.

(iv). One might express it thus that I seek to subsume (= situate) this movement (l.135: moving back and forth) - in contrast to the brownse - not under the category (l.47: Cartesian classification into types) of the interaction (the causality) of the case, but under that of the action, the spontaneous or personal causality, (o.c.,14).

2. Now we give the Diltheyan scheme, (L. 126v.: the own object 128v.: the appropriate method)

(i) a. Its own object is, first of all, the foreground object,

1. the dance behavior (L.126),

2. situated in contemporary history (L.125),

(i) b. As expressions of life**1.**, **2.** and namely soul life, proper**3.** to the human mind (L.126), which is the object of the science of mind;

(i)c. structured

1. as this dance group-here-and-now (singular),

2. within the post-war subculture of youth (concrete; L. 127).

(ii) a The appropriate method. (L. 128: Paleoputhagorean sumpatheia ("sympathy"); L. 105: unanimism) is, essentially, inner contact, as Kohnstamm, very rightly says;

L. 137.

(ii)b. through conversation (L.105: Socratic-Platonic conversation (dialogue):

a. repeated conversation;

b. ‘intimate coexistence’ (thus, literally, *Platon*, in the *VIIIth Letter*),--which Kohnstamm explicitly proposes as an introduction to inner contact.

3. *Result: the singular-concrete idea*

(L. 119 (global); 122 (one total idea/many partial ideas as - after Aristotle (L.120), the School of Coimbra (L.120v.), the convergence method (L.121v.), the Badische Schule (L.122/124), G. Canguilhem (L. 124v.) - Wilhelm Dilthey and the geisteswissenschaftler (L.126v.) tried to make them operational-scientific (L.24 : operational).

(B) II/IV (*deductive, peirastical, evaluative ed.*)

1. - It goes without saying that, with the scheme outlined above (Diltheyan scheme), we absolutely do not, e.g., personally honor Dilthey’s “historical relativism” (with great reason, therefore, we have separated Dilthey’s method from his personal ideology (L. 1:97) and “enabled” them in the great immortal Puthagorean Platonic tradition with inclusion of all possible (with that great tradition reconcilable) other achievements).

2. The effective elaboration of his theme Kohnstamm, too, does not give. It will be returned to, in the following course years.

3. Only a few more texts by Kohnstamm himself, methodologically fundamental.

1. “There must be something (L.7) in which two people share,-- common share -- although they are, time and again, different individuals, -- both when they agree and when they disagree.

When I, e.g., write : “ $17.19 = 323$ ”, the reader must - first - have understood what I mean so, in a sense, have thought my thoughts along before he can say whether it is right or wrong.

All use of language (L.85) is an attempt - more or less clearly conscious - to make others experience our live-throughs (L.132). The written language brings about the miracle of carrying those live-throughs across the gaps of space and time (L.70 (De perenni philosophia); 128 (tradition hermeneutics)).

L. 138.

Therefore, solipsism (*note.-- Max Stirner* (1806/1856. pseudonym for Kaspar Schmidt) took, in his *Der Einzige und sein Eigentum* (The only one and his property), (1845) the individual, finite-means 'I' as the basis for a type of behavior ('moral theory'), which elevates egoism (selfishness) to the highest rule of behavior ('norm'), with the elimination of all altruistic (= favoring the fellow man (L.19Solovjef's endearment)) elements), as Max Stirner calls it (...), an assertion which has not become conscious of its own assumptions". - So much for Kohnstamm.

2 -- "Is, now, every understanding based on a mee - experience in a certain sense, this does not mean that understanding would be nothing but having the same endures.

Appl. Mod.

1. It makes little sense to say of two people walking together in the snow, "they understand each other because they both experience the cold."

2. There is no 'understanding' here (Kohnstamm means 'understanding', evidently, in the scientific sense, which we too are talking about here; -- it is, immediately, clear that 'walking together in the snow' does represent commonsense understanding (L. 6, 118), basis of scientific 'understanding'.

There is no (scientific) understanding here.

Reason:

- (i) there is only joint 'perceiving'(perceiving);
- (ii) no problem (L.129: asked = problem) has been posed, to which a response is expected;
- (iii) no categorical formation (understand something like 'reasoned knowledge') of consciousness content to that end takes place.

3. Very rightly says Spranger (L 127):

"(i) The purely contemplative (= intuitive, unreasoned rendering of the series of inner experiences of a fellow human being is as little (scientific) understanding as having eye stimuli is already 'seeing' (in the sense of 'perceiving').

(ii) Rather, (reasoned) knowing (...) rests on grasping 'categorical' (L.138; vg1.47), i.e., analyzed, determinations (precisions) and forms of connection.

L. 139.

Conclusion:

‘Verstehen’ is, at once, **(i)** co-experiencing (‘Nacherlebens’), **(ii)** that is at least ‘categorically’ formed (understand: thought out). So much for Spranger’s quote.

3.-- Spranger says, further, the following (Kohnstamm, o.c., 16v.).

(i) ‘Understanding’ is one type of ‘explaining’ viz. explaining insofar as applied to that level (‘level’) of data (L.7: actual modes of being), which can be thought of as ‘sensible totalities’.

(ii) ‘To understand’ means **a/** data **b/** from a totality **c/** to interpret as meaningful (situated in that totality).

(iii) ‘sense’ (understand: meaning) is present in that which,

(iii)a. in a, totality, which is logical in nature (knowledge system),

(iii)b. in a totality, which is axiological (L.16; 122) in nature (value - system), according to its own situational laws, at the level (level) in question, acts as an essential constituent (‘konstituierendes Glied’, - literally: an element, which is an indispensable constituent of that totality).

We translate into more understandable language:

(i) If one can give a place (situate) to something (L. 7), either thinking (logical whole) or appreciating (axiological whole), in a whole,

(ii) then it shows that, in that whole, it has a ‘place’ (understand: sense). -- Well, ‘verstehen’, according to Spranger, is, essentially giving something such a place (= meaning).

Here, of course, is assumed the compassion (inner contact), as the basis of such a sense of purpose.

1. One thinks of e.g. Kohnstamm, who, while talking, gets in touch with dancing youngsters and who, within that talking contact, gives them a place (‘sense’), in our cultural whole and, immediately, in their subcultural whole.

2. Think of the poet G. Gezelle (L.5658) who, by means of empathy, literally gets involved in the world of a girl who looks after calves (Voetjes) or, in the same ‘understanding’ way, gets involved, via a poem by Emmanuel Geibel, in the dance of gypsies and gypsy women,-- in order, simply as an art lover, to be absorbed in it, but formulated in a poem, so that his empathy can be passed on to us, readers of his poem (L.137 allowing others to experience our permeations). So that we, in our turn, can enter into the world of the children, respectively the gypsies, as in a subcultural totality.

L. 140.

3A. The logical whole.

Kohnstamm gives an appl. mod. of ‘knowledge system’ (epistemological system (L.13/16: the transcendental true; 42; 124)), concerning understanding.

“(i) When Jan and Pete, together, experience ‘something’ (L.7), Jan, in the same sense, experiences along what Pete experiences and vice versa.

(ii) But, if Jan ‘understands’ Piet (in the stricter sense), then Jan can be either on the same level or on a higher level than Piet, yet not on a lower one (*note* -- ‘Level’ means, here, apparently, something like intelligence level).

a. If we were to ask a child why it plays or is fascinated by a teaching tool designed by Maria Montessori (1870/1952; Montessori was a doctor, but also an educator, who founded the Case dei bambini in Rome in 1907 and devised the Montessori method), it would only be able to answer - if it can even do that - “Because it’s fun”. The child in question speaks, immediately, as if it were only a question of lust.

b. But, if Karl Groos (think of his *Die Spiele der Menschen*, (The games of the people), Jena, 1907-2; to his *Die Spiele der Tiere*, Jena, 1907-2) or Maria Montessori (think of her Scientific pedagogy (1916), her *Het kind* (The child), (1930), her *Van het kind naar de adolescent* (From the child to the adolescent), (1948)), -- the first in his theory of play, the second in her explanation of the meaning of teaching aids, make us understand that behavior, then they fit that behavior into a -- for us, but not for the child -- comprehensible (understand: transparent) whole of meaningful coherence.

So much for Kohnstamm himself regarding methodical level of understanding (cf. L.33vv: there is just and there is methodical comparison).

L. 141.

3B.-- The axiological whole.

Kohnstamm, o.c., 16, gives us *én appl. én regul. mod.*, of value understanding.

a. “Understanding presupposes, always, an apprehended (understand: thoughtfully processed) incorporation (i) of the understood behavior, (ii) into a particular value domain (L.126: partial aspects; 127: culture totalities, culture frameworks).

1. This involves that ‘understanding’ - always - consciously ‘Wertbeziehung’ (= involvement in some value), in the (...) sense indicated by Heinrich Rickert (L.123).

2. That involvement in value can be of a very different nature,--as different in nature as the motives (*note* -- psychoanalytically one can count the (unconscious) motives as well), which underlie an act, --

(i) Very often it will consist, e.g., in being concerned with (= directed towards (L. 16: estimative capacity; 113v.: Scholast., resp. Hegelian directedness) certain vital (l. 77) lust - or unlove feelings.

(ii) but she may (...) also lie much deeper (L.18v.).

b. Appl. Mod.

1. Thus I have, e.g., solved the problem of the dance (L.58: 134) only when it has become clear to me which feelings of lust, despite appearances, are connected with it and which feelings of unpleasantness (inhibitions) prevent another expression.

2. I “understand” the woeful sobbing of a little girl when I hear that her sweetest doll is broken.

c. Conclusion.

Understanding presupposes, therefore,

(i) that I am, from my own contemplation, at home in the realm of value, in which the permeation lies, and

(ii) also, that I apperceive (= thoughtfully situate) how by the one I understand, the experience of living, more or less consciously, is ranked in it.-Which does not imply that I unite with that ranking and still less that I accept it as final.”

Up to there a first approach by Kohnstamm to axiological understanding. follows, now a second approach.

L. 142.

(i) “In order to ‘understand’ a behavior, it is necessary for us to look
(a) do partially sympathize with -,
(b) but not be totally absorbed in it. In other words, we must be able, in a sense, to detach ourselves from that behavior, -- to stand above it -- or, at least, opposite it --” (o.c., 19).

(ii)a. First appl. Model.

We cannot fail to quote, here, K. O. Apel (L.128), a.c., 39, “In every conversation between people, it happens that one of the partners

(i) does not attempt to take the partner, in his intentions, hermeneutically (= understanding) seriously,

(ii) but to approach him, as a quasi-natural event (L.130/134: scientific model), in a detached way, namely at the moment that he no longer tries to maintain the intimate togetherness in and by speaking, in the communication, that, on the contrary, he rather tries to judge what the partner says, as a symptom of an objective fact (= factual way of being (L.7), so that he, like an outsider, can ‘explain’ it, -- and this in a language in which the partner does not participate.

(iii) A characteristic of this kind, namely the partial demolition of the hermeneutic ‘communication’ in order to replace it with ‘objective’ (i.e. scientific) methods of knowing (L.130/143: human science), is the relation of the physician to his patient, -- very particularly, the relation of the psychotherapist to the neurotic (= neurosufferer)”.

(ii) b. Second appl. Model

Kohnstamm, o.c”, 16, specifies, in analogy.

1. Understanding is not at all synonymous with sympathizing, in the sense of “sympathizing with,” “taking sides with,” “identifying (axiologically) with” the one with whom one sympathizes.

Thus e.g. the much quoted “tout comprendre, c’ est tout pardonner”. (‘Understanding everything’ amounts to ‘forgiving everything’) is - as a psychological observation, at least, - the pedagogical relation of ‘understanding and forgiving’ I will not go into, here, yet - simply wrong (...)

2. The foregoing says, therefore, that to understand a behavior does not mean that the one who understands, “declares solidarity” (“unites”) with the beaming or rejecting appreciation of him / her, which he understands. I can, m.a.,

(i) to understand that someone holds something to be true or pleasing or beautiful, respectively,

(ii) without sharing that appreciation (L.137: both when they agree and when they disagree).

L. 143.

Toemaatje

Kohnstamm, o.c., 236, cites a text by *Eduard Spranger, Psychologie des Jugendalters* (Psychology of adolescence), (1924-1; 1953-23).

The context, at Kohnstamm, talks about play. “In this sense, Spranger has made a curious statement. To characterize what he means by a ‘transcending unity’ (L. 139vv.), he says the following.

a. Supposing that psychology’s task was only to describe (L. 100: purely descriptive phenomenology), what is lived through in individual consciousness itself, then the answer to the question “Why/what causes a child to play?” would, simply, come down to this:

“Because/because it experiences pleasure from it”. Reason: in it the pure subjective (= lived) sense (L.139) of the game is expressed. In that case, concerning the particular form and direction of the urge to play, no theory existed yet.

b. As soon as, however, we assert, in the sense of the theory of e.g. Karl Groos (L.140), “The child plays in order to exercise himself in the exercise of future, life-important activities”, from that moment on, we go beyond that, which, in playing, is really lived through.

After all, this “in order to” (*Note* -- L. 139: sense) occurs, not yet, in perfectly thought-out form, in the child’s soul.-- We stand, here, before an “encompassing sensible coherence” (= “transcending unity”), which, to begin with, is “übergreifend” (rising above) vis-à-vis the immediately (understand: unthinkingly) lived-through sense.

Note -- Kohnstamm, o.c., 19, says that ‘a(p)perception is “fitting into a particular sense”. Which is what Spranger’s ‘sense-making’ (L. 139) is. And Herbart’s ‘Apperzeption’ (in the educational sense) (L. 76), Cfr L. 105 (Platon’s idea). Cf. L. 137 (sing. concr. idea).

L. 144.

4.-- Understanding oneself

Kohnstamm, o.c., 19, spends a few lines on self-understanding, "self-understanding.

(1) We must be able to detach ourselves (from the primary experience or co-experience) - in order to understand ourselves - from our own behaviour. This is not always easy.

Consequence: self-deception is so common. we 'apperceive', after all, our own behavior in an incorrect, usually 'flattered' (= overly favorable) way. (...)

(2) Already the Paleoputhagoreans (L.2; 48; 94; 97; 128) had emphasized so strongly the self-deception that was emphasized, among others, by the depth psychologists (Sigmund Freud (1856/1939), neurologist and psychiatrist, founder of psychoanalysis; Carl Gustav Jung (1875/1961); Alfred Adler (1870/1937)), by

1. Says *O. Willmann, Gesch.d. Id.*, I, 321:

"The wise person (i.e. the one who wants to come to himself) should examine himself: 'Insofar as you do not 'know' yourself (understand : 'understand'), keep yourself for a madman ('nomize mainesthai')' says an 'akousma' (i.e. a typical Paleoputhagorean doctrine), which, in its own way, indicates the Delphic 'know yourself'"

2. A little further (o.c.,330) Willmann says - always speaking of the Paleoputhagoreans - : "The summary of all goods, in so far as they concern the human subject in his ideal, is eudemonia ('eu.daimonia'). (.....).

When as Paleoputhagorean doctrine is indicated "Eu.daimonein anthropon, hotan agathè psuchè prosgenètai" ("(...) that man possesses a good daimon, whenever he comes out of it as a good soul"),-- then the basic meaning, in which the word 'eu.daimonein' -- at the time of the Paleoputhagoreans -- was still understood, shines through:

(i) 'eudaimon' is whoever possesses a good (= eu) guardian spirit (= daimon) (L.49: Tho as guardian spirit in the language) -- such a thing amounts to 'a human being with a good "spirit" (and life force and "angel")', reason: the guardian spirit and the soul -- so the Feruerleer (*note* - 'Frawasji' (= feruer) is, among the Mesopotamians (Iraq, Iran) 'daimon', -- what the Romans called 'genius' (masculine) or 'iuno' (feminine)) and, even, somewhat, Herakleitos of Ephesos (L. 53; 60; 69; 73), where he says "Ethos anthropoi daimon" ("In behavior (shows itself) the daimon"), the relationship 'guardian spirit' soul' also, at -- are interchangeable;

L. 145.

(ii) 'Kako.daimon' is the opposite (L.53: privative contr.) of 'eu.dai-mon'.

3. Willmann, o.c., 363, returns to that daimon doctrine n.v. Socrates of Athens (L.101v.), who, himself, claimed to possess a 'daimonion' (= daimon), with a special gift, namely the internal voice (a, incidentally, more frequent phenomenon than the Enlighteners think).

Aristotle, too, after Platon, of course, shares the belief in eu -- and kakodemony (o.c., 528ff.), -- and well, among other things, as a fundamental fact concerning soul knowledge.

(3) M. Heidegger (L.5; 6; 13; 94), *Sein und Zeit*, I, 142/148 (*Das Dasein als Verstehen*); 148/153 (*Verstehen und Auslegung*), (Understanding and interpretation), deepens understanding, on an ontological level (L.5/19), in that being human in-the-world involves having, somewhere before all reasoned or theoretical activity (L.77; 138), a kind of understanding of oneself as in-the-world-with-others.

After all, thrown into a situation (passive aspect: thrownness), man, in any case, always designs some form of existing, i.e. as man in-the-world-with-others-being. (One forgives this typically Heideggerian language!).

(4) John Dewey (1859/1952), the pragmatist founder of the so-called 'experimental school, (L.42; 130), in his article *Le développement du pragmatisme américain*, (The development of American pragmatism,), in: *Revue de Métaphysique et de Morale* (Paris), 29 (1922): 4 (oct.-déc.), 410/430, explains how CSS. Peirce (1839/1914) (L.94/97) is at the origin of American Pragmatism, - Peirce, who, later,--to respond against W. James (1842/1910), the great psychologist, founder of pragmatism in the strict sense, who, however, gave utility a first-rate role, -- emphasized the idea (L.104v.; 137; 143), but as by means of either 'pragmatic truth'; (L.14) or destiny truth (L.14) to be tested.

"The modification of human existence, which proceeds from the application (of the idea), makes it the 'true' (understand: life) meaning." (a.c., 413).

Peirce drew the conclusions from his stance against the mere utility of truth : he changed "pragmatism" to "pragmaticism," to indicate that the idea, in itself, played a key role.

L. 146.

(5) K. Marx (L.67) puts it in terms of 'atheistic praxis': "Since - in the eyes of socialist man - all that is called 'world history' (L.126: history) is reducible:

(i) to the production founded by man thanks to human labor and

(ii) to the genesis of nature at the service of man,

has that socialist man, then also, the beholding proof, the irresistible proof, of the fact that man came into existence only thanks to himself.

In other words, from the fact that he himself is his own process of emergence (his own production process)." (We borrow this extract from *Manuskript 1844* from *Jean-Yves Calvez, La pensée de Karl Marx*, Paris, 1956, 550).

In other words, the idea of 'self-activity', peculiar to Peirce and the Pragmatists who interpreted him differently, such as James, Dewey et al, becomes, with the Marxists, who want to render Marx's thought integral (L.89: faithful reconstruction of the doctrine), aggressively God-denying self-activity or ... in an abuse of the ancient Greek 'praxis'.

Conclusion.

The self-understanding of contemporary man reflects:

(i) negatively, in the idea of 'self-deception'; Heideggerian: 'des Man' (the one, i.e. the unawakened, absorbed in daily life by average or, even, present-day mass man); Peircian: the man who, instead of investigating himself, personally, adheres to idiosyncratic, right-wing or 'liberal-aprioritarian' opinions (L.94/97), where the scientific method is appropriate;

Marxist: man, who, religiously, believes that he is dependent both on nature and, even more so, on supernature,--as an "opium eater.

(ii) positively, in the idea of 'self - workaholism, in one of the three variants, just outlined.

With Dilthey there is something analogous, but less pronounced. We will return to that.

L. 147.

General Conclusion.

To conclude this little chapter on self-understanding, we draw attention to Kard. John Henry Newman (1801/1890; founder of the Oxford Movement), where he maintains that, in a reasoning process, the whole man, with all his being, is reasoning,--and this, from ‘the first principles ‘(the first principles), which Newman means not in the formal (abstract-general) sense (L.115/118), but in the singular-concrete sense (L.119/125).

Indeed: he “means with it the premises of personal reasoning which, by the person (understand: the singular man), are unconditionally, as surely assumed,--usually without reflection (= thought, self-criticism), --even without the thought that reflection would be desirable. They are judgments, which, as it were, are immovably anchored in each person’s personality,--wholly grown together with his concrete existence. And which are different in everyone”. (*Dr Zeno, O.F.M.CAP., Joh Henry Newman (An introduction to his thinking)*, Tiel/ The Hague, 1963, 47). - Cf. L.95 (mere subj. judgment).

5.-- The feasibility limits of understanding co-occurrence.

Kohnstamm, o.c.,19v., touches, with the question of do-ability, the core of the Diltheyan method. “One condition must (...) in any case, be fulfilled, if one speaks of ‘understanding’: the very basis of co-experience must exist.

And, with that, we come to a very fundamental question: “Is that basis the same for all people?”. This means: do we have the right, always and everywhere, to start from the axiom of the equality of beings between ourselves and others, which we, above (L.133/134), have come to know as characteristic of the understanding method?”. Kohnstamm answers this question in a very multi-faceted way.

a. The empirical evidence.

L.80 (empiricism).-- “Judged purely empirically, (...) the axiom of equality of being is highly questionable.

(i) There is not only development, but also atrophy (= wasting away) of the aptitude to experience transitions of a certain nature.

(ii) If we look, moreover, at the tremendous differences in the conceptions of men, at the problem of the abnormal man, at the differences between peoples and races, then we must recognize that empirical evidence seems to argue against rather than in favor of that thesis (= axiom of essentiality).” (o.c.,20).

L. 148.

Appl. Mod.

“Someone who assumes, as a starting point, essential (= profound) differences in the basis of survival of human beings, such as the adherent of the theory of the uebermensch (*note* -- Friedrich Nietzsche (1844/1900) made this term world famous), who sees the power man as essentially different from the herd man, who submits to general norms, will, on the basis of the purely empirically given material (*note* -- ‘The power man is the power man. This is all that the actual people bring to bear concerning real ‘understanding’), certainly cannot be convinced (understand: persuaded).” (ibid.)

Note -- Kohnstamm makes an allusion here to Fr. Nietzsche’s third style of thinking in which he writes off past and present humanity, insofar as it “believes” in the established values (especially the transmitted religions and, with regard to philosophy, Platonism (L.103/105)), as outdated, indeed reprehensible (“Sklavenmoral” (slave ethics));

2. In which he predicts, in an unspecified future, the Uebermensch (understand: superior man), as the only “sense” (L.139; 143) of present humanity (“Herrenmoral” (= ruler’s ethic)).

It is, at once, clear that, in Nietzsche’s mee - experience, there is an unbridgeable gap between the ‘Sklaven’ and the ‘Herren’. Unless one assumes that the ‘inner contact’, so typical of understanding, is possible across that gap (L.137;143).

In any case: something like the endearment (altruism; L. 19), as conceived by Christianity (Solovjef), seems quite out of the question.

b. *Kohnstamm’s faith testimony.*

We quote the text, without comment. Reason: Kohnstamm makes no claim of general validity of his “first principles” (L.147),--to put it Newmanianly.

Although, o.i., a biblically-minded person can hardly doubt Kohnstamm’s view. In this sense, his starting point is more general than his singular personality.

L. 149.

“When we (...), in our reflections, start from the essential unity of humanity (meant, apparently, that ‘unity’, insofar as it comes through in understanding), i.e. from the supposition (abd. = hypothetical = regress. ed.: L.136v.) that all men are fitted to understand each other - however great are the obstacles (L.147v. = empirical material) which, in a singular-concrete case, stand in the way of mutual understanding - then we must make ourselves clear that we are (...) expressing an axiom (L.133v.).”

1. This axiom, is, first of all, to be understood in the axiological (L.141/143) or value (L. 16; 122; 139; 141/143) sense of that word.

2. This axiom is, secondly, to be understood in the religious sense, i.e. as a testimony of faith.

Note -- O.c., 72, Kohnstamm gives a hint of what he says here, understood earlier.

1. He talks, there, about William Stern (1871/1939), the founder of personalistic (L.125) psychology. “For Stern, even God -- whom he (...) designates as ‘die Gottheit’ (*note*-- the abstract -- general ‘deity’) -- lacks self-consciousness.

2. A religious person relation (understand: an’ understanding of God), in the sense of an ‘I-thou’ relation (*note*-- this expression of Kohnstamm recalls the ‘ich -du-beziehung’ (I-thou relation) of Martin Buber (1878/1965)), is, for Stern, not possible. He calls himself ‘adherent of a personalistic pantheism’ (*opm*-- pantheism

(i) does recognize deity, as omnipresent reality,
(ii) but does not recognize a personal God (with the self-conception, which the person has as a person)).

3. Kohnstamm then recalls how, in a previous work (Truth Problem, V), he mentioned the facts, “in my own experience” - he says, by which he felt ‘forced’ (sic!) to another confession: “Whoever (he continues) has found his Lord, to Whom he knows himself, unconditionally, bound, can no longer deny the existence of the ‘I-Thou relationship’. (ibid.).

In other words, with Kohnstamm, that God-relationship seems to be the paragon of all “I-thou-relationships” (basis of all understanding).

L. 150.

Says Kohnstamm, further, “We accept, with that, a fundamental proposition as a guide for all the ‘understanding’ work (L.78v.;89) of science because we do not want to give up this thesis, despite the objections it raises. Objections which, as a result, become problems for us. We refuse to accept anything that seems to us to be in conflict with this essential intelligibility as “That’s the way it is”, as a “final” (word, in this respect) to which we would have to resign ourselves.

1. Only the completion of the - in principle at least - never-ending task of science could refute this “premise” (L.26: VZ), i.e. the axiom of essentiality.

2. On the other hand, we must be aware, clearly, that, for the same reason, someone, who assumes the opposite point of view, cannot be refuted by scientific methods of proof either.”

In short: for Kohnstamm, whether or not the intelligibility axiom is valid can never be decided in a purely scientific way. the conclusive (= testing = peirastical ed.: L.137) lies outside and, perhaps, above any firm (positive) science.

The traditional Enlightened Rationalist (L.80), whether intellectualist or empiricist, will brand this as “irrationalism” i.e. the blind leap into the non-enlightened (irrational).

Yet, in the place of Kohnstamm, who does not touch that question, here at least, we answer it: Thou, Rationalist, whether Intellectualist or Empiricist, nor Kohnstamm (the irrationalist), does not, unlike foundationalist (L. 95/97), prove your own premise.

Which boils down to this: neither do you, enlightener, prove, purely scientifically at least, your axiom, namely the axiom of absolute rationality - by means of - mere - (professional) science. In other words, you too are, if you want to admit it honestly, ‘irrational’.

For bibliography, see L. 96 (esp. Bartley). For Kohnstamm, the following description (not a ‘strict definition’) is valid: “The understanding method attempts, on the basis of the assumed essential correspondence between ourselves and other persons, to order their behaviors (L.126) and societies (L.132), by fitting them (L.139/143: 68v. (dialectic); 82 (present dialectic) into the -from our own lived-through societies known-value areas”.

So much for Kohnstamm’s thesis.

L. 151.

c. -- *Our own thesis.*

This builds on Kohnstamm's thesis, but two comments come to mind.

a. A scientific work, solely and exclusively, relying on a testimony of faith, is, to be sure, Biblical (and adopted by us), but is purely (professional) scientific, yet somewhat twisted. Therefore, we return to two previous positions.

b.1. Strictly speaking, a humanities testimony for a (religious-Biblical) faith amounts to some fideism or philosophy of faith.

a. 'Faith', purely philosophical - is:

(i) the free consent

(ii) with the claims of someone (fellow man, God),

(iii) based solely on the inner contact (L.136:149: 'I-Thou relationship) with that same person (fellow man, God) and, immediately, on the (eventual, unlimited) confidence in the credibility of his claims.

b. Fideism' is that type of philosophy (which may be a science, as in Kohnstamm's case) which assigns to faith, as described above, either a higher or an equal role with respect to acting rationally.

1. That the Rationalists (L.80) object to this is understandable : a mere inner contact with corresponding trust alone can never transform a faith into a rational - reasonably justified faith.

2. Wherein Kohnstamm (and other kinds of fideists) do get it right is that they find reason (intellectualistic, empiricist) as conceived by the foundational rationalists too narrow, indeed a sophisticated form of irrationalism. In this sense, a fideism is a single type of liberation, from the narrow mindedness of the Enlighteners.

Conclusion.

Neither fideism nor enlightened rationalism. But a third way.

L. 152.

b.2. (i) *The dialectization of the humanities method.*

One resumes, now, L.77/67 (The lemmata of the present dialectic).

Two lemmata we cite, regarding Kohnstamm's leap of faith, are very particular.

1. What is purely (professional) scientific neither provable nor refutable (L.150), therefore, should not yet be founded in faith.

a. - Fundamentally, Kohnstamm introduces his faith experience, the "I - Thou - relationship" as a model, only into the humanities, to have a lemma for analysis. Nothing more. Reason: for the rest, in his explanations, this belief plays as good as no direct role anymore.

b. - But why, then, not without more, introduce the Platonic lemmatic-analytic method (L.6; 41)? After all, Kohnstamm's belief only as a lemma, as a provisionally adopted idea, makes (professional) scientific sense! Instead of one appl. mod. (belief lemma), why not the regulative model (lemma überhaupt (= without more), universal)? Precisely because of this, the typically believing lemma gets its proper place. Cfr L.78v.

Note.-- Of course, we refer - explicitly - to L. 41: there, the Platonic lemmatic-analytic proceeding is 'reductively' denoted. See, now, L. 32 (the red. ground plan; 134; 135; 136; 137: applicable.).

2. When Dilthey himself notes that

(i) without "explaining" the natural sciences (= scientific; L.152vv) - so e.g. in examining the influence of the environment on behavior (L.126: behavior; 127: the totality).

(ii) The 'understanding⁴ of the humanities is impossible; when he establishes that

(i) without (just a. type of) 'understanding' viz. understanding the principles (= lemmata) of professional science in the sense of scientific, as we saw (L.150: irrationalism of the illuminators; 133: axiom of the wezensg.).

(ii) not getting around to 'explaining' it, then he applies, willy-nilly, the complementarity principle of dialecticians (L.81vv.). More so : he assumes a type of unitary science (L.82/85).-- This proves that dialectics captures and solves problems.

L. 153.

Bibl. sample.

O. Pöggeler, *Einführung*, in: O. Pöggeler u.a., *Hermeneutische Philosophie*, Munich, 1972, 17f..

Note.-- With respect to the pessimism regarding empathy (L.147v.), it may be pointed out, here

(i) the psychology of the actor or actress who, in a most remarkable way,
(a) inner contact (L.136) and
(b) display ability (L.153 (appropriate meth.);137 (singular-concrete idea)), concerning the behaviors to be portrayed and its bearer (the fellow human being), factually and sometimes very repeatedly. This is then called the ‘born dramatist’ (in the sense of ‘rebounder’ in virtue of sensation and empathy).

(ii) the (para)psychology of the sensitive (sensitive, ‘seeing’) where we refer to L.27 (the Xhosa-Negro-African, who, (i) immediately, (ii) ‘sees’ (whether, how much and which listens)). Cf. L.110 (the true ‘see(st)er’).

After further examination, one can say that the ‘seer’ acts identitively (L.35vv.), i.e. part-identity with the object of his ‘seeing’. This (paranormal ‘mantic’) ‘act of understanding’ improves, in a curious way, Kohnstamm’s one-sided pessimism (cfr L.64 (below); 99 (transempirical verification of Hans Reichenbach)).

Of course, this (‘lemma) presupposes that one overcomes the prejudices of the foundational illuminators; a ‘mantic’ phenomenon, a paranormal phenomenon - once established - is worthy of a lemma, analysis.

One notes that, once again, the complementary and multidisciplinary approach, established with the dialecticians, applies here. The humanities scholar excludes - aprioritically (L.95/97) - nothing, not even the so scorned “paranormal” phenomena, as objects of analysis.

b.2. (ii) Phenomenology and “hermeneutics.

The elder Dilthey (O. Pöggeler, o.c., 15) strongly broke his head concerning the fact, that “life” (L. 126v.)

1. both in understanding oneself (L.144/147) and in understanding one’s fellow man (L.128/143; 147/153),

2. (i) experience (i.e. more or less consciously living through), (ii) expression (L.126 (utterances); 136 (expressions)) and (iii) representation (L.137 (the Singular-concrete idea)) includes.

L. 154.

In other words - as, has been repeated again and again since Hegel (and, for him, since German Romanticism (L.67:126)) - life, which comes to (more or less full) awareness (= consciousness of itself, is the mystery of the elder Dilthey.

This poses the problem of the proper siting of phenomenology (esp. its ideative (L.100vv.: 119) form)

“If life were not, from the outset, endowed with the capacity to grasp meanings and express them (‘signifiante’), understanding would be impossible (...). Should one not, then - secretly (‘subrepticement’) - resort to all the possibilities of a ‘philosophy of mind’ (‘Philosophie des Geistes’), precisely when one is engaged in ‘philosophy of life?’

That type of difficulty of a fundamental nature is in need of clarification - and not in any other way if one looks for its solution in the direction of phenomenology as an angle of approach for hermeneutics (= ‘science of mind’ (...))” (*P. Ricoeur, Le conflit des interprétations (Essais d’hermeneutique)*, Paris, 1969, 9).

This “scholarly” articulation of Ricoeur, an excellent connoisseur of the philosophy of mind, amounts to our outlining the proper relationship between “spiritual science” (hermeneutics) and “phenomenology.

1.-- Phenomenology (L.94/112) is - once again summarized -

(i) a phenomenon (actual mode of being, insofar as it shows itself, immediately - perceived),

(ii) to pronounce, i.e., correctly understood, in words. If it is eidetic phenomenology, then one is, in doing so, saying out the (general) essence of the phenomenon.

(iii) A phenomenological psychology (L. 108) could, then, treat as its object both the understanding of oneself (L.144/147) and the understanding of (the soul life of) one’s fellow man (L.128/ 143; 147/153). This is a first meeting point.

W. Daim, Tiefenpsychologie und Erlösung, (Depth Psychology and Redemption,), Wien/ Munich, 1954, 18ff., says, to the point: “(...) Phenomenology is (...) the first step in the data of the human soul life (as a description of phenomena viewed in a precise manner (here: of the soul life of ourselves and fellow human beings))”.

L. 155.

2.-- Spiritual Science (L.126vv.) (according to W. Daim, *ibid.*) amounts to:

(i) The clarification (ii) of phenomenologically viewed phenomena (iii) with a view to their “meaning” (“meaning clarification”; L. 139/143).

In other words, the science of mind situates the (phenomenologically) grasped phenomena (of (soul) life) in the from (L. 145 (thrownness)) and the to (L.145 (design); 143 (to - to)) of it (‘sense’).

Eduard Spranger (L.127; 138vv.) in particular has emphasized this, -- and with his idea of “structure” (L. 41).

(a) “Spranger’s definition of ‘structure’ corresponds to the definition of ‘gestalt’ (L.25; 64) (...): “An inwardly organized whole, the parts of which (L.37v.) are related to each other organically (L.68 (organicism); 83; 85 (organism)), while the essence of the parts and their operation are determined by the whole” (L.35 (identitative relationship)). (identitarian connection); 37 (more than identitarian connection)), while the essence of the parts and their operation are determined by the whole” (*S. Rombouts, Psychology for Educators*, Tilburg, 1954-1,1957-2 (*General Psychology*), 257).

(b) The major difference (between Sprangerian-derived ‘Struktur’ and ‘Gestalt’ (Wertheimer, Köhler, Koffka, etc.)) consists in this:

(b)1. Wertheimer (M. Wertheimer (1880/1943), ll. of Stumpf and Külpe, founder of Gestalt or form psychology ; W. Köhler(1887/...), ll. of Stumpf; K. Koffka (1886/1941), ll. of Stumpf (1848/1936; ll. of Brentano (1838/1917; School of Graz)) were contemporaries of Wertheimer) apply the principle of ‘totality’ to the phenomena of psyché, i.e. to patristic phenomena, without the soul;

(b)2. Dilthex, Spranger et al. apply the principle of the same totality -- first of all -- to the soul itself.... “Gestalt psychology remains study of ‘phenomena’, -- structural psychology again becomes true soul science” (*S. Rombouts, ibid.*).

The ‘soul’ (i) does not merge into a set of phenomena of consciousness, (ii) nor into a complex of ‘Gestalts’: what takes place, in consciousness, are only expressions (L. 126; 136; 153), manifestations, of the ‘active I’ (= the living soul-unit as bearer of the deeds).

L. 156,

“The ‘moderns’ -- Spranger means his immediate predecessors and contemporaries -- have reduced the human self to a ‘flowing process.’ No: there is a perpetual spiritual subject -- something, which remains unchanging, amidst the changes. The definitive development of his life lies in man himself.” (S. Rombouts, o.c., 257v.).

Well, - says Spranger - the soul (the self) is a ‘structure’, i.e.

(i) a closed coherence both of survival and activity possibilities,

(ii) directed towards values (= axiological aspect) - one thinks of his ‘to - to’ (143: sense),

(iii) centered (founded in one premise) in the spiritual “I” (the individual soul) (ibid.).

This only justifies, fully, the term “spiritual science,” i.e., behavioral and historical science of the manifestations (“objectifications,” “projections,” “works”) of the mind, understood as spiritual I (L.134)

“Tell me what you value, and I will tell you who (= what type of ‘structure’) you are”,-- said Spranger. The individual soul, after all, is what it reveres as the predominant life value, so to speak.

If, therefore, one wants to ‘understand’ someone (inner contact), one should penetrate to the singular-concrete system of values, which determines the individual ‘structure’. After all, it is precisely this type of configuration of cherished values (L.55: configuration) which organizes a person’s behavior, his history -- cf. Newman’s ‘first principles’ (L 147),

Appl. Mod. Of structure type

One takes the economic man, he lives to gain (‘earn’) money, money power, money luster, etc.: the sense (= to - to) is all that is money and money involvement.

a. virtues : thrift, work ethic, money ethic. -

b. relations: the things - e.g. objects of art - he sees from the point of view of saleability and ‘making money out of them’; the fellow human beings e.g. his wife - has, as a ‘housewife’ (who facilitates him to make profit), as a ‘businesswoman’ (who brings him ‘profit’), ‘money value’ before she is a ‘fellow human being’ (her ‘usefulness’ prevails); especially ‘know-how’ (for business shrewdly useful ‘scientific knowledge’) is ‘money; etc..

L. 157.

Appl. Mod of structure type.

Take we, now, the aesthete (art-loving). -- He lives to enjoy and to cause to be enjoyed the graceful, the sublime, - in a word, beauty. The aesthetic is the “meaning” of his life, at least the main or dominant (value).

a. Virtues: sense of beauty, by which he “excuses” everything.

b. Relations: the things:-- e.g., a simple street corner -- he “sees” as something “beautiful,” a girl is to him something “delightful,” etc.; the fellow man in the strict sense: his wife belongs to admire and enjoy along with him; she herself, preferably, is “delightful” (physically, according to embellishment); the money -- the main sense of the economic man -- is to him a useful thing “to buy something beautiful with.

In other words, he too knows and values economy, but this time subordinate to its singular-concrete main value, which is aesthetic value.

As Spranger himself emphasizes: in no individual soul does one lack even one value type, but all are always present; yet one predominates and, at once, all others (complementation; L.66) are subordinate to it.

Thus, Spranger distinguished science, (with the “theoretical” man), economics (with the economic man), art (with the aesthetic man), social life (with the social man), politics (with the power man) and, finally, religion (with the religious man).

Cfr his *Die Lebensformen* (1914), where ‘life forms’ designates structure types. The Americans, G. Allport and P. E. Vernon, in 1951, have tested and found verifiable the value of this typology of mind structures, if one uses them mutually inclusive (each not - exclusive). Cfr L.126; 127.

Note -- Humanities and depth psychology.

1. Spranger - with others (Stern, Bühler, Koffka, Kroh) has emphasized, among other things in his child and adolescent texts, “the one, all-embracing process of life and development” (S. Rombouts, o.c., 264).

2. Since the big ‘three’ (Freud, Jung, Adler; L.144), human science (anthropology) has deepened its horizons towards the un-, sub-, superconscious layers of the human mind. also, cultural science (culturology), was enriched with ‘depth psychological’ perspectives.

L. 158,

The structuralists (1.88vv; have also analyzed behavior, resp. culture as a code (secret language) to be deciphered, which is, at least in part, unconscious.

Freud's psychoanalysis in particular, as the psychology of the unconscious, is rather medical (neurological, psychiatric) in its intent: it seeks to understand the pathological (pathological, particularly neurosis). To that extent, it is understandable anthropology.

However, since it shifts the center ('de-centrement', say the structural psychoanalysts) not in the mind (the (conscious) I), but in the unconscious layers, it is not a science of mind, Cfr L.156 (134).

1. Unless one, like the traditiona for enlightened consciousness thinking (L. 80), to a great extent characterized by conscientialism (lemma, assuming that man, in his essence core, is consciousness), asserts, - one thinks of the daimon - doctrine of the Paleoputhagoreans, common for centuries, in ancient Greece (L. 144v.) - assumes that spirit is more than 'conscious mind'. Thesis, which, here, we gratefully accept as a lemma.

2. Seen from the paleoputhagorean-platonic tradition, depth psychology is merely the study of the unconscious mind (I). in this sense (and only in this traditional sense) "depth psychology" is truly mind science.

On L. 2, we said that the Paleoputhagoreans did not want to break with ancient (= archaic) 'wisdom'. Rightly all archaic cultures know - very clearly - about the unconscious mind.

Only the Enlightened Rationalists have, mistakenly, thought they had to "put forward a radically 'new' premise. Recent depth psychology has shown that this too was a lemma, which, on analysis (psychoanalysis), is falsified.

Conclusion.

- (i) Represent phenomena accurately as phenomena;
- (ii) 'understand' them (by situating them in 'om-te' structures of the soul (I));
- (iii) phenomena, accurately described, and soul, "understood," - and this to the unconscious.

Behold humanities to the fullest.

L.159. **Bookmark**

Preface.-- L.1/3. -- philosophical logic (theory of thought.-- L. 4/158.

I. -- **introduction** (the pedestal).-- L. 5/874

I.A. ontological pedestal.-- L. 5/19 ((I) ‘If anything, then fact and being (L.6/10); (II) ‘If anything, then one, true, appreciable (good) (L.10/19))

I.B. harmological (order-theoretic) pedestal,-- L.20/87.

B. (I).1. -- the summative induction;-- 1.22/33 (amplif. induction: L.30/33).

B. (I).2. -- incl. to comparative ordering.-- L.33/66.

A. -- **the lemma** (1. Collecting; 2. Comparing in and out; 3. Identical and more than identical relation; 4. Domains of application).-- L.33/42.

B.-- the analysis (= appl. mod).-- L. 42/66.

1. the measuring equation (L.42/51; mathesis universalis: L.45/ 51).

2. the differential equation.-- L. 52/66 (Typology of opposites (L. 52/54).

2.1 -- the idea idifferential (L.55/60).

2.2.-- the impact of (gradual) quantitative change on quality, (L.60/66),

B (II).-- the “new” and the “scientific” dialect. as harmology. -- L.67/87.

1 -- The new (modern) dialectic.-- L.67/75 (The four lemmas).

2.-- the contemporary (= scient.) dialectic -- L. 76/87.-- (intentional (L.77v. (encounter)); lemmatic-analytical (L.78v.) abstractive (L.79/81 (intell. and/or empir. Enlightenment)); complementary (L.81v.); unitary science (= organic) (L.82/86); historical (evolutionary) (L.86v.)

II.-- thought-provoking models.-- L. 88/158.

1. one thinking model of comparative text ordering, (L.88/93; - Structural analysis (L.91v.: collecting / empirical)).

2. phenomenology as comparative ordering (L. 94/112; c(i): phenomenon (L,94/ 99; c(ii): pronunciation (L.100/112).-- Hist. verif.: Socratic maieutics (L. 101/103); Platonic dialectics (L.103/105).-- Incl. to mythology (L. 108/110; L.111/113).

3. the ‘formal’ (abstr.-alg.) logic as compar. ordering (L.113/118; mathematical - application (L.116/118)).

4. the ‘idiographic’ (sing.- concr.) theory of thought (L.119/125).

5. the idea of the “understanding” (= verstehende, comprehensives. Humanities) method (L.126/158; 1. Science (L.129v.; 2. Humanities (L.130/134); 3.

Deo trino gratias.