It is my intention in these lectures to present a few fundamental considerations toward a phenomenological logic. By the word "logic" I do not understand a subordinated, theoretical, and normative special science in the sense that it is usually taken today, even, say, in the sense in which the modern mathematician has shaped logic as a special mathematical discipline. Logic in the full and universal sense, the sense that we will have in view, is the science that consciously reappropriates the task that was enjoined to logic in general from its historical origin in the Platonic dialectic: namely, the task to be a universal theory of science, and at the same time, a theory of science in principle. A theory of science in principle signifies a science that is in principle a science of all sciences as such.

Logic as a theory of science is then the science of the a priori of all sciences as such, the theory of what gives them sense as formations of practical reason, what they must necessarily fulfill if they are actually able to be what they want to be, namely, formations of practical reason. As a pure, a priori theory of science, logic wants to bring to light "pure" generalities according to the Socratic-Platonic method. Thus, it does not wish to follow

---

1 Editor: Wintersemester 1920/21
   Translator: The following pagination to the German text corresponds to Husserliana XVII.
empirically the same path as the pregiven so-called "sciences," the cultural forms that have emerged in fact and that bear the name "science," only then to abstract from them empirical types. Rather, free from all ties to factuality, it wants to bring to complete clarity the teleological idea one always has obscurely in mind when operating from purely theoretical interest. Steadily pursuing the pure possibilities of a cognitive life in general, it wants to bring to the light of day the essential forms of genuine knowledge and science in all their fundamental shapes, as well as the essential presuppositions to which they are bound, the necessary methods that lead to them. In all of this, then, lie the necessary norms against which is to be measured how far a factual science (initially only a presumptuous science) conforms to the idea of science, the extent to which its particular modes of knowledge are genuine modes of knowledge, its methods, genuine methods—methods, that is, which according to their principle form do justice to a pure and formally general norm. The sense of "formal" here consists in precisely nothing other than this: The guiding question is not the one concerning a particular science with particular regions of science, but rather, the question concerning the aim, sense, and possibility of genuine science as such.

Historically, what we call science in the narrow sense today developed from logic, namely, it developed at first from the normative guidelines elaborated in the Platonic dialectic. The classical expression which says that all sciences have arisen from the maternal ground of philosophy fits especially well for logic and, on the other hand, for sciences in the particular sense that we all have in mind today.

In a broader sense, we likewise give the name "science" to the cosmological theories of the pre-Platonic era, to similar cultural formations of other peoples and times, even to astrologies and alchemies, and the like. But at best they are inchoate forms, preliminary stages of science—and this holds especially for pre-Platonic philosophy or the science of the Greeks no less than it does for ancient Egyptian mathematics, for ancient Babylonian astronomy.

Science in a new sense first arises from the Platonic founding of logic, from the radical and critical reflection on essence and
eidetic exigencies of genuine knowledge and of genuine science, and from the disclosure of norms according to which a science arises that is henceforth consciously directed toward normative justification, a science consciously justifying its own method. In accordance with its intention, this is a justification from pure principles, that is, a logical justification. Science in the new sense, then, no longer wants to operate naively on the basis of purely theoretical interest. It strives to justify from principles every step it takes in its authenticity, in its necessary validity. Accordingly, in this case, the original sense is such that the logical insight pertaining to principles, taken from the pure idea of possible knowledge and of the method of knowledge in general, precedes the method undertaken in a factual manner as well as the factual formation of science, and guides it in an a priori manner; but the sense is not such that the fact of some arbitrary method and science arising naively, and the type read-off from the fact, would have to pose as a norm in order to provide a model for scientific accomplishments in general.

Plato's logic arose as a reaction to the universal denial of science—a denial characteristic of sophistic skepticism. If skepticism denied what is in principle the possibility of something like science in general then Plato had to consider precisely what is in principle a possibility of science, and he had to find it critically. If science as such was called into question, then of course one could not presuppose the fact of science. In this way Plato was led down the path of the pure idea. His purely ideal logic or theory of science that shapes pure norms (and not read-off from factual sciences), had the mission of only now making possible factual science and guiding it practically. And precisely by fulfilling this vocation it actually did help to fashion sciences in the precise sense: new mathematics and natural science, etc., whose further developments in higher levels are our modern sciences.

However, the original relation between logic and science has become curiously inverted in modern times. The sciences made themselves autonomous. They cultivated highly differentiated methods in the spirit of critical self-justification, a spirit that had now become second nature to them; the fruitfulness of these
methods became evident and certain <through> experience or <through> the reciprocal ratification by all the specialists being in agreement. While they did not cultivate these methods in the naïveté of the everyday person, they did it in a naïveté of a higher level, in a naïveté that dispensed with justifying method from pure principles by having recourse to the pure idea in accordance with ultimate a priori possibilities and necessities. In other words, logic, which was originally the torchbearer of method and which claimed to be the pure doctrine of principles of possible knowledge and science, lost this historical vocation and, understandably, remained far behind in its development. Even the grand reformation of mathematics and of the natural sciences in the 17th Century by figures like Galileo, Descartes, and Leibniz was still determined by logical reflection on the nature and exigency of genuine natural knowledge, on their a priori necessary goals and methods. Thus, if perfecting logic in these beginnings still precedes perfecting science, and if they still go hand in hand, then this essential relationship is modified in the following epoch, in the epoch in which the sciences, rendered autonomous, turn into special branches of science that no longer bother with a logic and that even brush it aside with scorn. But even logic completely departs from its own proper sense and its inalienable task in most recent times. Instead of pursuing the pure essential norms of science according to all their essential formations in order thereby to be able to provide an orientation in principle, it is instead happy to copy norms and rules from the factual sciences, especially from the highly esteemed natural sciences.

Perhaps this signals a deeper and more consequential tragedy of modern scientific culture than what one is in the habit of lamenting in scientific circles. It is said that the number of special branches of science have grown so vast, and each particular one has become so copiously diffuse in their special field of knowledge and methods, that no one is any longer able to make full use of all this wealth, to enjoy having a command of all the epistemological treasures.

The shortcoming of our scientific situation appears to be a much more essential one, a more radical one in the literal sense of the term; it does not concern collective unification and
appropiation, but the rootedness of the sciences, which is a rootedness in principle, and the unification of them from these roots. It would remain a shortcoming even if an incredible mnemonic technology and a pedagogy guided by it would make it possible for us to have an encyclopedic knowledge of the theoretically and objectively established facts in the sum-total of the respective sciences.

Lacking are the centrating ideas that would easily illuminate all thinking in the special branches of science and that would spiritualize all its particular results by relating them to eternal poles; lacking is what removes from all the special branches of science the blinders that are necessary only for their special work; lacking is the capacity to integrate them into the single universal nexus of actual and possible knowledge and thereby to understand this nexus as a nexus that is necessary in principle. But there is still much more that is lacking, namely, the reference back to the phenomenological primordial sources of all knowledge, the deepest founding of all objective sciences arising from the universality of knowing consciousness. Thus, lacking is a systematic fundamental science that would provide an ultimate understanding of all theory arising from the originally sense-giving sources of the subjectivity that accomplishes knowledge.

If the highest task of knowledge is not only calculating the course of the world, but understanding it—as Lotze characterized this task in a well-known dictum—then we have to take this dictum in the sense that we rest content neither with the way in which the positive sciences methodologically shape objective theories, nor with the way in which a theoretical logic directs the forms of a possible genuine theory to principles and norms. We must raise ourselves above the self-forgetfulness of the theoretician who in his theoretical accomplishments devotes himself to the matters, to the theories and methods, and who knows nothing of the interiority of his accomplishment and of the motivations compelling them—who lives in them, but does not have a thematic view of this accomplishing life itself.

We will understand what is accomplished as genuine theory and genuine science only through a clarification of principles that descends into the depths of the interiority that accomplishes
Analyses Concerning Passive and Active Synthesis
Lectures on Transcendental Logic
Husserl, E.
2001, LXVII, 661 p., Hardcover