# Lecture no. 2: Wittgenstein's later theory of meaning and the special role it assigns to metaphor

## Hans J. Schneider

*Abstract:* In the current discussion about the later Ludwig Wittgenstein's philosophy of language we can make out roughly two camps. Most of those who are sympathetic to modern logic and structural linguistics tend to find nothing in his later work that could matter for their own research. Others who are more interested in the history of language and literature treasure some isolated insights of his on culture and value, and are even glad that this author seems to have given up his earlier aspirations to a more systematic way of thinking about language.

The lecture will show that the later Wittgenstein does offer a detailed and comprehensive account of language meaning that is not at all trivial. In this sense his work does contain a 'theory of meaning' although the shape it takes is not of the axiomatic-deductive type, as philosophers like Michael Dummett had hoped for when they proposed to follow Gottlob Frege. The lecture will show that the phenomenon of metaphor plays a central role in (on the one hand) setting a limit for such hopes and (on the other) in deepening our understanding of linguistic competence as a human capacity.

It is a special pleasure for me to talk about the work of Ludwig Wittgenstein today. (Picture no. 1: Wittgenstein) When, in preparing these lectures, I was looking back at the years of my own philosophical development, it became clear to me that among all the influences of books I have read and people I have met, the influence of his Philosophy was the strongest. Also, since not only the details, but even some of the main points of his work are not always easy to grasp and since (especially in the English speaking world) one still meets misunderstandings of this work, I hope it will be helpful for you to be offered a presentation by someone who has the advantage of sharing his native tongue with Wittgenstein.

Since this philosopher did not only write down highly important thoughts but since also he was a very unusual personality and since in his case understanding the person does help to understand the Philosophy, I will begin the *first* part of my lecture by saying something about his background and personality. I will then proceed with characterizing his very special way of entry into Philosophy: He started his philosophical thinking not with reading other philosophers like Kant or Hegel, but he was educated as an engineer and got interested in the Philosophy of Mathematics. This had consequences for the kind of questions he was asking when he began his philosophical work, which in turn had consequences for his later philosophy.

In the *second* part of this lecture I will treat Wittgenstein's thinking in the early period, the results of which are documented in the only book he had ever published during his lifetime. It has the Latin title: "Tractatus logico-philosophicus", which means logical-philosophical treatise, and it was published 1921.

The *third* part of my lecture will turn to his later Philosophy, especially to his Philosophy of Language and to what I have called his 'Theory of Meaning'. This later Philosophy can in important respects be characterized as a revision of his older thoughts, i.e. as a revision of what he had published in the *Tractatus*. This is why also in a presentation of his later views it is necessary to say something about his early Philosophy: Many points he is making during his later period can only be understood when they are perceived as directed against either his

own former views or against views of people like Russell or Carnap that were in some respects close to his. He himself suggested that the two mentioned texts should be published together in one volume so that the reader could easily switch from one to the other. This does not exclude, however, that there also are continuities in Wittgenstein's ways of thinking.

While the third part of the lecture will mainly be concerned with word meanings and the usual (one might say: *lexical*) understanding of metaphor, in the *fourth* part I will turn to the subject of syntactic structure, and to the consequences a certain understanding of language structure will have for the shape one can envisage for a theory of meaning. The special point in these considerations will be that in Wittgenstein's discussion of linguistic structure he points to a very important phenomenon that, at a later time, has been called 'syntactic metaphor' by the Finnish Philosopher Eric Stenius. It is not very widely recognized yet, but I think it is of crucial importance for understanding the workings of *natural* languages and for understanding Wittgenstein's theory of meaning.

You will see that in this fourth part of the lecture it will be necessary to take a close look at some rather complicated details. Wittgenstein was a philosopher who liked to discuss subtle differences that tend to be overlooked by others. He is not the man to paint large philosophical murals of the kind that some other thinkers like Hegel or Habermas have been given us. Rather, most of the time he is working on tiny miniatures, and some of his readers do not find it easy to see the significance of such details and the way they fit together. I must confess here that I myself prefer this style of working philosophically, so that concerning this point I feel an affinity to Wittgenstein, which, of course does not mean that it is illegitimate or not at times also helpful to paint murals.

The *fifth* part of my lecture, finally, will step back from the details in order to put them into perspective. I will discuss the consequences Wittgenstein's thinking has for our understanding of our own language faculty, and indeed for understanding ourselves as agents.

### 1. Wittgenstein's background, his personality, and his entry into Philosophy

Although his native tongue was German, Wittgenstein was not a citizen of Germany, but of Austria. He had lived in England for some years when the Second World War began, and under these circumstances he became a *British* citizen, doing civil services in a hospital for the suffering population in London. So nationality did not matter to him very much. But I should mention that most of his work he wrote in German, only some smaller pieces of it he wrote in English.

Let me point your attention to a few more facts about his life and his personality: He was born eleven years before the beginning of the 20<sup>th</sup> century, in 1889, as the youngest of eight children. His father Karl Wittgenstein was a self-made-man in the steel industry who, in his own youth, had run away from home and subsequently became one of the richest persons in Vienna. I think this career of their father contributed a lot to the self-understanding that his children developed when they grew up. It is the conviction that what becomes of you during the course of your life, to a large extent depends on your own decisions and activities. One commentator gave this kind of conviction a more extreme sense when he formulated it as the maxim: Either you are a genius, or you kill yourself. This is a cruel and a dangerous guideline. And indeed, three of Ludwig's brothers *did* take their own lives, and he himself seems to have been close to doing so more than once. Fortunately for us, however, with the early support of the famous British philosopher Bertrand Russell from Cambridge, Ludwig decided not to kill himself, but to try to be a genius instead. But certainly he never was an easy-going, light-hearted person; he made extremely strong demands on himself, and, in consequence, on others, which often caused considerable difficulties for the people around him. These demands were ethical and were also demands on his work. And it was the world of the mind, the world of learning, not of material success (like in his father's case), in which he urgently longed to accomplish something.

The atmosphere of his childhood home in Vienna was dominated by the cultural activities made possible by the enormous wealth of his father, and the most important among those activities were in the field of music. (Pictures 2 and 3: Palais Wittgenstein Vienna, Alleegasse.) For example, the composers Johannes Brahms, Clara Schumann, and Gustav Mahler were guests in the Wittgenstein house, and private concerts were performed regularly. One of Ludwig's brothers, Paul Wittgenstein, was a professional piano player. After he was injured in the First World War and came home with only one arm, he was determined to continue his career, and the composer Maurice Ravel composed for him a concerto for piano and orchestra, explicitly written for being performed with only the left hand. (1930)

Although Ludwig Wittgenstein, like his mother and his brother, showed a great *musical* sensibility, he also had strong *technical* interests that later, together with his general interest in the cultural issues of his time, led him to architecture. In the years 1926 to 28, at a time when he had thought that he had solved all philosophical problems, so that nothing substantial in this field would be left for him to do, he designed a house for his sister Margarethe. At first he worked as a kind of assistant to the architect Paul Engelmann, but from the beginning his name appears on the drawings as that of an architect, and more and more he seems to have taken complete control of the project. (Pictures 4 to 11; building condesigned by W., Vienna, Kundmanngasse. Dates: no. 6: 1975; no. 7: 1991.) As you see, it is a Bauhaus-type-building with a serene, minimalist atmosphere and no kind of decoration whatsoever. You can still see it in Vienna; it houses the cultural department of the Bulgarian embassy. It is telling for Wittgenstein's character that at one point during the construction he is said to have insisted on changing the level of the floor of one room by just a few centimeters, in order to have the proportions right. So also in his work as an architect we can watch him following the maxim: The result of your work has to be absolutely perfect, or you better don't get started.

So, academically, he set out with engineering, first in Linz in Austria, then in Berlin and Manchester where he was working in the field of aeronautics. He made his diploma in 1908. For an engineer it is natural to be interested in Mathematics, and Wittgenstein soon developed a special interest in the *foundations* of this field. I mention this, because it is important that this was the kind of entry he took into Philosophy. And one could also say that it was the 'engineering' side of Mathematics that fascinated him when he was young. So what are the 'foundations' of Mathematics, how does Philosophy get into the picture, and what is meant by the 'engineering-side' of Mathematics?

The first pair of questions is: What are the 'foundations' of Mathematics, and what has a discussion of them to do with Philosophy? Here one might as well ask: What *is* Philosophy? The part of Philosophy that is relevant here is called the 'Theory of Knowledge', and I will now say a few words about its role in a discussion of Mathematics.

Some people in the audience may be engineers, like Wittgenstein was, or may be practicing a natural science. Such people, of course, both *know* and *use* Mathematics. What the engineer

normally does *not* do, however, is to ask 'what kind of entity is a number?' In my first lecture, when I discussed the meaning of the question 'does God exist?' I have used as a point of comparison the question whether there *exists* a prime number between five and nine. Although we all know that 'yes, seven' is the right answer, most of you, I suppose, will *not* have a ready answer to the question of what exactly is meant by 'existence' here. Do numbers exist in the same sense as mountains and rivers do? Do they exist at a certain *place*? And since you *have* this knowledge of the prime number seven, does this mean that you are also able to explain how you have *gained* it? Was it with help of your eyes, or ears, or another of your sense organs, - or do you think mathematicians possess a special kind of 'extra sensory perception'? What other possibilities are there for us to gain knowledge of such 'abstract' things?

I do not mean to repeat the points of my first lecture here, but especially for those who have not heard it I want to mention that questions of this kind constitute one type of what are called 'philosophical questions'. Questions of this kind belong to the 'theory of knowledge' or, to mention the technical term, to 'Epistemology'. In modern Western Philosophy (but, I understand, not in the tradition of Chinese Philosophy) this field has been the dominating one.

But are such questions really important? I do admit, that answering them does in no obvious way help us to do correct calculations. So philosophical questions seem to be of no obvious practical use. Instead, one could say, they are concerned with what we *presuppose* when we do calculations. And this relation of presupposition gives sense to the metaphor I have used, the metaphor that speaks of the *foundations* of Mathematics. In this way of speaking a field of knowledge is compared to a building, and to look at the foundations of a field of knowledge (you might also say: to look *in a philosophical way* at this body of knowledge) is compared to looking whether the building is firmly connected to the ground so that it will not collapse when the people living in it move some of their furniture.

Now the people *living* in a house normally are not themselves experts in what it is to give to a building a solid foundation, and they do not *have to* possess this special kind of knowledge. But certainly, as far as real houses are concerned, *somewhere* such experts should exist; somebody *should* be able to make sound judgments about the solidity of the foundations of buildings. But what is true of buildings in the literal sense, is this also true for the Sciences and for the other academic fields of study? Some people have doubts here; they tend to think that the philosophical questions of the type mentioned are altogether idle, something for sick minds, for dreamers who avoid life instead of living it. But as a philosopher I would like to insist that at least in certain moments and contexts this kind of criticism directed against Philosophy is unjustified and indeed misguided and dangerous. We can see this when I now take up the third of my questions: In which sense can one speak of an 'engineering-aspect' of Mathematics, and what does it have to do with the foundational philosophical questions just mentioned? The answers to these questions will at the same time show us some specifics about Wittgenstein's way of entering Philosophy.

At this point I have to mention the name of the German Philosopher and Logician Gottlob Frege. (Picture no. 11: Frege) I will discuss his views in more detail in my next lecture, but certain things must be taken note of already in our present context. Frege was born in 1848, so he was a rather old person of 63 years when the 22 year-old Wittgenstein visited him in 1911. He had read Frege's writings and deeply admired them. Frege, however, did not quite understand the visions that the young Wittgenstein tried to communicate to him, and so Frege recommended that Wittgenstein should go to Cambridge to Bertrand Russell, who was a much younger man of only 39 at the time. Wittgenstein followed this advice.

Now what was Frege's project that had greatly influenced the work of Russell as well as that of Wittgenstein? There is a negative and a positive side in the answer to this question. The negative side is that Frege was dissatisfied with the looseness and indeed the lack of clarity of the terminology used by the mathematicians of his time. He demonstrated, for example, that the word 'function' was used by his colleagues in a variety of incompatible senses, and (to mention a second example) he wrote a sarcastic review of a book that ran into hopeless contradictions in its attempt to define what a number is. In this second case, Frege especially insisted that it is a big mistake to think that numbers are *psychological* entities, existing in the mind of the individual mathematician. This I have discussed already in my last lecture.

But in addition Frege had a further, more ambitious goal, besides working for terminological clarity. This brings me to the positive side of his work and also to what I have called above the 'engineering-aspect' of Mathematics. Frege is one of the founders of axiomatic Mathematics, and this in turn is what makes possible today's information processing technologies as they are used in computers, cell phones, the internet, etc. all over the world.

In the time before Frege, Philosophers such as Leibniz (who lived 200 years earlier: 1646-1716) already had speculated about the possibility to construct an *artificial language* that would turn thinking into a kind of mechanical calculation that could proceed in a rigorous, way, leaving no room for ambiguity and doubt. So here is what I have called the 'engineering side' of (our understanding of) Mathematics. Leibniz's idea was as follows: If we had a universal and truthful script for designating what we want to talk about (this he called a *characteristica universalis*, a universal means of characterizing content), and if we had a formal method to handle the complex expressions of this script, especially in making visible the logical relations they have to each other (what Leibniz called a *calculus ratiocinator*), then we would be able to end our so far endless debates and just *calculate* in order to find out who is right. In so far as such a calculation can be called 'mechanical', it is a type of activity as it is treated in engineering.

It is on the way to *this* goal that Frege made a substantial advance for which he is famous today. To be more precise: He was the first to formulate what is called an axiomatic system of propositional logic. And it was in his footsteps that Russell and his colleague Alfred North Whitehead wrote their monumental work '*Principia Mathematica*' (1910-1913) which (besides Frege's works) became the foundation stone not only of modern Logic, but also of a whole new branch of Philosophy, called Analytical Philosophy. Anticipating what I will have to say in the third part of this lecture, I might mention here that Wittgenstein's *later* work consisted to a great extent in showing the limits of such a view when it is applied to *natural* languages. These, he insists, are no axiomatic systems; a natural language is no calculus, thinking is not an activity the whole of which could be performed by machines.

But let us first see the kind of philosophical trouble that Frege's formal treatment of mathematical and logical matters had produced, so that we gain a better understanding of what it means to speak about problems in the *foundations* of a field of knowledge. It is an ironic incident in the recent history of Philosophy, that it was a philosopher working in the same spirit as Frege, namely the already mentioned Bertrand Russell, who discovered (in 1901), that one can deduce a paradox in Frege's system without transgressing any of its

rules. (Picture no. 12: Russell.) But if this is possible (and Russell was right in his discovery) this means that one can deduce anything one likes, which in turn means that the system as it stands is absolutely worthless. As an illustration that can serve to show the kind of difficulty that Russell's discovery produced, think of the following characterization of a person which seems to be perfectly harmless: Let us say that N.N. is a barber in a village characterized by the fact that he is shaving those and only those men who do not shave themselves. This seems to be a totally acceptable and logically harmless formulation. But if you now ask whether N.N. is shaving himself, you get in trouble: Supposing he does shave himself, it follows that he does not, because he does not shave the self-shavers, and we said that he is one of them. So suppose instead that he does *not* shave himself. Then he is no self-shaver and consequently belongs to the persons that he (as the barber) is shaving. So in this case he does not shave himself, he shaves himself. This is the kind of trouble you can get into in Frege's axiomatic system, as Russell showed on a postcard he wrote to Frege in slightly more abstract terms.

It is this kind of problem that can occur even in the context of using most simple kinds of expressions that forces us to look at the foundational philosophical questions mentioned above, and makes it urgent to find answers, because such a paradox in a logical system is like a fire on a building. The necessity to extinguish it (which here means: the need to understand the place and the nature of the mistake one has made, in order to be able to correct it) is undeniable. If we cannot achieve it, the whole project will fail. And this is the kind of work to be done by Philosophy, in so far as it treats the foundations of a field. But if this is so and the domain in question, metaphorically speaking, is on fire, Philosophy can no longer be said to be an idle pastime for dreamers.

It is not necessary and not possible here to give you an introduction to modern Logic; I will have to say some more about it in my next lecture, when I will discuss the ideas of Frege in greater detail. But the following points must be mentioned in order to explain how Wittgenstein's early and, subsequently, his later work has developed. As I have mentioned, he joined Russell in Cambridge. Both Russell and Wittgenstein at this time regarded Frege's work as of fundamental importance for understanding human thinking and for understanding the workings of the means we have to express or convey our thoughts, i.e. the workings of language, in a very broad sense of this term that includes Mathematics as a subbranch. Frege himself had been clearly aware of some deep differences between his *logical* language or 'concept script' on the one hand, and *natural* languages on the other. But on the other hand he was convinced that certain basic relations, that he meant to articulate with precision, can only be *discovered* by looking at what we do in our *natural* languages when we argue with each other and give reasons for our convictions. There is no other place to look. When correct thinking takes place at all, not privately 'in your head', but in a way that can be communicated and can be *agreed* about as correct, it *has* to be in the medium of some language, imperfect as it might be from the logical point of view. So the relationship between our natural languages and the newly developed 'Languages of Logic' became a central concern. Is Logic the hidden core of all natural languages that in some sense is 'behind' or 'at the bottom' of (for example) English as well as Chinese? Can Frege's system of Logic be perceived as an *ideal* language?

### 2. Wittgenstein's early work: The Tractatus

Especially it was the question about 'the nature of the proposition' (which roughly asks: what are the constituents and the structure of the most elementary sentences that can be

true or false?) that became the central concern of the young Wittgenstein. As Russell told Wittgenstein's sister Hermine in 1912 on a visit they paid him in England, he had great hopes that it would be her brother Ludwig who would take the next decisive steps in this area. Possibly, it was this remark by Russell that has saved Wittgenstein from committing suicide.

Wittgenstein was 29 when the First World War ended. He had been fighting on the Austrian side, and as soon as conditions allowed it, he sent to Russell a manuscript that had grown out of their discussions and all the other things that Wittgenstein had been thinking about, and that later became his first book, the *Tractatus*. Still later this text was accepted as his doctoral dissertation in Cambridge. But this was with some hesitations, because it did not look like a dissertation, for example, it did not contain a single footnote. Wittgenstein then had enormous difficulties finding a publisher, but he finally succeeded, and his book came out in 1921. It has a very peculiar form, and also its content is quite unusual. (Picture no. 7: TLP, Chinese edition 1927.)

To speak about the content first, one can say that it treats of *everything*; it is doing so, insofar as it discusses the possibilities and limits of what can be stated with the help of (any kind of) language at all. In this indirect way, also traditional philosophical questions like how to lead a good life, and even questions about mysticism find their way into the book. Wittgenstein expresses strong opinions concerning the *limits* of language. In his foreword he describes his work as an attempt to draw the limits of language from within, i.e. from the perspective of what can meaningfully be said, leaving the rest more or less open, because (obviously) it is impossible to speak from the side of what cannot be said. He does not only see an impossibility here, but, as he indicates with the choice of the motto for his book, he looked with contempt at what he regarded as futile attempts to express in language what cannot be so expressed. We might think here of the language of certain music-critics who try to paraphrase what they take to be the meaning of a piece of music, and who thereby produce unspeakable nonsense or (as one might say with a German word) philosophical *Kitsch*. So the contempt Wittgenstein had for ornament and pretense in architecture is something he also had in Philosophy. But he is aware that he himself at points in his book transgresses some of the boundaries of language. But he is consistent: He advises the reader to regard certain of the sentences in his book as nonsensical. This is the point that the so-called 'resolute' readers of Wittgenstein (like Cora Diamond and James Conant) have made strong in recent years.

This brings me to the peculiar *form* of his book: It is rather slim (my German edition of 1963 has 105 pages) and it consists of seven basic sentences, which are numbered 1 to 7. Except for the last one (it says: "About what one cannot speak one has to remain in silence"), every sentence is followed by comments, sub-comments, etc., and the relations these have to each other are indicated by a system of decimals of variable length. The book is written in an apodictic tone; like a poet who tries to eradicate from his work any superfluous word, Wittgenstein refuses lengthy explanations and comments he deems unnecessary. This was much to Russell's distress, who had volunteered to write an introduction to the English translation in order to make it more readable. Wittgenstein thought that for the intelligent reader the sentences that the he as the author had pronounced, would speak for themselves.

In his own foreword Wittgenstein declares his conviction that he has definitely solved what he there calls 'the philosophical problems'. (I had mentioned that he felt free to turn to architecture for this reason.) He also says that the questions they raise stem from a

misunderstanding of our language. This means: As they are stated (as philosophical problems), they do not constitute meaningful questions and for this reason they also cannot be meaningfully answered. As a modern example I myself would choose for a question of this kind you may think of the so-called 'mind-body-problem': How can something like a *decision* you make (i.e. something mental) have a causal effect on your body, when you for example *decide* to get up from your working desk to get another coffee, and then indeed your legs move? Are there two fundamentally different realms of being that, despite of their difference, can interact in a mysterious way? According to Wittgenstein's thought, the very formulation of the alleged problem is misleading. A philosophical analysis would reveal that it falsely presupposes a mental entity that can have a causal effect on something material. What we have (so it will turn out) is a misunderstanding of our language. I will take some more time for a discussion of this example in my last lecture, when I will speak about the different kinds of experience.

Here we see that the 'solutions' Wittgenstein claims to have articulated in his book do not consist of (true) answers to philosophical problems. But in what respect then can his book be of interest? He gives his own answer when he closes his foreword with the remark that his book would show, how little has been accomplished by this way 'solving' (or one could say: getting rid of) what he had called 'the philosophical problems'. As a paraphrase of this remark one could say: Our really important questions concerning how we should live, do not constitute a 'problem' in the sense in which Wittgenstein uses the term. So the questions that we have about our lives will stay with us, even if we have understood his book and even if we see that the 'problems of philosophy' have disappeared. Or, as Wittgenstein himself formulates (with a surprising shift in posing the question, a shift from Philosophy to Science): "We feel that even when all possible questions of science have found an answer, the problems of our lives have not even been touched. True: Then no question will remain; and exactly this is the answer." (6.52) So the answer is that we see (firstly) that the 'problems of our lives' will not be solved by answering the 'question of science', and (secondly) that a correct understanding of language reveals that there is no extra domain of 'problems of philosophy' to which we could hope to find answers one day, because no such problems can be formulated in an intelligible way, although they still exist on the practical level. I think that we can agree to the first point (the 'problems of our lives' will not be solved by answering the 'question of science'), but not to the second: Would there really be nothing left for a rational philosophical discussion, if we had answered all *scientific* questions? What would a correct understanding of language look like, in Wittgenstein's opinion, and would it really have the mentioned consequences?

It is important to observe that Wittgenstein's early vision of what language can do and cannot do is extremely limited. This is important for us because his later Philosophy of Language can then be seen as a great liberation, as an act of overcoming the narrow limits he has set for it in his early Philosophy. This narrowness shows most clearly in his surprising but quite explicit remark that the totality of meaningful sentences is the totality of the sentences articulated by the natural sciences. (TLP 4.11) I think that our immediate response to this claim should be: This *cannot* be true without qualifications. How could Wittgenstein have come to express such a view? A few points can be mentioned that make his claim a little less bewildering. For one thing, we have to restrict it to *descriptive* sentences, and we have to take note that Wittgenstein must have thought that ultimately all true *descriptions* will belong to one or another of the *sciences*. For example, the early Wittgenstein seems to have though that some day there would be a scientific way of treating 'psychological entities' like 'states of mind', etc., so at this time he seems to have thought that

large portions of what we say about other people could be transformed one day into sentences of Psychology. (It is an interesting question, by the way, to ask how many people *today* believe this.)

But I have mentioned already that Wittgenstein did not take the abstract entities of mathematics to be psychological entities, and we can add that also he insisted that, what we try to convey in language when we speak about Ethics we are not speaking about 'states of mind' in the psychological sense. So in spite of his confidence in the progress of science at the time, in his first book as well as in his 'Lecture on Ethics' of 1929 he held that there are important areas of life that are inaccessible for language. Already in the *Tractatus* he had pronounced: "Sentences cannot express anything higher." (TLP 6.42) But what about fields like History or Social Studies, did he think that one day the questions belonging to these domains could be treated with the methods of Natural Science?

As I have mentioned, the so-called 'proposition', i.e. the meaning of a sentence, was a topic much discussed by Russell and Wittgenstein when they collaborated in Cambridge. The proposition expressed by a simple sentence like 'the cat is on the mat' obviously has something to do with what I see with my eyes, i.e. with entities which philosophers at the time called 'sense data'. But the proposition does not seem to be the same as a collection of sense impressions (the proposition is no psychological entity), nor is it just the complex material object of 'cat-with-mat', perceived as a unity of parts arranged in a particular spatial order. Still Wittgenstein thought that in order to make any kind of representation in any kind of language possible, there must be some kind of mirroring going on, some kind of projection so that we can go from the arrangements of 'entities in the world' to the arrangement of words in a sentence, and vice versa, from a sentence we understand (i.e. of which we understand the constituents and the way in which these are put together) to a 'state of affairs' in the world. So it must be possible to derive the meaning of a sentence from the meanings of the words, plus the special arrangements of the words in this particular sentence. The early Wittgenstein did not say much to specify more exactly how such a projective picturing works, especially he kept silent about the nature of 'simple objects' on the side of 'the world', the arrangements of which would determine the arrangements of simple expressions in a sentence. He seems to have thought that these are details that can be treated later. For me it is most helpful to note that Wittgenstein often used music as an analogy to language: As the musically educated person is able to look at a given score and sing the melody that is represented by it, and as he is also able to hear a melody and write down the score, so a speaker of a language must be able to make projective steps of this kind in both directions, from language to the world and vice versa. When he wrote the Tractatus, he seems to have perceived this as a necessary condition for all representation whatsoever, and once he had discovered it, he seems to have thought it to be obvious.

An important philosophical point contained in this picture is that the structure that language and the world must share in order to make these projection processes possible, is taken to be given, in contradistinction to be invented, to be man-made. Here the early Wittgenstein followed Frege who in turn might be perceived as following the tradition of Kant. Logic is something we discover, not something we invent or make up. If this is true, the structure of Logic must be something like the 'deep structure' of all languages regardless of any differences on the 'surface'. It is for this reason that Frege's axiomatic treatment of Logic could be perceived by philosophers like Michael Dummett and Donald Davidson as the core of a theory of meaning also for natural languages. Dummett indeed had urged that if we do not follow Frege here, we have no idea what else we could turn to for help. Especially he thought that the later Wittgenstein would *not* follow Frege, but that he would have nothing to offer as compensation and so would destroy all hopes to ever develop a theory of meaning.

I will leave the question of syntactic structure (accordingly: logical structure, the 'structure of the world') aside for a moment and, approaching the views of the later Wittgenstein, will first turn to single words and ask the simpler question: What is the meaning of a *word*, or: How can we understand that our words have meaning? Some of you will remember what I have discussed in my last lecture, about number-words and the word 'God'. It was always clear to Wittgenstein (as a follower of Frege) that meanings of words are no 'psychological entities', but how could a convincing alternative answer look? It was a thorough and completely new treatment of this question that has led Wittgenstein to his later Philosophy, mainly expressed in the second of his books, the 'Philosophical Investigations'. This book (unlike many others that have been published after his death) was prepared by himself for publication. It was published in 1953, two years after he had died from cancer. Let me now explain to you the basic ideas of this book, ideas of which I can say that for me they still constitute important insights.

#### 3. <u>The Later Philosophy, part one: the meanings of words and the ordinary sense of</u> <u>'metaphor'</u>

The best entry to the main ideas worked out in this second book might be the following remark of Wittgenstein in which he comments on one of the topics that I have discussed in my first lecture, namely on Frege and the problem of word meanings. Wittgenstein says: "For Frege, the alternative was this: Either (when we speak of mathematical objects; HJS) these objects are the marks of ink on the paper, or these ink-marks are signs of something, and what they are standing for is their meaning. That this alternative is not correct can be seen when we look at the game of chess. Here the objects of our activity are not the wooden pieces, and still they are not standing proxy for anything, they have no reference in Frege's sense. So there is a third possibility, the signs can have a use like in a game."

Here we have much of Wittgenstein's later Philosophy in a nutshell: As a starting point one can take the question: What are the meanings of words? Like Frege he takes it as obvious that the meaning of a numeral like 'three' or '///' are not the written marks themselves, as written on the blackboard or on a piece of paper. The mathematician is not talking about some material remains of writing, consisting of ink or chalk, as the case may be. The material things on paper or on the blackboard *are* not the numbers, but (as we say) they 'represent them'. Now Frege had concluded from this that there must be a realm of abstract entities, to which things like numbers (or propositions, or classes, etc.) belong, because we do not want to say that the mathematician is talking 'about nothing'.

Wittgenstein's point now is that this alternative is not exhaustive. There is a third possibility. And to make this plausible he is pointing to the case of the game of chess. We can say that a person, who knows how to play chess, knows *the meaning* that each of the chess figures has in the context of the game. But, as Wittgenstein correctly observes, in the given case these meanings are not entities that the figures would stand for. To know their meanings is to know how to play chess, nothing more and nothing less. It is not to have a special access to some mysterious entities of which they would be names.

Much of what he is doing in the *Philosophical Investigations* is to work out this analogy

between language and the game of chess and to discuss what it means for the problems of Philosophy. Accordingly, the basic advice for clarifying the meaning of a word is: Ask yourself how this word is used. Especially, do not take it for granted that every meaningful word must 'stand for something'; one should not presuppose that for a word to have meaning it is necessary that there should be an object it is standing for.

When we take the word 'decision' as an example again, this means that we should look at sentences like 'he made the decision to finally tell him the truth', or 'he decided to get up to fetch one more coffee', and we should see how these sentences are in fact used in contexts in which we readily understand them. Negatively speaking, also in this case we should not think too easily that there *must* be something somewhere (possibly a brain-event inside the body of the person we are talking about) that a phrase like 'his decision to get up for a coffee' refers to ('is a name of'). That this particular idea (that decisions are brain states) must even be *false*, can be seen from the fact that most of us at many times know their decisions quite well and can describe and comment on them, but only very people (or nobody, today) can answer the question, what happened in their brains when they formed the decision. So instead of saying 'mental entities do not exist' (like some behaviorists have done in former times) or 'mental entities are really physical entities in the brain', one should, in a first step, give up the search for entities altogether. Formulated as a slogan, the later Wittgenstein's advice is: Do not look for meaning-entities (like abstract numbers, or brain events, or supernatural persons, in the case of the word 'God'), but look, how the words that pose the problems you are working on, are used.

To give you an idea of some of the consequences and the importance of this drastic change in Wittgenstein's philosophical perspective, let me mention two things: Firstly, his examples and his explicit discussions show that he has abandoned his restrictive idea that all legitimate uses of language would function as descriptions. I had mentioned that in the *Tractatus* he had claimed that the totality of meaningful sentences would be the totality of the sentences of natural science. Now the new analogy between language and the game of chess leads him to speak about 'language games', i.e. social activities, performed by a plurality of participants, regulated by rules and normally involving more than just speech. So for example, we can think of the activity of building a house, in the process of which stones are transported, etc. So a 'language game' in Wittgenstein's sense normally is not something 'only linguistic'. Furthermore, he acknowledges that there are many, many different kinds of the activities he calls language games. Among others he lists giving orders, speculating about an event, making up a story, making a joke, and "cursing, greeting, praying". (PI 23) So our feeling that a picture of language cannot be right that excludes fields like History, or Social Studies, turns out to be justified after all, as he has fully acknowledged in his later work. And we can furthermore note that the rules of these types of activities, in his later way of thinking, are not of the strict character of those of a logical calculus. The rules we follow in our language games we use creatively in metaphors and other projections, in unpredictable ways. I will soon have more to say about this.

My second point in characterizing this later work is to make you see that Wittgenstein's turn to the language games (in contradistinction to his rather autistic outlook in his early work) puts the social side of our intellectual lives right into the *center*. His Philosophy now equips us with means to discuss topics like: What are the defining rules for the particular language games under consideration; who are the players of the language game, do they have the possibility to explicitly *formulate* them, can they *change* them, will they, at times, even have the *duty* to change them? In other words, now a great number of social aspects of language,

aspects that necessarily have to be mentioned when we use the analogy of *games*, come into view. Wittgenstein's later Philosophy does not only allow as meaningful the academic activities of the kind we classify as 'Social Studies', but his new approach forces him (and the philosophers who wish to continue his work) to think about how we adequately understand ourselves as social beings, as beings engaging in rule-governed activities. Of these, language is only one, but no doubt it is the most important of the activities, because it is the means to constitute, to regulate and (if necessary) to improve all the others.

To conclude this section and to furnish a smooth transition to my next paragraph, I will now take a short look at metaphors in the usual sense of the term. There are many theories of metaphor and hundreds of publications, but for our purposes only a few hints will suffice. It is convenient to start with a definition of Janet Martin Soskice, who says in her book about religious language: "Metaphor is that figure of speech whereby we speak about one thing in terms which are seen to be suggestive for another." (p. 15) So if (like Wittgenstein does) we take a diachronic view at language, i.e. if we look at it under the perspective of language acquisition, we can see that for a language game approach it is a completely normal thing to observe that (for example) a young speaker who does not yet know the word 'cat' but does know the word 'dog', will easily choose this latter word when he wants to point somebodies attention to a cat that is suddenly entering the room. So the child will "speak about one thing (a cat) in terms which are seen to be suggestive for another" (calling it a dog). In this case, she is doing so for want of another word, so strictly speaking she is using what in the history of rhetoric has sometimes been called 'catachresis'. For a grown up speaker both possibilities coexist: When talking about something (for example about the relation she has to her boss) she can use metaphors (like: 'this kills me'), but her linguistic competence does include her ability to find and use a literal expression ('this brings lots of extra work for me'). In spite of this competence to express themselves literally, competent speakers will often use metaphorical expressions, for example in order to be short or instructive, or to direct the attention of the hearer in a particular direction. For example, the expression 'computer-virus' is very apt for referring to a not easily detectable computer-program that can cause very serious trouble. It is a metaphor that was very soon adopted by the linguistic community and might for many speakers seem, for that reason, to be no metaphor any more. It sounds like a most ordinary word, like our way of speaking about the 'legs' of a table.

From these few examples we can see that the ability to transfer words from one context of use to another, even to a completely new context, and still to be understood by one's hearers, is a very basic and common part of our linguistic competence. And it fits very well to Wittgenstein's language game approach. Also in a game like chess, if a particular figure is missing we can easily choose a random object of the correct size to play its role. This ability to improvise, even to break existing rules in the interest of common goals, is a central aspect of human agency.

### 4. <u>The later Philosophy part two: Sentence structure and syntactic metaphor</u>

I now turn to the subject of sentence structure. It can most easily be approached when we note that a *sentence* forms a *unity*. In this respect it differs sharply from a *list* of words of the kind we may use for planning our shopping, when we take a sheet of paper and write down 'apples, rice, sugar', etc. As a means to express the particular kind of unity of sentences we can say that a sentence has a *structure*: It has parts, and these parts stand in particular relations that have to be understood. These relations are of a different kind than are random spatial relations occurring on a shopping list. For example when the entry 'rice' is situated just below the entry 'apples' this normally does not mean something; it is a pure coincidence. - In order to specify the structural characteristics of a given sentence, we have to characterize its syntax, i.e. we have to explain which words fit together in which way, so that they are able to form a unity of meaning. Word order and/or word endings are common means of natural languages to make visible its syntactic structure.

I would like to point your attention to the fact that I am using the term 'syntax' here in its old meaning, which includes that the syntactical means of sentence composition are not a purely formal affair, but have some kind of content. In this sense, Syntax is the part of Grammar that teaches how to build sentences. The formal view of syntax, as it has been developed by Rudolf Carnap and Charles Morris, is the result of an abstraction that was only possible after Frege had developed an axiomatic system of logic. I will have to say more about this in my next lecture.

Now when Logicians and other Philosophers look at a sentence of a natural language they often note a discrepancy between the normal school-grammatical description of its structure and a description that they think would be more adequate. Adequate, this means, for making visible how the parts of the sentence fit together on the level of *meaning*. This difference can be expressed in more than one way. One can say, for example, that the *syntactical* structure of a sentence is not strictly parallel to its *semantic* structure (which, by the way, was a reason for the Linguist Noam Chomsky to opt for a purely formal treatment of Syntax). Then the question arises how this semantic structure can be characterized. Also the Philosopher might say that the syntactic structure is ambiguous or leaves something open. So for example Gottlob Frege had observed that the natural-language structure 'a is b' is ambiguous in that it is sometimes used for predication (like in 'the boys are hungry'), but at other times for subordination (like in 'the apes are mammals'). Frege also observed that concatenations of words that form new units (like for example in 'type writer' as opposed to 'ghost writer'), that such concatenations often show no elements that would indicate what kind of complex content is intended: A typewriter is using letter-types to produce writings on paper, but a ghost writer does not use ghosts. Both of these accounts raise the following question: Since we obviously are able to perceive what I have called the semantic structure of a sentence that we understand correctly, i.e. since we can take note of it and can explain it to somebody who does not see it, and since we can do this although in our natural languages this structure often is not represented in the linguistic forms in an unambiguous and explicit way, does it not follow from these observations that we must be able to formulate a faithful representation of the semantic structure? If we can recognize it, we must be able to write it down, so it seems.

From such observations Frege draw the conclusion that for Mathematics (and then generally for the Sciences) it would be desirable to have what he called a 'concept script'. By this he meant an artificial notation that would be constructed in such a way that there will be no discrepancies between syntactic and semantic structure, and in which also all ambiguities would be eliminated. As I have mentioned already, Frege thought that such a concept script would not be an invention in the sense that the structures it will exhibit depend solely on our own decisions. Instead, he thought that there is an abstract realm of sense, which has its own structure, regardless of the degree in which the various natural languages manage to capture it. This means that when Frege set out

to write down the signs and the rules that would define this concept script, he would try to follow this objectively given structure as close as possible.

I had mentioned that the early Wittgenstein of the *Tractatus* does not specify how what he sometimes calls an 'ideal' language would exactly look like and what exactly he would see as the elementary entities of the world and the way they can combine, so that language (with its elementary signs and their combinations) and world would agree in structure. But it is quite clear that in the *Tractatus* Wittgenstein was (like Frege) of the opinion that Logic is not made up by us, but that logical structures are something we have to discover, to find out. It is at this point, I think, that the *later* Wittgenstein makes the most substantial and most far-reaching revisions of his former thought. I will explain this change with help of an analogy or picture that he himself has developed. This analogy will also be useful to make clear in which special sense the phenomenon of metaphor is central for his later theory of meaning; it is so in the special sense that is signaled by the composite term '*syntactic* metaphor'. You will soon see what this expression is meant to say.

Wittgenstein's analogy is the following. He compares the grammatical form of a sentence (in the particular case at hand this is the common and well known subject-predicate scheme), with the result of projecting certain figures from one plane (no. I), to a second plane (no. II). He notes that in such a projection one can proceed in more than one way. One possible way would be to decide first for a certain *method of projection*, say the right-angle ('orthogonal') projection, and then to carry out this method for the projection of all the figures, one by one. Then, when someone is considering the results of the projections, she will be in a position to determine, based on the form of the figures on plane II, at least one aspect of the form of the figures in the initial plane I: in the simplest case a rectangle in I appears as a rectangle in II, a circle as circle, etc. (Projection of my drawing.)

The situation is different, however, if the person who controls the projection had the intention from the start to make all the figures, whatever their forms may be on plane I, appear on plane II as circles (or some other single type of form). This result could be achieved by changing the method of projection *from case to case*. Instead of having *one* method of projection and the corresponding *varied* forms, we would have *various* methods of projection and, as a result, figures of *a single* form. In concluding these considerations Wittgenstein writes:

"In order in this case to construe the circles in II as representations of the figures in I, I shall have to give the method of projection for each circle; the mere fact that a figure in I is represented as a circle in II by itself tells us nothing about the shape of the figure copied. That an image in II is a circle is just the established norm of our mapping. – Well, the same thing happens when we depict reality in our language in accordance with the subject-predicate form. The subject-predicate form serves as a projection of countless different logical forms."<sup>1</sup>

The last two sentences, which introduce the theme of grammatical form, echo an earlier formulation, which I will also quote:

<sup>&</sup>lt;sup>1</sup> Wittgenstein 1974, p.205

"It is like this with reality if we map it onto subject-predicate propositions. The fact that we use subject-predicate propositions is only a matter of our notation. The subject-predicate form does not in itself amount to a logical form and is the way of expressing countless fundamentally different logical forms, like the circles on the second plane."<sup>2</sup>

If we read these passages in isolation it might look as if Wittgenstein would still pursue Frege's goal of writing down the logical forms, i.e. the real semantic structures that natural languages fail to exhibit, and if he would still cling to the idea that this would be possible in an unambiguous and explicit way. But his talk about '*countless* ... logical forms' should be taken as a warning. What can the term 'logical form' mean if it is true that there are, in the literal sense, so many of them that it is impossible to count them?

In order to understand the position that Wittgenstein will finally arrive at, it is helpful to look at the wider context in which the discussion of the picture of the projection between the two planes takes place. In a pertinent passage Wittgenstein addresses doubts that he has concerning Russell's suggestions for logical standardization, and he considers the sentence 'I see a circle on a red background'. He notes that Russell would handle this sentence as an existential proposition ('there is something such that it is a circle and it is on a red background') and that this existential proposition would be treated as a denial of a general proposition ('it is not the case that for all x it is false that x is both a circle and x is on a red background'). Now Wittgenstein wants to insist that the generality of his sample sentence consists of leaving open some possibilities (e.g. color and size of the circle), and he asks critically what this kind of generality has to do with a 'totality of objects', to which a speaker makes reference if she uses Russell's form of expression. On the basis of this example Wittgenstein makes an appeal for distinguishing different kinds of generality; so he confronts the undifferentiated logical norms of Russell's language with the differentiation in possibilities of expression found in natural languages, and suggests that the reader take this as an argument that calls Russell's standardization into question.

Wittgenstein then offers the thesis that Frege's distinction between concept and object is nothing other than the distinction between predicate and subject.<sup>3</sup> And to this distinction, in turn, he does not want to grant any special status it might be thought to have simply on account of its special, 'logical' content. He writes:

"When Frege and Russell talk of concept and object they really mean property and thing; and here I'm thinking in particular of a spatial body and its colour."<sup>4</sup> And a little later:

"If a table is painted brown, then it's easy to think of the wood as bearer of the property brown and you can imagine what remains the same when the color changes."<sup>5</sup>

So what he says here is that the universality of the subject-predicate form (as well as the object-concept form of Frege' logic) is just the result of a declaration that a particular form of expression should serve as a standard, even though that form originally served to express a *particular* content (or a particular type of content). With such a decision in place, it is no surprise that this standard form is now used for *every*, or nearly every

<sup>&</sup>lt;sup>2</sup> Wittgenstein 1975, p.119 Philosophical Remarks

<sup>&</sup>lt;sup>3</sup> Loc cit., p.119; Cf. Wittgenstein 1974, p.205

<sup>&</sup>lt;sup>4</sup> Wittgenstein 1974, p.202

<sup>&</sup>lt;sup>5</sup> Loc cit., p.205

content. The universality of this form is a 'matter of our notation', of 'established norms'. And now we can say: Wittgenstein's quoted thesis that the subject-predicate form *does not amount to* a logical form refers not only to the subject-predicate form of natural languages, but also to the standardization of the 'logical grammar' of Frege and Russell. Neither one of the two 'grammars' manifests in its form what Wittgenstein called the 'logical form' of the expressions in question. He treats 'logical form' in this peculiar sense as something that can be characterized by rules; and he refers to these rules in an equally unconventional way as 'grammatical rules'. But this is not the normal sense of 'grammar', neither in the sense of 'school grammar', nor in the sense of a logical grammar of the nature of Frege's concept script. And indeed, when we see how Wittgenstein uses the word 'grammar' in the *Philosophical Investigations* we will find that it is a wholly idiosyncratic way. What he means cannot be spelled out by a system of rules that would specify the correctly formed sentences of a language.

So it is not Wittgenstein's goal to improve on Russell's standardization. We can also note that he does not make the slightest attempt to bring a language-independent 'reality' to bear as the standard by which to critique the undifferentiated character of grammatical or of logical forms. Instead, he points to differences in the *use* of expressions. In marked contrast to the usual terminology, he calls all rules (which he assumes to be either explicit or at least recognizable, i.e. able to be made explicit) that concern such differences in use 'grammatical' rules, and he stipulates that they belong to the characterization of what he (quite misleadingly) calls 'logical form'. So when he says that the schematics of 'subject-predicate' and 'concept-object' do not *amount to* a logical form, he does not mean to imply that substituting these schemata by a number of finer grained ones would do the job. Rather they do not amount to a logical form because they do not express the differences that result from the rules governing their use. These differences remain invisible in the concept scripts of the types discussed. Therefore, as expressions of 'logical forms' in Wittgenstein's very special sense, what these concept scripts can do is quite limited.

But this means that he has given up his old idea that all kinds of representation rest on the fact that the world and language share the same structure. He used to think that it is this common structural ground that enables us to make projections of a 'picturing' or 'mapping' character, from world to language and from language to world. In the quoted analogy this corresponds to the first case, the case of orthogonal projection, in which the structure of the world determines the structure of language, and the method of projection is fixed. But this he now sees as an illusion.

According to his new view, the uniformity of grammatical or logical forms is not the result of a reduction of an independently existing diversity to a limited number of linguistic forms. What in the second case of his analogy he called the many kinds of projection are not kinds of reducing the manifold of reality. Rather, the starting point of a projection is a pre-existing grammatical form, at first necessarily specific to a *particular* area of discourse, which then is carried into *new* areas of discourse in a free, spontaneous act of creative imagination. This act was unforeseen in the previously available ways of speaking (i.e. available rules) of the language, but its freedom is limited, of course, by internal or external constraints of the situation and by the need to be understood. The recognition of the 'logical form' in *Wittgenstein's* new and unusual sense then consists of two components: the recognition of the grammatical form in the traditional meaning of the term on the one hand (it mirrors the original and previously

available means of discourse), and the recognition of the availability and special sense of the particular projection on the other hand. The direction of the projection has turned one hundred and eighty degrees: it no longer goes from 'reality' to language (whose structure, on the orthogonal view, corresponds to the structure of the 'reality'), but instead goes from the language (from a *particular* language game) to areas of 'reality' to which we have not yet given voice in language.

The radical character of the change that Wittgenstein is making gets a good expression in the already mentioned observation that in the second case of his analogy the direction of projection goes from language to the world. Language does no longer picture the structure of the world. Instead, it is our way of representation, that is projected onto new areas of our engaging with the world. We use an inherited form of expression (for example the actor-activity form, like in the expression 'the man runs') to express not only a new content (like in 'the woman reads'), but also a new kind of content (like in 'the fighting stops'). In reality, there is no actor called 'the fighting' and there is no activity called 'stopping'. But to use an old expression for saying something new, to "speak about one thing in terms which are seen to be suggestive for another" was the definition of metaphor I had given above, only that this 'speaking about one thing' in the present case involves means of expression that signal how words belong together to form a unit of meaning, i.e. it involves syntax. This is why I think that Eric Stenius made a lucky terminological choice when he coined the term 'syntactic metaphor': One means of expression (the syntactical form suggestive for the actor-action relation) is used to speak about something else, to express that the fighting stopped.

### 5. <u>A Theory of meaning: Understanding linguistic competence and the role of</u> <u>Philosophy according to Wittgenstein</u>

In the last part of this lecture I will now step back from the details and spell out some of the consequences this 'Copernican Revolution', i.e., of Wittgenstein's turning around the direction of projection between world and language. In many traditional ways of thinking it has been from 'world' to language, and with the later Wittgenstein it is now from language to the 'world'. He was not the first to propose such a turn. For example Wilhelm von Humboldt can be seen as a predecessor here. But he was the first to back his proposal in the face of modern logic and with the detail that this kind of analytical thinking asks for.

The first consequence to be mentioned here is a drastic change in what a theory of meaning must contain among its necessary parts. Spelling out syntactic structures in either the traditional grammatical sense or in the logical sense exemplified by Frege's 'conceptual notation' should still be part of it, because *logical* languages are good points of comparison when we want to understand the workings of *natural* languages. But according to Wittgenstein, such a comparison will reveal that the domain of meaning that logical structures cover is much smaller than philosophers like Dummett or Davidson had hoped for. It does not lead to a differentiation in sentence meanings that must be required when the goal is to explain what it is for a speaker to understand a sentence of his natural language.

Using Wittgenstein's illustrative analogy again, we can say that in many cases, if we want to understand the meaning of a sentence, we have to take into account what in his

analogy he has described as the many and divergent 'methods of projection'. To mention the main example of my first lecture again: If we want to say what it means to understand the sentence 'God exists' (or, for that matter, to understand 'a prime number exists between five and nine'), it is not enough to be told that in both cases an object is being referred to and it is stated that its name is 'God' (in the first case) or that certain predicates are true of it (being a prime number between five and nine). Saying that an object is being referred to just is not enough, because there are different kinds of referring to an object at stake here, and different meanings of 'object', and these differences are not covered in Frege's logic. They can only be explained by turning to the different uses we make of logical structures.

So instead of trying to find a universal deep structure or concept script that would exhibit the meaning side of language structure in an explicit and unambiguous way, we have to take into account the human ability to put old linguistic means to new uses, the human ability to make metaphorical moves. Looking at two examples that I have already mentioned we can say: (1) Instead of attempting to find the 'real' or 'deep' structure of the sentence 'the fighting stopped' we should be aware that the sentence works in such a way that in it we treat a process like an acting person and the ending of the process as this person's activity. (2) Instead of asking what unperceivable entities are named by expressions like 'the number seven' we should understand how words for counting are used and how definite descriptions like 'the tallest tower in London' (i.e. a syntactical form) can be applied to the results of counting and can be used in such a way that it appears as if a special realm of 'abstract objects' would have been discovered (like in the expression 'the prime number between five and seven').

So understanding the human ability to use and comprehend lexical and syntactic metaphors becomes a vital part of a theory of meaning for natural languages. It is true that the shape of such a theory of meaning differs from conceptions developed by Davidson and Dummett, who both hoped to cover sentence meaning by their approaches. But I would not call Wittgentein's treatment unsystematic and I would not hesitate to call it a theory. Davidson thought that a theory of meaning for a natural language could be similar to the specification of a formal language of the kind that Alfred Tarski had spelled out. It would have to specify the syntactically well-formed sentences of the language in question and then would interpret them as sentences in formulating truth conditions by speaking about objects and about what predications would be true of them. Dummett additionally observed, that when the subject matter is a *natural* language and when the theorist is a *philosopher*, we should be able to explain in what the kind of competence consists in that Davidson speaks about in terms of 'concepts' or in terms of being a logical name. I think that Dummett is correct when he criticizes that an attempt to explain our language ability in terms of psychological meaning units like concepts will make the approach move in a circle, because it seems not possible to explain the psychological entities without recourse to the units of language. In his turn against Psychologism I think he is taking up a valuable aspect that Frege and Wittgenstein share. And personally I think that Wittgenstein's conception of a 'language game' offers a way out of this circle, because it treats publicly accessible activities, not what happens privately in a person's mind.

If Wittgenstein is right, a theory of meaning that explains our ability to understand the meaning of new expressions solely in terms of structure and word meaning stops short of the most important issues he finds in a reflection on Language. For the later

Wittgenstein (as for the early one) the problems of Philosophy arise because we misunderstand the workings of our language. The later Wittgenstein has a more exact proposal than he had in his youth as to what exactly it is that we misunderstand. In my own terminology, I can now say that in many philosophically relevant cases we fail to appreciate syntactic metaphors. We take a 'form of representation' at its face value, i.e. we tend to see the relations of content that are meant to be expressed as analogous to the relation that the form expresses in other (more usual) contexts, and then we get into what we conceive of as deep philosophical problems.

It is mainly in the so-called 'Philosophy of Psychology' that we find highly convincing examples of the points Wittgenstein wants to make. Let me end my lecture by a brief look at a case that I have mentioned already, to the question: What are mental events and processes, and do we want to ascribe causal powers to them, when we say things like: 'My decision to get another coffee made me leave the room at half past four'. In what sense are decisions *mental* processes, can they cause *bodily* processes (like my getting up, my moving my legs), and if so, how can it be that there are causal relations between mental and physical entities that seem to be of completely different ontological realms? These questions have until this day a deep philosophical ring to them, and they are widely discussed in contemporary Philosophy. What do we see when we approach them with the means for understanding the workings of language that the later Wittgenstein has provided? At one point Wittgenstein looks at the word 'opinion' and says the following:

"To have an opinion is a state. – A state of what? Of the soul? Of the mind? Well, of what object does one say that it has an opinion? Of Mr. N.N. for example. And that is the correct answer.

One should not expect to be enlightened by the answer to *that* question. (A state of what? HJS) Others go deeper: What, in particular cases, do we regard as criteria for someone's being of such-and-such an opinion? When do we say that he reached this opinion at that time? When that he has altered his opinion? And so on. The picture that the answers to these questions give us shows us *what* gets treated grammatically as a *state* here". (§ 573)

So the first thing to note is that it is grammar (or logic) that makes us speak of states ('mental processes and events') here and invites the Philosopher to search for a particular ontological realm where such entities are at home (like in the case of numbers and gods) and (in today's discussion) investigate how these entities relate to entities from other realms, like brain states.

According to Wittgenstein's diagnosis, our speaking of processes, events, and states involves a 'picture': the picture of something like for example water that can be in a particular state: it can be colored, or frozen, or fluid, etc. So we think of the soul or the mind as some kind of substance that also can be in different states. As you know, some philosophers have taken the difficulties that we get into when we try to investigate this kind of 'substance' as a reason to deny the soul, or the mind. But this is not Wittgenstein's response. Instead, he says:

"The impression that we wanted to deny something arises from our setting our face against the picture of an 'inner process'. What we deny is that the picture of an inner process gives us the correct idea of the use of the word 'remember'. Indeed, we're saying that this picture, with its ramifications, stands in the way of our seeing the use of the word as it is." (§ 305)

And as an alternative he proposes to look at the *use* we make of the expressions that have lead us into the philosophical confusions I have indicated. As he says in the quoted passage, contrary to the usual philosophical way of thinking, it is turning to the aspect of use that makes us ask the 'deeper questions': "What, in particular cases, do we regard as criteria for someone's being of such-and-such an opinion? When do we say that he reached this opinion at that time? When that he has altered his opinion?" So it will not help to treat Frege's Logic as a universal expression of all kinds of facts, as a universal representation of the content side of language structure, and to think that all remaining differences are differences between kinds of objects that would have to be treated in the different sciences, like Mathematics, Theology, Psychology, etc. This would mean to stay on the surface of things, to follow 'surface grammar'. And Wittgenstein's claim here is that this is also true with regard to the logical grammars of Frege and Russell.

His general proposal in this situation is that we should "make a radical break with the idea that language always functions in one way, always serves the same purpose: to convey thoughts – which may be about houses, pains, good and evil, or whatever." (§304) As Michael Dummett has correctly observed, this is indeed a 'radical break' with analytical kinds of theories of meaning inspired by Frege. But I have tried to show that Wittgenstein does not leave us with empty hands. He has drawn a quite detailed picture of what kinds of abilities have to be added when we want to have an adequate understanding of our linguistic competence to speak and comprehend a natural language. The ability standing out as the most important one, is the ability to make use of a given means of expression, familiar from old contexts, in new surroundings, and thereby to explore new territory. This I have called the ability to make *metaphorical* moves, in the use of our vocabulary, but also of syntax. Or, to put it the other way round: Only when we are able to recognize such metaphorical moves can we avoid those philosophical problems that originate in a misunderstanding of our language.