

Meaning and Definitions

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Philosophy of Language » Lecture 1

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Preliminaries

Why Study Philosophy of Language?

I claim that if you want to be a good philosopher today then you ought to study a lot of philosophy of language.

The argument for this is both simple and a bit dull. Arguments are the primary tools and targets of philosophers. When we assess an argument we consider whether the premises are true, and whether the premises entail the conclusion. But the answer to such questions depends on the meaning of the sentences in the arguments, and so it is understandably common for opposing philosophical parties to dispute claims about meaning. Meaning controversies include whether *knows* is a context-sensitive expression, whether value attributions assert propositions and whether numerals are singular terms. Such questions are not trivial ones, which any fluent speaker is in a prime position to answer accurately with relatively little thought. (Russell 2012: 4)

Our Focus

- › Because issues about meaning are central to philosophical concerns with language – as opposed to issues about syntax or phonology, for example – our focus is on what in linguistics is called **semantics**, or the theory of meaning.
 - › Indeed, the central topics of our course could be offered as a semantics course in a linguistics department; and some issues that are often included in philosophy of language courses are omitted here: e.g., metasemantic issues about mental representation or radical indeterminacy of meaning, the metaphysics of languages, or skepticism about meaning.
- › Our focus will be on developing a basic theory of **how language works** in argument and communication, one that you might use to to understand these controversies, and avoid pitfalls that someone might fall into through an inadequate understanding.
 - › Consider a **merely verbal** disagreement: suppose two people are facing one another in front of a building, and have a disagreement about whether the building is on the left or on the right. This disagreement vanishes once one understands how **context-sensitive expressions** like *on the right* function (**Lecture 8**). I don't claim anyone would be fooled by this dispute, but perhaps there are more disguised expressions that behave like this and which have led to misunderstandings or worse – semantic disputes are not trivial, contrary to the connotations of the phrase '**just semantics**'.

Notation

- › In keeping with our text and the standard convention in linguistics, when I am mentioning – talking about – a linguistic expression I will generally *italicise* it.
 - › This is the same sort of function often played by quotation marks.
- › So these are all true (check you understand why):
 - (1) Smoking causes cancer;
 - (2) *Smoking* doesn't cause cancer, but does have seven letters – like 'Smoking';
 - (3) *Smoking causes cancer* is a sentence;
 - (4) Some English expression contains five words;
 - (5) *Some English expression* contains three words.
- › In these lecture notes and slides, I use **boldface** for emphasis.

A Very Brief History of the Theory of Meaning

Picture theories of meaning

- › Philosophers have been interested in language for a long time, particularly in connection with thinking about **representation**.
- › Locke, for example, in his *Essay Concerning Human Understanding* has a long account of the nature of linguistic representation. His story is roughly this:
Locke's thesis Words in their primary sense designate (or name, or stand for, or represent) ideas in the mind of the speaker that uses them. (1689: bk. III, 'Of Words')
- › But this view seems on the face of it to be mistaken; *smoking causes cancer* is about smoking and cancer – things and events out there in the concrete physical world – and if that claim is true, that's because of how those things are, not because of any facts about the ideas of 'smoking' and 'cancer' in my head.

The rise of modern logic

- › Locke's theory fared even more poorly after Frege's (1879) development of modern logic. For Frege's logic brought into plain view the special logical status of words indicating **generality** (like *all*, *none*, *some*, *most*), the sentential **connectives** (like *not*, *and*, *or*), etc.
- › **None** of these words seem to be much like **names** of things at all, let alone ideas in the mind.
- › With the rigour of formal logic at hand, it was noticed how poorly behaved some natural language constructions were, once their apparent logical structure was made explicit. The first reaction was often to think that this was a **fault** with natural language: that language should be reformed to better fit logical ideals of precision and clarity.
 - › Think of how when formalising into logic we remove ambiguity; or paradoxes of vagueness (we'll talk about those in [lecture 3](#)).

Ordinary language philosophy

- › In the mid twentieth century, an obvious reaction to this **reforming** view: just because natural language didn't appear to have the simplicity and precision of artificial languages, didn't mean that it was defective.
- › These **ordinary language** philosophers (Austin, Wittgenstein, and others) argued that the diversity and complexity of natural language means that formal techniques will always fall short of capturing the richness of natural language:

Think of the tools in a tool-box: there is a hammer, pliers, a saw... The functions of words are as diverse as the functions of these objects. (Wittgenstein 1967: ¶11)

For a *large* class of cases—though not for all—in which we use the word 'meaning' it can be defined thus: the meaning of a word is its use in the language. (Wittgenstein 1967: ¶43)

The advent of formal semantics

- › In the late 1960s and early 1970s, however, buoyed by the success of Chomsky (1957) in giving formal and mathematically precise accounts of **syntax**, philosophers, logicians, and linguists were encouraged anew to think that natural language meaning could be the object of **systematic study**; that it could be reclaimed from the anti-theoreticians – rejecting Wittgenstein’s maxim, ‘don’t think, but look!’ (1967: §66).
- › These theorists – including Montague, Cresswell, Kripke, Lewis, Kaplan, Kamp, Partee, Stalnaker – started a research program of **formal semantics** based on two simple ideas (Partee and Portner 2002):
 - Compositionality** That the meaning of a sentence is determined by the meanings of its parts, and its syntactic structure;
 - Truth-conditionality** That the meaning of a sentence is in large part captured by a specification of the possible conditions under which it is true.
- › This is the philosophical and linguistic approach to meaning that this course aims to introduce to you.

Definitions and Meaning

An Easy Road to Semantics?

- › Semantics is the theory of **meaning**.
- › But isn't this easy? For surely, **if you want to know the meaning of a word, look it up in the dictionary!**
- › A dictionary entry for a word proposes a **definition**.
- › Actually understanding what definitions are is tricky (Gupta and Mackereth 2023). Here's an attempt to characterise a definition:
 - ▮ A definition of a word gives **necessary** and **sufficient** conditions for the application of that word.
- › A necessary condition for being *F* is a feature all *F*s have (so all triangles have sides); a sufficient condition for being *F* is a feature only *F*s have (only triangles are isosceles).
- › If word meanings are definitions, they are principles that perfectly classify things that the word applies to.
- › It is natural to couple this with a thesis about **understanding** (knowledge of meaning):
Meaning-Competence Knowledge of meaning explains linguistic competence: someone who understands a word uses it to reliably classify, and that ability is grounded in their knowing the meaning.

Where Definition Works

- › It is unarguable that **sometimes** we can give the meaning of an expression by a definition.
- › In particular, when we explicitly **stipulate** the meaning of a new expression.
- › This happens a lot in mathematics, e.g.,
 - ▮ *A prime number* is defined as a number greater than 1 which is divisible without remainder only by itself and 1. *A triangle* is a three-sided closed plane figure.
- › But does this apply to other expressions, which come into our language more **organically**, without some explicit act of introduction?

Scepticism About Definitions

- › The thesis I am going to defend here is this: **Few, if any, entries in any dictionary are definitions in this strict sense.**
- › Elbourne goes even further:
 - giving definitions of words is a task of mind-boggling complexity; ... I have been trying to suggest ... that no-one has ever given an adequate definition of a word, as far as we know, with the possible exception of mathematical terms; and ... dictionary entries do not generally give the meanings of words. (Elbourne 2011: 11-12)
- › I'll make the case for this; and later respond to some challenges.

The Meaning of *Chair*

- › Elbourne's first main example is the ordinary word *chair* (2011: 2–6).
- › Here's what the *Macquarie* dictionary has to say:
 - ▮ a seat with a back and legs or other support, often with arms, usually for one person. [\[link\]](#)
- › Two questions about this proposed definition:
 1. Is meeting the specified condition **sufficient** to be a chair – i.e., does it apply **only** to chairs?
 2. Is meeting the condition **necessary** – i.e., does it apply to **all** chairs?

Sufficiency

- › The definition is much hedged (*usually, often, and or other support*), and so a likely inadequacy of the definition lies in its being too inclusive, i.e., it is an insufficient condition on being a chair.
- › Consider Elbourne's example (2011: 2): a **garden bench**. This is a seat with back and legs for support, and often arms; we can even put the bench in an unpopular place, so that it is only ever sat on by one person. But it's not a chair.
 - › Or consider a children's swing (it has 'other support' – the chains – but is not a chair);
 - › Or a banana lounge, or a *chaise longue*, or a sofa, or a plane seat,

Intension and Extension

Semanticists distinguish between the *extension* and *intension* of a term like *chair*: roughly speaking, the extension of *chair* is the set of all actual chairs, while the intension is the set of possible chairs, allowing for all the possibilities of bizarre science-fiction scenarios. (Elbourne 2011: 4)

- › A definition of a word should account for how that word applies to things in **every possible situation**: it must generate the **intension** of the word defined.
 - › This is just another way of saying that a definition needs to give necessary and sufficient conditions, not just conditions that happen to pick out the actual chairs.
- › So for example while the moa is a now extinct wingless bird species of New Zealand, and no other species meets that description, this is not the intension of *moa* – because presumably it is not necessary that the moa went extinct.
 - › This condition is **extensionally adequate**, but gets the intension wrong, by being too restrictive.

The Extension of *chair*

- › Return to the example of *chair*. The Macquarie condition isn't even extensionally adequate. The following is an improvement in that respect, but still isn't a definition:
 - (6) Any object for sitting on to which a competent speaker of English would apply the expression *chair*.
- › Even if it is true that we actually would use the word spelled *chair* for chairs, we needn't have (had the history of English gone differently). Suppose that English had evolved so that we called sofas *chairs* – still, that wouldn't make a sofa a chair.
 - » If we decided to start to call a dog's tail a *leg*, how many legs would a dog have? Still four: calling a tail a *leg* doesn't make it one. (This old observation is falsely often credited to Abraham Lincoln (O'Toole 2015).)

Necessity

- › Because the Macquarie definition is so lax, one might think that nevertheless everything which is a chair (along with a bunch of other things) would fall under it.
- › Other dictionaries err on the other side. The *Collins Pocket Dictionary* says this:
 - ▮ a seat with a back and four legs, for one person to sit on. (Elbourne 2011: 2)
- › But when I was writing these notes, I was sitting on a swivel office chair. This is a chair, but no matter how you count, a central column splaying to five radial arms with casters does not add up to four legs.
- › What about a deck chair – does it have a seat and a back?

Is this 'for one person to sit on'?



Figure 1: The world's biggest chair, St Florian, Austria.

Philosophical Analysis

Dictionary and Philosophical Definitions

- › Maybe the problem is that we're holding our dictionaries to too high a standard.
- › Because dictionaries, despite common assumptions, don't actually aim to offer necessary and sufficient conditions!

Dictionaries aim to provide definitions that contain sufficient information to impart an understanding of the term. It is a fact about us language users that we somehow come to understand and use a potential infinity of sentences containing a term once we are given a certain small amount of information about the term. Exactly how this happens is a large mystery. But it does happen, and dictionaries exploit the fact. (Gupta and Mackereth 2023: §1.2)

- › But the actual **meaning** of a word isn't so lax: it should allow for classification, and so it should provide necessary and sufficient conditions for a term.
- › So maybe the attempts of philosophers to provide necessary and sufficient conditions – sometimes called **conceptual analyses** – might generate meanings in the strict sense?

No, they don't...

- › Unfortunately, there are hardly any terms of philosophical interest that have an agreed analysis, despite the efforts of philosophers over the past 2500-odd years.
 - » A problem for philosophy **only if** you think philosophy is about 'conceptual analysis' – a view that was last popular in the 1950s.
- › In epistemology, you might have encountered the **JTB definition of knowledge**, the proposal that knowledge is justified, true, belief. But consider
Stopped Clock You glance up at the station clock and see that it reads five o'clock. You now believe that it's five o'clock. Your belief is justified (the clock is normally reliable, you know it to be so, etc.), and as it happens it **is** five o'clock, so it's true. But unbeknownst to you, the clock stopped exactly twelve hours ago. (Russell 1948)
 - » This is an example of a **Gettier case** (Gettier 1963).
- › These difficulties with *knows* are representative; think about *free will, truth, right,*

...or at least, not often

- › There are a couple of examples of philosophical accounts of substantive and interesting notions which have been widely accepted:
 1. The Church-Turing analysis of *effective method* (Copeland 2024).
 2. Tarski's model-theoretic analysis of *logical consequence* (Tarski 1936).
- › We'll skip the details, but note this: these are both analyses of **quasi-mathematical** expressions, where both the class of things to which the term applies are precise and well-behaved, and the terms in which the analysis itself is given are equally precise and well-behaved.
 - ›› They may in fact be cases where a new **stipulation** takes over an existing poorly understood expression – maybe what Carnap (1945: 513) called 'explication'.
- › In the earthly realm, things look rather less clear-cut, which will at least have the effect of making definitions less agreed upon – even when they are true.

What About Science?

- › Elbourne turns his attention to scientific expressions: *metal* and *gold*.
 - › In his discussion of *gold*, he follows some threads to be found in Kripke's *Naming and Necessity* (1980), and we will return to related issues in **lecture 4**.
- › If our current atomic science is on the right track, the following is true: *gold is the element with atomic number 79*.
- › Elbourne observes two difficulties with the idea that this is a definition:
 1. It would entail that 'most competent English speakers do not know the meaning of the word *gold*' (Elbourne 2011: 9).
 2. It would entail that we could not find out that gold didn't after all have atomic number 79; and hence that our current atomic theory is true – as a matter of **meaning**, not empirical discovery!

Analytic Truth and Understanding

Definitions and Analytic Truth

- › This last example illustrates a subtle issue about definitions.
- › We've distinguished intension from extension. But suppose it's true, as the evidence suggests, that **gold is the element with atomic number 79**.
- › Kripke argues that, given this assumption, it is **necessary** (true in every possible situation) that gold has atomic number 79 (1980: 123–25).
 - › We've discovered that anything which is gold, has atomic number 79; and anything, in any possible situation, which has that atomic number, will therefore also be gold.
- › So this condition is necessary and sufficient. But it doesn't seem to be a meaning.
- › A suggestion: it is not a meaning because, though *gold is the element with atomic number 79* is necessary, that isn't something everyone who understands *gold* has to accept.
 - › Since people understood *gold* (or maybe *aurum*) long before modern atomic physics.
- › One proposal: an assignment of meaning should give necessary and sufficient conditions **and** be **analytic**.
 - › An analytic truth is true just **in virtue of** the meaning of the words involved (Russell 2007). For example: *bachelors are unmarried*, or *cats are animals*.

Analytic Truths as Word Meanings

- › So we have reached a refined proposal:

Refined Definition The meaning of a word is a definition – some necessary and sufficient conditions such that each sentence stating that the conditions apply to the word is analytic.

- › Suppose our proposed definition of *bachelor* is *unmarried man*; the principle says that these must be necessary and sufficient, and moreover *bachelors are unmarried* and *bachelors are men* must be analytic.
 - » In passing, not a good definition: the pope is an unmarried man, but not a bachelor – his oath of celibacy seems to rule him ineligible. But let's not pause.

The Epistemology of Analyticity

- › The problem with *gold has atomic number 79* was that not every competent user of *gold* knew or knows it. That would be a meaning that people who understand the word didn't know, and that wouldn't fit our requirement Meaning-Competence, that knowledge of meaning explains linguistic competence.
- › Analytic truths seem well-suited to avoid this problem, because
 - analytic ... truths are epistemologically unproblematic ... whatever cognitive work is necessary for understanding them is somehow already sufficient for knowing them to be true. (Williamson 2006: 2)
- › This feature that makes analytic truths apt to give meanings also helps us identify analytic truths: for if a competent speaker **dissents** from a claim *C*, it cannot be analytic. That speaker knows the meaning without believing *C*, let alone knowing it. So *C* cannot be part of a definition for any of its constituent terms. Thus:
 - UKI Necessarily, whoever understands the sentence *Cats are animals* recognizes it as true. (Williamson 2006: 3)

There are no analytic truths (with this role)

- › Williamson (2006), pp. 9–10 and others argue, however, that there are no truths of the form of (UK1), and hence that **there simply are no analytic truths**, if that means truths which all competent speakers judge to be true.

Z uses the expression *cat* in the same way as everyone else, only making the same mistakes you do (e.g., in poor light). His use is impeccable, and he surely understands *cat* by any reasonable standards. Yet Z has a persistent delusion: he thinks cats are robot spies from Mars. He thinks there are cats, but that they not animals, and never have been. But Z never talks about it (the cats might overhear!). So even though he understands *cats are animals*, he rejects it, yet his rejection makes no difference to his competence with the expression.

- › I say: Dr Z understands the expression *cat*, as evident in his competent use, but disagrees with us about what cats are like. So UK1 is false.

Words and Meanings

Upshot of these arguments

- › The lesson of all this I take to be the following:
 - ›› If word meanings are definitions, they need to give necessary and sufficient conditions that are analytically true of the defined word.
 - ›› Dictionary ‘definitions’ don’t give necessary and sufficient conditions.
 - ›› For many proposed necessary and sufficient condition, we can apparently envisage a competent speaker who denies it, showing that condition not analytic.
 - ›› So definitions are at best rare – perhaps are found only in **stipulations** like that governing the introduction of *prime*.
- › Elbourne concludes that
 - giving definitions of words is a task of mind-boggling complexity; by reporting on the state of the art in fields such as epistemology and metallurgy, I have been trying to suggest ... that no-one has ever given an adequate definition of a word, as far as we know, with the possible exception of mathematical terms. (Elbourne 2011: 11-12)
- › If this is right, semantics **cannot** be about giving definitions or analyses or necessary and sufficient conditions – that is not a viable project.

Meanings can't just be words

- › In fact reflection suggests it should never have been our aim in the first place!

A definition is just a string of words. It is unsatisfying, therefore, to say that the meaning of a word is a definition, because that would be to say that the meaning of a word is just more words. It would appear that we were not progressing to any explanatorily deeper level. (Elbourne 2011: 13)

- › Basically: we use words to **talk about non-linguistic reality**.
- › Our sentences somehow get to be about the non-linguistic world. Everyone agrees that 'the meanings of words are what enable them to hook up with the world' (Elbourne 2011: 14). So we need a theory of meaning explaining this **word-world connection**.
- › The idea that meanings **are** definitions just gives us a word-word connection; not the right sort of thing at all.

The Argument from Synonymy

- (7) A good definition D is **synonymous** with the defined term τ .
 - » E.g., *unmarried man otherwise eligible to be married* is synonymous with *bachelor*, the term it defines.
- (8) Two expressions are synonymous iff they have the same meaning.
- (9) D and τ have the same meaning. (From 7, 8)
- (10) A definition is not its own meaning: the meaning of D is not D .
- (11) So the meaning of τ isn't D . (From 9, 10)
 - › In this light, the best candidate for a meaning is some **third thing which is non-linguistic**.
 - › But what? Something in the external world? Something in our minds?

An Alternative Theory of Understanding

- › But if we give up on this idea that meanings are linguistic entities like definitions, what is it for someone to know the meaning of – to **understand** – a word?
- › Williamson argues: ‘understanding a word is a matter of participation in a [communal] linguistic practice’ (2006: 1):
 - Use To understand a word just is to **use** it in conformity with the use of a community of other speakers. (recall Wittgenstein 1967: ¶43)
- › This principle separates understanding a word from knowing its meaning, or knowing a definition or string of words that represents its meaning.
 - › We can understand an expression without having any access to some privileged way of describing its intension, which is what a definition boils down to.
 - › Incidentally this explains how dictionary ‘definitions’, which aim to help us conform with others in our usage, can give understanding of an expression without capturing its intension.
- › But the question remains: what **are** the meanings of words? To that we turn **next time**.

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