

Mind, Matter, and Language

Lecture 8: More on Russell on Descriptions

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Review

- Russell had a problem with “denoting phrases” like ‘somebody’, ‘nothing’, ‘a man’, or ‘the author of Waverley’.
- According to Russell, the meaning of these expressions cannot be specified by saying what they refer to. (They do not refer to anything.)
- We can explain what “denoting phrases” mean by specifying the meaning of any sentence in which they occur.

Russell's theory of descriptions

'The F is G ' means that there is an F that is G and there is no other F .

Russell's theory suggests a response to many arguments against the referential approach to semantics.

Russell's theory at work

The identity problem: Replacing co-referring expressions can turn uninformative statements into informative statements.

- (1) Scott is Scott.
- (2) Scott is the author of Waverley.

Russell's response: 'the author of Waverley' is not a referring expression.

The logical form of (2) is $\exists x(Ax \wedge \forall y(Ay \rightarrow y=x) \wedge x=s)$.

The attitude problem: In attitude reports, replacing co-referring expressions can affect the truth-value of a sentence.

- (1) George IV wished to know whether Scott is Scott.
- (2) George IV wished to know whether Scott is the author of Waverley.

Russell's response: 'the author of Waverley' is not a referring expression.

(2) says that George IV wished to know whether one and only one man wrote Waverley and Scott was that man.

The problem of empty names descriptions: What about non-referring descriptions like 'the present king of France'?

- (1) The present king of France is bald.
(??, Being-Bald)

Russell's response: 'The present king of France' is not a referring expression.

(1) means

- $\exists x(Kx \wedge \forall y(Ky \rightarrow y = x) \wedge Bx)$.
- There is a king of France who is bald, and there is no other king of France.

Russell mentions some other arguments in favour of his theory.

By the law of excluded middle, either "A is B" or "A is not B" must be true. Hence either "the present King of France is bald" or "the present King of France is not bald" must be true. Yet if we enumerated the things that are bald, and then the things that are not bald, we should not find the present King of France in either list. Hegelians, who love a synthesis, will probably conclude that he wears a wig.

Russell, "On Denoting" (1905)



Russell's theory at work

Russell mentions some other arguments in favour of his theory.

Puzzle: How come 'the F is G ' and 'the F is not G ' are both false if there is no F ?

Russell's answer:

- 'The F is G ' says that there is exactly one F , which is G .
- 'The F is not G ' says that there is exactly one F , which is not G .

So understood, 'the F is not G ' is **not the negation** of 'the F is G '.

- $\exists x(Kx \wedge \forall y(Ky \rightarrow y=x) \wedge Bx)$
- $\exists x(Kx \wedge \forall y(Ky \rightarrow y=x) \wedge \neg Bx)$
- $\neg \exists x(Kx \wedge \forall y(Ky \rightarrow y=x) \wedge Bx)$

Russell's theory at work

Arguably, we **can** understand 'the king of France is not bald' as the negation of 'the king of France is bald'.

- "The king of France is not bald: there is no king of France!"

'The king of France is not bald' is ambiguous.

- The following is not the case: The king of France is bald.
 $\neg \exists x(Kx \wedge \forall y(Ky \rightarrow y=x) \wedge Bx)$
- The king of France has the following property: he is not bald.
 $\exists x(Kx \wedge \forall y(Ky \rightarrow y=x) \wedge \neg Bx)$

The same kind of ambiguity arises for attitude reports.

(1) Fred believes that the CEO of Amazon is richer than Bill Gates.

Suppose Fred has read that Jeff Bezos is the richest man in the world, but doesn't know that Bezos is CEO of Amazon.

Is (1) true?

On one reading yes, on another no.

The same kind of ambiguity arises for attitude reports.

(1) Fred believes that the CEO of Amazon is richer than Bill Gates.

Reading 1: Fred believes that whoever is CEO of Amazon is richer than Bill Gates.

$BEL(\exists x(Cx \wedge \forall y(Cy \rightarrow y=x) \wedge Rx))$

Reading 2: The CEO of Amazon is someone whom Fred believes to be richer than Bill Gates.

$\exists x(Cx \wedge \forall y(Cy \rightarrow y=x) \wedge BEL(Rx))$

Russell can explain the ambiguity.

Philosophy jargon:

(1) Fred believes that the CEO of Amazon is richer than Bill Gates.

Two readings:

(1a) Fred believes that whoever is CEO of Amazon is richer than Bill Gates.

(1b) The CEO of Amazon is someone whom Fred believes to be richer than Bill Gates.

(1a) is the **de dicto** reading of (1), (1b) is the **de re** reading of (1).

'de dicto' = 'of the saying'

'de re' = 'of the thing'

We've seen that Russell can defuse some problems for referential semantics.

He can explain

- why non-referring expressions like 'the present king of France' are not meaningless;
- why replacing 'Scott' by 'the author of Waverley' can turn uninformative statements into informative statements;
- why replacing 'Scott' by 'the author of Waverley' can change the truth-value of an attitude report.

But: The same problems seem to arise with simple names!

- What is the meaning of 'Vulcan' or 'Santa Claus'?
- Replacing 'Hesperus' by 'Phosphorus' can turn uninformative statements into informative statements.
- Replacing 'Hesperus' by 'Phosphorus' can change the truth-value of a belief report.

Russell's response: These names aren't logically proper names. They must be analysed as descriptions.

Common words, even proper names, are usually really descriptions. That is to say, the thought in the mind of a person using a proper name correctly can only be expressed explicitly if we replace the proper name by a description.

Russell, "Knowledge by Acquaintance..." (1910)



Knowledge by description

Knowledge by description

Lisa believes (de dicto) that the CEO of Amazon is rich. She has no idea who the CEO of Amazon might be.

What is the content of Lisa's belief? What does she think the world is like?

- (A) Jeff Bezos is CEO of Amazon and rich.
- (B) There's a (unique) person who is CEO of Amazon and rich.

Arguably, (B) is the more accurate representation.

Lisa knows the CEO of Amazon only **by description**.

Knowledge by description

Lisa now learns that the CEO of Amazon owns the *Washington Post*.

Which of these more accurately represents her beliefs?

(A) Jeff Bezos is CEO of Amazon, rich, and owns the *Washington Post*

(B) There's a (unique) person who is CEO of Amazon, rich, and owns the *Washington Post*.

Arguably, (B) is still the more accurate representation.

Lisa still knows Bezos only by description.

Knowledge by description

Lisa now learns that the CEO of Amazon is called 'Jeff'

Which of these more accurately represents her beliefs?

- (A) Jeff Bezos is CEO of Amazon, rich, owns the *Washington Post*, and is called 'Jeff'.
- (B) There's a (unique) person who is CEO of Amazon, rich, owns the *Washington Post*, and is called 'Jeff'.

Arguably, (B) is still the more accurate representation.

Lisa still knows Bezos only by description.

Knowledge by description

Lisa now learns that the CEO of Amazon is called 'Jeff Bezos'

Which of these more accurately represents her beliefs?

- (A) Jeff Bezos is CEO of Amazon, rich, owns the *Washington Post*, and is called 'Jeff Bezos'.
- (B) There's a (unique) person who is CEO of Amazon, rich, owns the *Washington Post*, and is called 'Jeff Bezos'.

Arguably, (B) is still the more accurate representation.

Lisa still knows Bezos only by description.

Knowledge by description

I have a few beliefs about Julius Caesar. What is the content of these beliefs?

- (A) Julius Caesar was a Roman general who won battles in what is now France and Britain, later declared himself emperor and ruled over Rome until he was stabbed by Brutus.
- (B) There's a (unique) person who was a Roman general, was called 'Julius Caesar', won battles in what is now France and Britain, later declared himself emperor and ruled over Rome until he was stabbed by a man called 'Brutus'.

Arguably, (B) is the more accurate representation.

I know Caesar only **by description**, as the man with such-and-such properties.

Knowledge by description

If we make a judgment about (say) Julius Caesar, it is plain that the actual person who was Julius Caesar is not a constituent of the judgement.

Russell, "Knowledge by Acquaintance..." (1910)



Knowledge by description

Lisa has heard of the ancient epic poem *Odyssey* that is attributed to Homer.

Which of these more accurately represents her beliefs?

- (A) Homer was a poet in ancient Greece who was called 'Homer' and wrote the *Odyssey*.
- (B) There was a (unique) poet in ancient Greece who was called 'Homer' and wrote the *Odyssey*.

If (A) is correct, Homer must have been a real person!

But we don't know if Homer existed. Do we not know what Lisa believes?

Knowledge by description

*Common words, even proper names, are usually really descriptions. That is to say, **the thought in the mind of a person using a proper name correctly can only be expressed explicitly if we replace the proper name by a description.***

Russell, "Knowledge by Acquaintance..." (1910)



Knowledge by description

- Lisa: 'Jeff Bezos is rich'.
- Expressed thought: The (unique) person who is CEO of Amazon, owner of the *Washington Post*, and called 'Jeff Bezos', is rich.

Why is 'Hesperus = Phosphorus' informative?

Answer: Because the thought we associate with that sentence is not

(A) Hesperus = Phosphorus, but

(B) The brightest body in the evening sky = the brightest body in the morning sky.

We know Russell's explanation for why (B) is informative.

How can there be meaningful names like 'Vulcan' that don't refer?

Answer: When we use such names in a sentence, the thoughts associated with these sentences have descriptive content.

(A) Vulcan is smaller than Mercury.

(B) The planet between Mercury and the Sun whose mass explains the shift in Mercury's orbit is smaller than Mercury.

Knowledge by acquaintance

Knowledge by acquaintance

According to Russell, an accurate representation of our beliefs/knowledge/wishes etc. should not contain expressions that refer to things we only know by description.

Anything we know only by description must be analysed away.

What remains, apart from logical expressions, are names and predicates for things we know **by acquaintance**.

Knowledge by acquaintance

The fundamental epistemological principle in the analysis of propositions [...] is this: Every proposition which we can understand must be composed wholly of constituents with which we are acquainted.

Russell, "Knowledge by Acquaintance..." (1910)



Knowledge by acquaintance

What do we know by acquaintance?

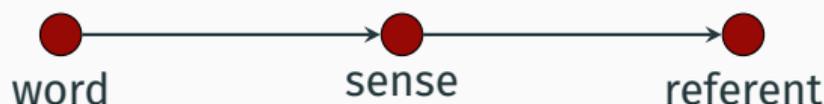
- our present sense data: the colours, sounds, etc. we currently experience
- ourselves?

Frege and Russell

Frege and Russell

The picture at which Russell arrives is not all that different from Frege's.

Frege held that reference to things in the external world is always mediated by a “mode of presentation”.



Russell holds that reference to things in the external world is always mediated by a description.

On both accounts, the belief I express by ‘Jeff Bezos is rich’ is a descriptive belief: *the so-and-so is rich*.

In other respects, Frege and Russell have very different views about language.

- Frege postulates two levels of meaning, sense and reference. Russell only has reference.
- Frege has a non-trivial compositional semantics for both sense and reference. Russell does not.
- Russell postulates a syntactic level of “logical form” that is radically different from surface form. Frege does not.
- Frege is interested in objective, shared meaning. Russell is more interested in subjective attitudes expressed by an utterance.