INTRODUCTION: THREE DEBATES

1. Russell vs. Strawson on referring

The present king of France is bald or the present king of France is not bald. If the present king of France is bald, the present king of France exists. If the present king of France is not bald, the present king of France exists. ¹Therefore, the present king of France exists.

The Law of Excluded Middle ($\vdash \phi \lor \neg \phi$) appears to be violated.

Russell: the argument equivocates. Definite descriptions are quantifier phrases, and as such, they give rise to scope ambiguity with respect to negation:

Three cats are not on the table. They are on the floor. Three cats are not on the table because it is too small for that. \textcircled{B}^2 They are on the floor.

When negation takes wide scope, the first premise is true but the third is false. When negation takes narrow scope, the third premise is true but the first is false.

Strawson: the Law of Excluded Middle applies to statements, not sentences. None of the premises makes a statement.

I stopped beating my father last week. I did not stop beating my father last week.

(The example is from Menedemus, reported by Diogenes Laertius.) Definite descriptions are presupposition triggers; using them the speaker presupposes that they are uniquely satisfied. When they are, definite descriptions are used to refer to their unique satisfiers. When they are not, in uttering them no statement is made.

Comparison: Russell abandons naïve grammar, categorizing definite descriptions as quantifier phrases. (Some occurrences of definite descriptions designate but they relate to their designata differently – they denote, rather than refer.) Strawson abandons naïve semantics, maintaining that sentences can never have truth-values. He says that "ordinary language has no exact logic."

Afterlife: Russell's grammatical revisionism was later deemed inessential – his followers kept his truth-conditions but gave a unified semantics for all noun phrases. Strawson was sometimes taken to be a logical revisionist (advocating a third truth-value).

¹ I use hand gestures for logical evaluation; ? means "does not follow."

 $^{^2}$ I use facial expressions for semantical evaluation; \otimes means "is not interpretable."

2. Quine vs. Carnap on intensionality

Jane is shorter than the tallest person in the room Molly is the tallest person in the room ³Therefore, Jane is shorter than Molly

Jane might be shorter than the tallest person in the room Jane (in fact) is the tallest person in the room Therefore, Jane might be shorter than Jane

Fred suspects that Jane is the tallest person in the room Molly is the tallest person in the room Therefore, Fred suspects that Jane is Molly

Leibniz's Law $(a = b, \phi(a) \vdash \phi(b))$ appears to be violated.

Quine: Leibniz's Law fails in the context of quotation.

'2 + 2 = 4' is a truth of arithmetic 2 is Jane's favorite prime $^{\odot}$ ⁴Therefore, 'Jane's favorite prime + 2 = 4' is a truth of arithmetic

Expressions in quoted contexts designate themselves and their constituents do not designate anything. (That is why you cannot quantify into quotation.) Quine thinks intensional contexts are relevantly similar to quotation contexts.

Carnap: Leibniz's Law does not fail; designation shifts.

The temperature is 19° The temperature is rising Therefore, 19° is rising

In the context of 'rising', 'temperature' comes to designate a function from spatio-temporal locations to the temperature at that location. (The example is actually Montague's.) Carnap thinks intensional contexts work similarly: occurrences of expressions come to designate a function from possible worlds to their ordinary designata.

Comparison: Carnap's proposal can explain that substitution of necessary equivalents within modal sentence is valid; Quine's cannot. On the other hand, Carnap's proposal incorrectly entails that substitution of necessary equivalents within attitude reports is also valid; Quine's proposal fares better here. Carnap's proposal yields a systematic semantics and Quine's does not.

Afterlife: Carnap seems to have won this one, although the semantics of attitude ascriptions remains wide open.

³ & means "follows."

⁴ ⁽²⁾ means " is probably uninterpretable."

3. Ayer vs. Geach on emotivism

Ayer: ethical, aesthetic, and religious terms fail to contribute anything to the content of sentences in which they occur. Their function is to express the emotions of the speaker without stating that the speaker has those emotions. If so, 'right' and 'wrong' works somewhat like 'true' does according to Frege – predicating it of a proposition gives the same proposition back.

- (T) 'It is true that σ ' expresses the same proposition as σ
- (W) 'It is wrong that σ ' expresses the same proposition as σ
- (R) 'It is right that σ ' expresses the same proposition as σ

Ayer says that uttering 'Stealing is wrong' carries no factual meaning – it is "as if I had written 'Stealing money!!' – where the shape and thickness of the exclamation marks show, by a suitable convention, that a special sort of moral disapproval is the feeling which is being expressed." (Frege would also have to say something fancy about 'The Pythagorean theorem is true.')

Geach: the view cannot account for the inferential behavior of these terms.

Stealing is wrong If stealing is wrong then so is robbery &Robbery is wrong

The natural thing to say is that Modus Ponens $(\phi, \phi \rightarrow \psi \vdash \psi)$ is valid, even if it contains sentences that are neither true nor false. But then the emotivist must eschew an account of validity in terms of truth-preservation.

Comparison: Ayer's view is similar to Strawson's: he too insists that logic deals with statements alone. It is also like Quine's in effectively banning quantification into the offending context. (T) implies that 'It is not the case that it is true that σ ' and 'It is true that it is not the case that σ ' express the same proposition – the proposition that it is not the case that σ . In general, (T) guarantees that 'it is true that' should be interchangeable *salva veritate* with scope-bearing expressions. Let's call this property of 'it is true that' *scope-neutrality*. According to emotivism, ethical terms are all scope-neutral; Quine thinks the same about modals. The scope-neutrality of modals and evaluatives conflict robust intuitions:

Something necessarily exists.	(Something is such that it is necessary that it exists.)
Necessarily, something exists.	(It is necessary that something exists.)
Something rightfully exists.	(Something is such that it is right that it exists.)
Rightfully, something exists.	(It is right that something exists.)

Afterlife: Ayer's view was replaced by more sophisticated versions of expressivism. Proponents seek to meet Geach's challenge by developing a semantics that is not truth-centered and a notion of validity distinct from truth-preservation.