Unity in the Variety of Quotation

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Abstract This chapter argues that while quotation marks are polysemous, the thread that runs through all uses of quotation marks that involve reference to expressions is pure quotation, in which an expression formed by enclosing another expression in quotation marks refers to that enclosed expression. We defend a version of the so-called disquotational theory of pure quotation and show how this device is used in direct discourse and attitude attributions, in exposition in scholarly contexts, and in so-called mixed quotation in indirect discourse and attitude attributions. We argue that uses of quotation marks that extend beyond pure quotation have two features in common. First, the expressions appearing in quotation marks are intended to be understood, and that they are intended to be understood is essential to the function that such quotations play in communication, though this does not always involve the expressions contributing their extensional properties to fixing truth conditions for the sentences in which they appear. Second, they appeal to a relation to the expression appearing in quotation marks that plays a role in determining the truth conditions of the sentences in which they appear.

In quotation not only does language turn on itself, but it does so word by word and expression by expression, and this reflexive twist is inseparable from the convenience and universal applicability of the device.

–Donald Davidson

1 Introduction

Quotation is easy to understand but hard to explain. In this paper, we offer a semantics for the varieties of quotation listed in (1)-(5).

(1) “Boston” contains six letters.
(2) “psychology” literally means “the study of the soul.”
(3)  (a) He said, “Get serious, boy.”
(b) She said, “*Gorse* is common in Scotland”; she did not say, “Furze is common in Scotland.”
(c) Caesar literally said, “Veni, Vidi, Vici,” not “I came, I saw, I conquered.”
(d) He said, ‘All mimsy were the borogoves,” but didn’t have anything in mind by it.
(e) Then Jesus said to them, “Render to Caesar the things that are Caesar’s, and to God the things that are God’s.”
(f) “Good morning! it was kind of you to push the chair up that hill ... I hope it wasn’t heavy for you,” said Connie, looking back at the keeper outside the door.
(g) Davidson said, “Quotation is a device used to refer to typographical … shapes by exhibiting samples.”
(h) “And what is the use of a book,” thought Alice, “without pictures or conversation?”
(i) “If I had a child!” she thought to herself; “if I had him inside me as a child!”

(4)  (a) In this chapter, Mill attempts to delineate when the authority of society can rightly limit individuality and the “sovereignty of the individual over himself.”
(b) Berkeley’s objective in the *New Theory of Vision* was “to shew the manner wherein we perceive by sight the distance, magnitude, and situation of objects. Also to consider the difference there is betwixt the ideas of sight and touch, and whether there be any idea common to both senses” (NTV §1).
(c) They substituted, as Kant has pointed out, “a physiology of the human understanding” for the Critical investigation of the claims of reason, and anthropology for ethics.

(5)  (a) Macomber said that he “bolted like a rabbit.”
(b) Alice said that she had “heard nonsense” compared with which that would be “as sensible as a dictionary.”
(c) She said that it had been many years since “such trifles had broke across the web of [her] solitude.”
(d) La Rochefoucauld said that jealousy “ends as soon as we pass from suspicion to certainty.”
(e) Professor Elugardo said that William James said that religious leaders are “creatures of exalted emotional sensibility.”

(f) She thought that it was curious that that “thin, proud man” should have had “that little, sharp woman for a mother!”

(1) is an instance of pure quotation. (2) involves pure quotation in its first appearance and arguably a dual use-mention (to be explained below) in its second appearance. Examples in (3a-g) illustrate direct discourse. (3a) is an instance of the use of quotation in dialogue in which understanding the quoted material is essential to its linguistic function (as is made clear by the fact that in translation dialogue inside quotation marks is translated as well). However, (3b) illustrates a strict use of direct discourse that requires the use of the words used by the subject. (3c-d) illustrate a strict use in which the

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1 The term ‘pure quotation’ was introduced into the contemporary semantics literature on quotation by Cappelen and Lepore (1997), who contrast it with direct (3a-g) and indirect speech, and mixed cases of direct and indirect speech (5a-e). They are picking up on a distinction drawn in (Davidson 1979), where Davidson contrasts the idea of quotation used to mention an expression that is not itself used with what he calls mixed cases of use and mention. It is the first half of this contrast that Cappelen and Lepore have in mind, namely, the use of quotation marks around an expression to form an expression that refers to the enclosed expression, which is not at the same time used, and which functions “like a single word” (Davidson 1979, p. 3). More precisely, what we have in mind is given by (Q) below. This is the predominant use of the term ‘pure quotation’ in the literature on quotation. For a different suggestion about what contrast should be drawn with ‘pure quotation’ see (Saka 2013)—though contrast (Maier 2014) writing for the same journal a year later. Saka claims it is “an analytic truth that all quotations that are not mixed must be pure” and so includes direct speech under ‘pure quotation’. But it should be noted that Cappelen and Lepore introduce the term stipulatively, so what counts as an analytic truth with regard to the usage they introduce depends on what meaning they give it. Our view about the relations between these various uses of quotation marks will emerge in the following.
function of the report does not require its speaker to understand the words attributed to its subject, or, in the case of (3d), that it have any meaning at all. (To avoid confusion in discussion of direct and indirect discourse, we will use ‘speaker’ for the utterer of a sentence of direct or indirect discourse and ‘subject’ for the person that sentence of direct or indirect discourse is about, that is, the person the sentence reports as speaking). In contrast, (3e) is an instance of direct speech in which the quoted words are a translation from the Greek of the Gospel of Mark, which in turn translate the Aramaic of Jesus, and understanding them is essential to its function. (3f-g) exhibit the use of ellipsis (in different ways in each) and exclamation marks in reported speech (in (3f)), and highlight the need to make sense of punctuation marks inside quotation marks in an account of the function of quotation in dialogue and direct speech. (3h-i) are examples of the use of quotation in the analog of direct speech for the attribution of thought. (4a-b) exhibit uses of quotation in scholarly exposition in which there is a dual use-mention. (4c) shows a use in which the quoted material is a translation of the original German. (5a-c) are examples of “mixed quotation” in which quotation marks are used in the complement clauses of indirect discourse. (5b) raises the problem of how to handle multiple instances. (5c) raises the question of how to handle interpolations—authorial brackets—that adjust context sensitive terms to the speaker’s context. (5d) shows an example in which the quoted material is a translation of the original. (5e) raises the problem of iterated mixed quotation. (5f) shows these issues extend to attitude attributions.

We argue that pure quotation is what unifies all of these uses of quotation in the sense that an account of the semantic function of quotation in each of these examples involves an instance of the device characteristic of pure quotation. We follow John Wallace (1970, 135-136) in holding that the semantic rule for pure quotation is given by the reference clause (Q), where ‘ϕ’ takes on expressions as values, and we use square brackets as Quinean corner quotes.²

² An expression consisting of square brackets (treated as corner quotes) around an expression containing a metalinguistic variable abbreviates a description of an expression as the concatenation of the contained expressions and value of the variable, in the order in which they appear inside the brackets. Thus, [‘ϕ’] = the expression consisting of ‘‘
(Q) For any $\phi$, ['$\phi$'] refers to $\phi$.\footnote{We suppress explicit relativization of semantic predicates to a language except where it is needed.}

This is a precise expression of Tarski’s informal account of the function of quotation marks.\footnote{Tarski writes, “We denote by this term ['quotation-mark names’] every name of a sentence (or of any other, even meaningless, expression) which consists of quotation marks, left- and right-hand, and the expression which lies between them, and which (expression) is the object denoted by the name in question” (1983, p. 156). The rule is expressed here. He later writes, “Quotation-marks names may be treated like single words of a language, and thus like syntactically simple expressions” (p. 159). It is this last remark in particular that has led to the ascription of the proper name theory of quotation to Tarski, though it is noteworthy that he says that they “may be treated” that way, not that they are syntactically simple. The important point for his purposes is that quotation terms function like names in the language in the sense of not having semantic compositional structure. See Gomez-Torrente (2001).} Anyone who understands this rule understands all there is to know about the use of quotation marks in pure quotation. In the following, we sketch an account of the semantic roles of the varieties of quotation in (2)-(5), which shows that the device involved in pure quotation plays a central role in each. This will not quite be to say that quotation marks mean the same thing in each of these uses, but rather that, as we will suggest, quotation marks are polysemous, and the thread that runs through the various uses of quotation marks is captured in a generalization of (Q) we introduce below.

The plan of the paper is as follows. Section 2 takes up pure quotation. We review desiderata on an adequate account, and five proposals that have been made about...
how to understand pure quotation. We argue for the disquotational theory, as it has come to be called, which invokes a simple rule like that expressed in (Q). We head off some misunderstandings, respond to some objections, and draw out some consequences. Section 3 takes up the use of quotation marks in direct discourse. In section 3.1, we first identify a number of contexts in which expressions are referred to but are also intended to be understood, where being understood is essential for sentences in which they are contained to fulfill their function in communication, though their extensional properties do not contribute to fixing the truth conditions of the sentences in which they are contained. We call this a quasi-use-mention. We argue that it extends to the use of quotation marks following ‘means’ in (2), and then, in section 3.2, to certain uses of quotation marks with direct discourse as well, though this is not a feature that is represented in a compositional account of the truth conditions of the sentences. We distinguish between strict and non-strict forms of direct discourse, the former of which requires mentioning the specific words used by the person to whom the discourse is attributed (the subject) and the latter of which allows the use of expressions that translate the words the subject used. We provide truth conditions for both strict and non-strict direct discourse. Non-strict direct discourse also involves quasi-use-mention though this is not represented in the truth conditions. In section 3.3, the account is extended to direct attitude attributions as illustrated by (3h-i). Section 4 takes up quotation in exposition as illustrated in (4a-c) where what is said is said by the speaker or writer, though some of the words, in quotation marks, are to be attributed to another. Section 5 takes up mixed indirect discourse in section 5.1 and mixed attitude attribution in section 5.2. A general account is provided for any number of distinct uses of quotation marks in complements of indirect discourse or attitude attributions. Here too we distinguish between a strict and a non-strict reading. Section 6 takes up the question how to accommodate mixed indirect discourse in which expressions in quotation marks appear to be intended to be evaluated in a context other than that of the speaker. This would make ‘x said that’ what Kaplan called a ‘monstrous operator’, one that operates on character rather than content, for it would shift the context of evaluation of context sensitive expressions from the speaker’s context to another context. Without trying to settle whether the examples that motivate this are well formed, we show that there is nothing problematic about giving truth
conditions for them. A language could make provision for this. Section 7 takes up a prima facie objection to the account that rests on the fact that when we translate, e.g., dialogue in a novel, we do not preserve reference to the expressions in the original language. The answer is that ordinary translation preserves function over reference when there is a conflict. Section 8 is a brief summary and conclusion.

2 Pure Quotation

By pure quotation we have in mind a device in written language for referring to expressions.\(^5\) Expressions are strings or configurations of symbols, including the limiting

\(^5\) There is nothing that prevents a similar device from being used in spoken or signed language, or any other medium of communication. For example, the device in the artificial language Lojban (see below) makes provision for spoken quotation, and in spoken languages, people will, transferring the device designed for writing to speech, say “quote”, utter some word or phrase, and then “unquote,” or use so-called finger quotes. But the device is especially well suited to the written word and it is with the written word that it originated. Marks for indicating text trace their lineage back to the second century B.C. in the diple, an arrow-like mark ‘>‘, used as a proofreading device at the Library of Alexandria by the editor and librarian Aristarchus. But quotation marks in the form widely used today attained their modern form and function only in the last half of the 18th century, driven by experimentation with methods for setting off dialogue in novels (Houston 2013, pp. 187-210; Johnson this volume). There are other uses (or abuses) of quotation marks, such as scare (or shudder) quotes to indicate that the word in quotation marks is being used in a non-standard sense or in a sense that the writer herself would not use the word or words to express (e.g., the Onion headline ‘Jacques Derrida “dies”’), and quotation marks used to identify a word being defined in a contextual definition, a purpose for which italics are also used (e.g., ‘A boondoggle!“boondoggle” is a braided cord worn by Boy Scouts as a neckerchief slide, hatband, or ornament’). Another use is the so-called emphatic use of quotation marks for emphasis in ads and signs in the way that italics often are, as in, for example: “‘Fresh” Seafood’, and ‘Lane may be “slippery” due to oiling’. In these uses, while the quotation marks are used to draw attention to a
case of one. We use ‘expression’ and ‘symbol’ in the sense in which they are used in logic.\(^6\) We can speak of complex symbols, so ‘symbol’ and ‘expression’ can be used interchangeably, but we will often use ‘symbol’ when we focus on a smallest unit in a symbol system. Expressions are types, and they are realized in tokens, typically spoken, signed, or written. Expressions are not intrinsically meaningful, and need not appear in any actual language. For example, ‘f&r©n#th§’ is an expression but does not have a meaning or appear in any natural language. As we are interested in quotation in written language, we focus on written expressions, that is, inscription types and their tokens. Inscription types are determinants of expression types. The letters, words, phrases, and sentences in this paper (tokens of which you are reading) are examples.

A characteristic feature of quotation, as we are interested in it, is that it involves the construction of a term for an expression by incorporating the expression itself. A standard form for quotation involves flanking an expression with other expressions, which we call *quotation marks*. Using ‘…’ as a placeholder for an expression, examples are:

<table>
<thead>
<tr>
<th>‘…’ or “…”</th>
<th>English</th>
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</table>

\(^6\) While it is an interesting question what the analysis of the concept of a symbol or expression is in the sense in which it is used in logic, this is not a task we take up on in this paper, any more than we take up the analysis of the concept of a language, or a word, or a sentence. Our focus is on devices for referring to expressions, not the analysis of what they refer to.
We will call expressions of these forms quotations or quotation terms. We will use single and double quotation marks for illustration. When we intend pure quotation henceforth we will use single quotation marks. We will use double quotation marks for other forms of quotation. The treatment extends straightforwardly to other styles of quotation marks, like those listed, as well as to using a special font, for example, italics, or underlining/overlining.

In the following, we will use ‘QUOT(ϕ)’ to mean the result of performing an appropriate syntactic operation on ϕ so as to yield a quotation term incorporating ϕ (where as above ‘ϕ’ is a metalinguistic variable that takes expressions as values). In pure quotation, quotation marks flank an expression, and the quotation term so formed refers to the expression enclosed in quotation marks. Call the position of ϕ in an expression QUOT(ϕ) a quotation context. Thus, we say an expression occurs in a quotation context iff it occupies the position of ϕ in an expression of the form QUOT(ϕ). For the purposes of this section, let this be understood as a pure quotation context.

There are a number of observations that theories of pure quotation should accommodate:

| “…”       | Dutch, Romanian, Polish |
| “…” or „…” | Lithuanian, Macedonian, Icelandic |
| «…» or ⟨…⟩ | French, German, Russian |
| ›…‹ or »…« | Hungarian, Polish, Danish |
| ❦...❦ or 「…」 | Chinese, Japanese, Korean |
| lu … li’u  | Lojban (an artificial language)\(^7\) |

\(^7\) Lojban is an artificial language based on formal logic. Its typographical quotation marks are by design pronounceable, and intended to be used in speech in a way analogous to how they are used in a written text. In distinction from natural languages, grammatical instances are restricted to containing expressions in a recursively specified syntax for Lojban.
1. Quotation contexts are opaque, that is, (a) you cannot in general intersubstitute coreferring or coextensive terms in quotation contexts *salva veritate*, (b) you cannot existentially generalize, and (c) you cannot bind argument positions in \( \phi \) when it appears in a quotation context from outside that context.

2. Quotation can be used to introduce new symbols or expressions and to refer to expressions that are not in the language one is using, without introducing those expressions independently of the quotation term.

3. In pure quotation, \( \text{QUOT}(\phi) \) refers (non-accidentally) to the expression in its quotation context.

4. In understanding quotation devices, e.g., quotation marks, (a) one understands how to generate and understand a potential infinity of new expressions, and (b) one has the capacity to understand novel quotation terms, in the sense of being able to determine what they refer to, on the basis of recognition of the quotation term itself.\(^8\)

Another condition sometimes placed on a theory of quotation is that it make sense of the possibility that words can be used and mentioned simultaneously. This is not, however, a feature of pure quotation. We return to the case of dual use and mention in quotation below.

According to a standard taxonomy, the five main theories of pure quotation are the name theory, the description theory, the demonstrative theory, the identity (or use) theory, and the disquotational theory.\(^9\) We endorse what has been called the

\(^8\)This is related to Quine’s remark that “a quotation is not a description but a hieroglyph; it designates its object not by describing it in terms of other objects, but by picturing it” (Quine 1940, p. 26). While we aim to capture what seems right about this thought, that a quotation term *contains* the type to which it refers, we do not treat quotation as literally *picturing* what it designates. The device is actually simpler than that suggests.

\(^9\)A useful overview of the literature can be found in (Saka 2013). We don’t intend to review every theory in the following. A reader for Springer noted pointedly that we do not discuss the pictorial or iconic theory of pure quotation. ‘Pictorial theory of quotation’
does not, we think, express a well defined category. The idea originates in the remark of Quine’s quoted in note 8, though what Quine says hardly constitutes a theory. Harth (2011, p. 198) argues persuasively that the central idea is not picturing so much as it is exemplification. Many accounts treat it as a condition of adequacy that they explain why the appearance of an instance of what is referred to in quotation marks is central to how quotation works. Demonstrative theories (Davidson 1979), identity/use theories (Harth 2011), and disquotation theories all seek to explain why the appearance of a token of the type referred to in utterances of quotations is central to how the device works, though in different ways. In this sense, one might say that they are all picture theories. But they are very different from one another. One might give more weight to the idea that the expression in the quotation context (or a token of it in an inscription) pictures what is being referred to by requiring that the mechanism of reference make some appeal to a resemblance relation between that expression, or a token inscription of it, and what it refers to. Perhaps the disquotation theory fares less well on this score, while the identity theory, since identity is a paradigm of exact resemblance, does better, as does the demonstrative theory, though in truth neither the identity theory (which invokes the idea of self-reference) nor the demonstrative theory (which invokes the type-token relation) make much of the idea of resemblance per se. In any case, we reject the idea that invoking resemblance in the explanation of how quotation refers is needed. Another sort of theory that arguably gives a more central role to the iconic character of quotation is the demonstration theory (as opposed to a demonstrative theory). On the demonstration theory, one thinks of the quoted material as being demonstrated in the way in which one might demonstrate an Australian accent (Clark and Gerrig 1990; Recanati 2000, 2001; De Brabanter 2002). These theories focus on the production of an instance of what is to be referred to. However, it is still the case that something, at least a token in use, has to refer, when the quotation occupies a noun phrase position in a sentence with truth conditions. So the question is just what the rule of reference is which competent speakers learn that enables them to figure out what a (pure) quotation refers to; and we will argue that while a token of the type referred to is indeed displayed, and in some sense demonstrated (in the sense of the demonstration theory), the rule of reference is given in
disquotation theory, if not everything that has been said about it. The disquotation theory is easy to state. It asserts that we grasp everything that we need to know about how pure quotation devices function in grasping the following rule (GQ) (generalizing (Q)):

\[(GQ) \quad \text{For any expression } \phi, \text{ QUOT}(\phi) \text{ refers to } \phi.\]

This handles all of the desiderata above. (GQ) obviously explains why QUOT(\phi) refers non-accidentally to the expression in the quotation context, #3. The fact that intersubstituting in quotation contexts leads to a change of reference explains why one can’t intersubstitute co-referring terms *salva veritate*, #1a. The fact that the contained expression is not functioning semantically explains why you can’t existentially generalize or bind argument places, #1b-c.\(^{10}\) The fact that the rule quantifies over all expressions explains why it can be used to introduce new expressions and refer to expressions in other languages (#2). It clearly explains how grasp of the rule is sufficient to generate and understand a potential infinity of new expressions and to determine their referents on the basis of recognition of the quotation term itself, #4.

Before we explain this further and consider objections, we briefly review the alternatives.

The proper name theory, which has been attributed to Quine (1940, p. 26) and Tarski (1983, p. 159; though see note 4 above), is nowadays largely rejected, but it is instructive, and helps bring out what is distinctive about quotation. It holds that quotations are like ordinary proper names, such as ‘Julius Caesar’ or ‘Mohandas Gandhi’. The proper name theory explains desideratum #1 because the contained term is treated as

\(^{(GQ)}\) below, knowledge of which suffices to grasp everything one needs to know about how pure quotation works.

\(^{10}\) In connection with this, it is worth noting that, contra Saka (2013, p. 941), our view is not that quotation marks represent a function that takes an argument and yields a value. As just noted, the position inside quotation marks is not an argument position. It does not take referring terms. It cannot be bound. And the rule (GQ) does not so represent it.
part of a name’s spelling, like ‘bill’ in ‘billabong’. However, it fails to accommodate desiderata #2-#4: it does not explain why QUOT(ϕ) refers to ϕ except as an accident of spelling, #3. For this reason, it cannot explain its function in introducing new expressions (#2), since to figure out that the name refers to a new expression it must be introduced independently. And for the same reason it cannot explain how understanding quotation puts one in a position to understand new quotation terms without having their referents introduced independently, #4.

The description theory (Geach 1957, p. 82; Quine 1960, p. 143, p. 212) retains an element of the proper name theory, holding that there are primitive quotation names of either words or letters and that strings of words or letters in quotation marks are descriptions of their concatenation in the order in which they appear. For example, ‘Caesar crossed the Rubicon’ is interpreted either as the concatenation of ‘Caesar’ with ‘crossed’ … or the concatenation of ‘C’ with ‘a’ with ‘e’ …. But since this retains the proper name theory at its core, it inherits its defects.

Davidson’s paratactic or demonstrative theory of quotation (Davidson 1979) treats quotation marks semantically as a description containing a demonstrative. Thus the quotation marks in a quotation are taken to be semantically equivalent to a description, ‘The expression of which this is a token’. This handles desiderata #1 (since the expression is a sample to be demonstrated and not syntactically a part of the sentence) and #2 (since anything can be the referent of a demonstrative) but not #3 or #4b, since nothing constrains the referent to be the contained expression. Another difficulty is that it is hard to see how to extend this to using italics or underlining for the same purpose, since there is nothing separate from the token expression itself to serve as the sample to be demonstrated (Reimer 1996, p. 135).

A feature that makes for trouble on this account is the use of the freewheeling demonstrative ‘this’, and some difficulties could be removed by constraining it to refer to the expression token in the quotation marks. But how do we do this? Do we say: the expression type of which a token is contained within these tokens of quotation marks? But now we have a demonstrative reference to token quotations marks and similar difficulties can arise. What is wanted is a rule that uses a description to determine a referent as in (DQ) (demonstrative quotation rule).
(DQ) For any expression $\phi$, for any utterance act $u$, if $u$ is an utterance of ['$\phi$'], $u$ refers to the expression type of which the use of $\phi$ in $u$ is a token.

(Recall we are using ‘[’ and ‘]’ as the left and right Quinean corner quotes—see note 2.) Once we have got it in this form, however, it seems clear that the same effect is achieved with a simplification, since by inspection the expression type of which the use of $\phi$ is a token is just $\phi$:

(Q) For any expression $\phi$, ['$\phi$'] refers to $\phi$.

This just is the disquotational theory, however, applied to single quotation marks. From this perspective, the mistake Davidson made was to treat a rule for determining a referent of an expression as if it gave the meaning of the expression. This is a mistake equivalent to taking ‘I’ to mean ‘the speaker who is now using “I”’. This is clearly a mistake since the proposition expressed by ‘I am sitting’ does not entail that there are any speakers, since it can be true in a possible world in which I am sitting but neither I nor anyone else is a speaker.

The identity or use theory of quotation (Johnson 2011; Recanati 2000, 2001; Reimer 1996; Saka 1998; Washington 1992) takes quotation marks (or other similar devices) to have a function similar to punctuation (see also Johnson this volume). On this view, their purpose is to indicate that the expression in the quotation context (or its token in a token quotation) is being used to refer to itself (or the (or a) type of which it is an instance).11 Thus, it is not the quotation term itself, but the contained expression that

11 A reader for Springer objected that Recanati is not a use theorist because he denies that either the quotation, or the quotation marks, or the expression between them, refers. It is true that Recanati (2001) does not take open quotation, quotation not embedded in a sentence in a NP position, to involve linguistic reference but only depiction. However, he takes closed quotation, in which the quotation appears in an NP position in a sentence, which is what is under discussion here, to involve not only depiction, but also linguistic
refers (or a token of it), and the function of the quotation marks is, as it were, to disambiguate the use of the expression. The quotation marks do not themselves refer, describe, or demonstrate, and neither does the quotation term. One motivation for the identity or use theory, as opposed to the disquotational theory, is that it treats the use of quotation marks as continuous with verbal reference to expressions made by using them as in (6),

reference (2001, sec. 2) and he does refer to quotation marks as a form of punctuation which indicate something about how the enclosed expression is to be understood when it is written between them. There are some subtleties in his position. He thinks of quotation (in an actual inscription) as involving a demonstration, not in the sense of reference, but in the sense of a display of a token of an expression type, in something like the way one might demonstrate how to throw a knuckle ball by doing it. (Though for an inscription, presumably it is not the writing it out that is the demonstration but the thing written out.) It is the demonstration that refers in closed quotation, but not constitutively, since demonstration in the relevant sense is present in open quotation as well, and there is no linguistic reference in that case (on Recanati’s view). What is the relation of the demonstration to the displayed token? Recanati could be clearer on this. At one point (2001, pp. 650-651) he distinguishes the displayed token from the demonstration, and the demonstration, in closed quotation, from the demonstration-qua-syntactically-recruited (whatever that is). But he says both the displayed token and the demonstration-qua-syntactically-recruited have linguistic meaning, presumably a referent (and the same referent, it seems). But later (2001, p. 655) he says that it is only the demonstration (presumably qua-syntactically-recruited) that refers and the quoted material is not part of the sentence (but here it is not clear whether he means type or token). In any case, the demonstration in closed quotation is supposed to be a singular term and an iconic symbol, and so to resemble what it refers to. So we can confidently say that on Recanati’s view there is a token of some type produced when writing a closed quotation that has its referent that type of which it is token, which is also the type which appears in quotation marks in the quotation. This seems to us to qualify it as an instance of the use theory as discussed here.
where the speaker is understood to be referring to the name ‘Ishmael’ rather than (merely) using it. The identity or use theory treats the speaker as using ‘Ishmael’ (or its token) to refer to itself (or the type of which it is a token). Another motivation is that it allows quotation to be used to refer to tokens as well as types, and types of various sorts, depending on the speaker’s intentions. As we will note, the disquotational view can accommodate this.

The disquotational and identity/use theories are quite similar. There is a sense in which the disquotational theory might be said to treat quotation marks as punctuation—they are not given semantic significance independently of use around an expression. The difference lies in what the rule for quotation marks treats as the referring term. For the identity/use theory the rule goes as in (QI) (quotation rule for the identity theory):

\[
\text{(QI) For any expression } \phi, \text{ when } \phi \text{ appears in an expression of the form } ['\phi'] \text{, } \phi \text{ refers to } \phi. \quad \quad 12, 13
\]

\[\]

12 The use theory also seems to give the wrong result for certain sentences. For example, if the use theory is correct, we cannot truly say in English that ‘nurphalisturbia’ is not a word that has a use in English, because that would ipso facto illustrate a use of the word in English. Yet, it seems we can say that truly. The disquotational theory avoids this result. It is also, perhaps, slightly odd to think that every expression (of Chinese, or Russian, or Arabic, or yet unimagined languages) is a name of itself in English, which is a consequence of the theory.

13 For the version that would treat the token or its demonstration (see note 11) as the referring term: For any expression \( \phi \), for any speaker \( u \), and any time \( t \), for any token (or demonstration/presentation of) \( \phi^* \) of \( \phi \) such that \( \phi^* \) appears in (or occurs in the production of) a token of ['\( \phi^* \)'] produced by \( u \) (in a noun phrase position in a sentence) at \( t \), \( \phi^* \) refers to \( \phi \). We will not treat this separately because it will be obvious from what is said about (QI) how to extend it to this.
This is, on the face of it, a less straightforward way to understand the rule for quotation, and seems gratuitous from the standpoint of semantics, since there is no need to treat a substring of the string the rule applies to as the genuine referring term. Moreover, this is clearly not something that is transparent to users of quotation terms, and it is difficult to see what about our use of quotation terms would motivate taking only the contained string to be the referring term. The motivation to preserve continuity with examples like ‘Call me Ishmael’ (even granting in this sentence ‘Ishmael’ is used to refer to itself rather than being the deferred ostension of a tacit demonstrative) is not adequate. First, historically, quotation marks are a device that arose specifically in the context of written language (see note 5). There is no reason to take it to be a device continuous with or derivative from any device in spoken language. Second, in the development of written languages, from the design standpoint it makes sense to introduce a syntactic device that functions as characterized by (GQ). In contrast, from the design standpoint, (QI) seems gratuitous and unmotivated ¹⁴ Moreover, we will argue that (GQ) proves to be particularly fruitful in understanding how quotational devices extend beyond pure quotation.

In sum, grasp of the rule (GQ)

(GQ) For any expression \( \phi \), QUOT(\( \phi \)) refers to \( \phi \).

...suffices for anyone who understands it to understand any sentence in which a quotation name appears (used for pure quotation). Nothing more needs to be added. But if you do not understand this much, you do not understand quotation. This suffices to explain the

¹⁴ The point of this is not to say that natural languages were designed or that the person who introduces an innovation gets to stipulate its future use once taken up, but that there is, ceteris paribus, no reason to take the device to be more complicated than what is required for it to perform its function, and thus the burden of proof lies with someone who suggests a semantics that involves more complications that are needed to accommodate the function of a device in the language.
connection between the contained expression and the term’s referent. It explains how we get from recognition of the term itself to its referent. It explains how quotation generates an infinite number of expressions and puts one in a position to understand them (when they are presented—see below). It explains how it can be used to introduce new symbols and refer to expressions in other languages. Importantly, it captures the sense in which quotation is, in Quine’s terms, like a hieroglyph, but without the need to treat it as literally picturing itself.

What about the case of using italics (or underlining/overlining) to indicate that one is referring to the italicized (or underlined/overlined) word? (GQ) applies to this as well. Underlining and overlining are devices like quotation marks in the sense that they involve a symbol external to the expression being referred to. But in the case of italicizing a word, the italicized word is a determinant of the type that the italicized expression refers to. In this case, the word, though italicized, is used to refer to a type of which it is a token, though not to the more determinate type the italicized word represents.

Sometimes the disquotational theory is said to treat quotation marks as a functor that takes an expression as an argument and returns the expression as a value. This is a mistake. The rule (GQ) tells you what the quotation term refers to on the basis of how it is constructed. It carries no more commitments than that. To treat it as assigning a function to quotation marks is to assimilate it to expressions that have a different semantic role. The position of ‘ϕ’ in ‘[ϕ]’ is not an argument position at all because it does not treat the expression that appears there as a referring term. (GQ) gives a minimalist but sufficient account of the function of pure quotation. No assimilation to other devices is needed: it is what it is and not another thing. Most of the mistakes in the theory of quotation derive from trying to understand quotation in terms of other devices of reference.

A straightforward and interesting consequence of (GQ) is that a language that contains a quotation device that obeys (GQ) does not have a recursively definable syntax because it contains a nondenumerably infinite number of semantically primitive
expressions. Call the basic vocabulary of a language minus quotation terms (if any) its basic lexicon. The basic lexicon of any natural language is finite. Each item in the basic lexicon must be learned independently of the others. The rest of the language, excluding again quotation names, can be understood on the basis of understanding the basic lexicon and rules for their combination. (GQ) introduces an additional class of expressions that refer to expressions. It does not generate them from the basic lexicon together with a set of rules for combining expressions. Instead, it quantifies over all expressions, including expressions that are not in the language, to produce expressions in the language that are about those expressions. (This is another way to see why quotation cannot be assimilated to functional expressions, which can take as argument terms only terms that refer in the language.) Since the class of expressions is not recursively enumerable, the class of quotation names is not recursively enumerable either.

In addition, nothing one grasps in grasping the basic lexicon and the rule for quotation puts one in a position to understand every expression in the language, specifically the class of quotation names. It might be thought that this runs afoul of Davidson’s learnability argument, the upshot of which was supposed to be that grasp of a finite vocabulary of primitive items had to suffice for understanding any potential

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15 It is also said to be a counterexample to compositionality because while putting quotation marks around an expression to form a term referring to it is a syntactic rule, its “semantic value” isn’t composed from the semantic values of its constituents. Some take this to be a reason to reject the disquotational account, but since it is perfectly intelligible it is rather this particular form of compositionality, or its application to quotation, that should be rejected. See Pagin and Westerstahl (2010) for discussion.

16 What about numerals? Aren’t there an infinite number of them — even non-denumerably many, since there is no reason in principle not to allow full decimal representations of real numbers? But the basic numerals are ‘0’ through ‘9’, and the referents of complex numerals and decimal expressions are given in relation to the primitive numerals.

17 As remarked in note 7, the artificial language Lojban is an exception, for it restricts quotation to expressions otherwise in the language.
utterance in a natural language on pain of making it unlearnable for finite beings like us (Davidson 2001, pp. 8-9). Quotation names turn out to show a limitation in the argument. For, although we are not in advance in a position to understand every expression in the language, specifically all of the quotation terms, given the way quotation works, as soon as we are presented with a quotation term, we can use the rule to determine what it refers to, for in recognizing the quotation term itself, we are in a position then to see what it refers to.

It has been objected that because the disquotational theory quantifies over expressions, it may undergenerate quotation terms (Lepore 1999). The thought is that any symbol can appear in quotation marks, whether or not this symbol is an expression in any actual spoken language, or even in any possible language. As noted above, however, we do not distinguish between symbols and expressions. In addition, any symbol can be used in some language, even if it is not used in any actual language. Apart from this, the objection is self-defeating because in offering it the objector must use a term to capture the class of things that he thinks the quotation device can be applied to which is larger than the class of expressions. This supplies the proponent of the disquotational theory with a term to use in place of ‘expression’ that will capture the right category of items (supposing the objector is correct).

Finally, one of the themes of the identity/use theory of quotation is that quotation terms can be used to refer to different sorts of things, not just expression types. If we think about how the identity/use theorist has to characterize his own rule to accommodate this, however, we can see that whatever he can say can be adopted by the disquotational theory. There are two basic ways to do it. First, one can argue that quotation marks are ambiguous, and the different uses signal different sorts of things as the referents. Disambiguating would amount to supplying for each different use a different target. For example, we might introduce a use of quotation marks to refer to tokens of types that appear in the quotation marks. Suppose that we use asterisks as quotation marks that are used to refer to the token of the expression that appears between them. We can give the following clause:
(Q\*) For any expression $\phi$, for any speaker $u$, time $t$, $[\phi^*]$ as used by $u$ at $t$ refers to the token of $\phi$ produced by $u$ at $t$ in producing a token of $[\phi^*]$. 

For expression types individuated according to different standards, we can replace the restriction on $\phi$ in the first quantifier with a term that expresses the appropriate notion. Second, one could treat quotation marks as context sensitive, with the kind of thing referred to being determined relative to the speaker’s intention. We still need to have in mind a class of items over which we can quantify and in relation to which we can locate other types. So we still need to use ‘expression’ in some suitable sense in the restriction on our quantifier. But this is fine as long as whatever else the speaker has in mind can be located in relation to it. So, for example, we can give the rule (QCS) (quotation as context sensitive):

(QCS) For any expression $\phi$, for any speaker $u$, time $t$, QUOT($\phi$) as used by $u$ at $t$ refers to the type or token that bears the relation intended by $u$ at $t$ to the token of $\phi$ produced by $u$ at $t$.

Having said this, we add that we think pure quotation is conventionally used to refer to expression types, and we assume this in the following:\footnote{One might object that we can write on the blackboard: ‘This’ is written in chalk. Well, we get the idea, of course, but it helps that ‘this’ is the word written! Consider: ‘Boston’ is written in chalk. Puzzling! We feel like saying: sometimes yes, sometimes no. But then this is about the word being written in chalk (a chalk token produced) on this or that occasion.}

It is sometime said that the disquotational theory, while suitable for pure quotation, can’t be the correct theory of quotation because it cannot handle cases beyond (1) and possibly simple cases of direct quotation as in (2a). In our view, this desideratum is confused. Quotation, as we said in the introduction, is polysemous. It has a variety of related uses. The conceptual core of quotation, however, is captured in the disquotation rule, (GQ), for pure quotation. To try to give one rule for all the forms of quotation, as
opposed to explaining them in relation to the core use, would be like trying to give a single definition for ‘walk’ that accommodated all the following uses: ‘I went for a walk’, ‘I walked the dog’, ‘We’ll have to walk the wardrobe to the bedroom rather than carry it’, ‘She walks the ramparts’, ‘The workers threatened to walk’. Only confusion can result. In the following, we explain the uses found in (2)-(4) as exploiting the device of pure quotation for further purposes.

3 Quotation in which Contained Expressions Are Intended to Be Understood

In this section we discuss the varieties of quotation found in examples (2)-(3). We begin with the idea that in using a quotation term, it can be crucial to its function that it contains a meaningful expression that is both understood and understood to be referred to, though the meanings of the quoted expressions do not contribute to fixing the truth conditions of the sentence containing the quotation term.

3.1 Quasi-use-mention

We begin with (2), repeated here,

(2) “psychology” literally means “the study of the soul.”

It will be useful in considering the function of quotation in (2) to first consider the use of the following sentences:

(7) ‘Schnee ist Weiss’ in German means that snow is white
(8) ‘Schnee’ in German means the same as ‘neige’ in French.
(9) ‘Schnee’ in German means snow
(10) ‘Schnee’ in German means snow

19 American printers’ conventions place commas and periods that are part of the containing sentence inside quotation marks rather than outside. We ignore this in the accounts we develop. A simple syntactic rewrite of the sentences yields the form that serves as input to the rules given in the following.
In (7) the subject term is simply used to refer to a German sentence, and it is not presupposed that we know its meaning because the point of (7) is to explain it. But how does (7) do this? The traditional answer is that the complement, ‘that snow is white’, refers to the proposition that the German sentence expresses, and by grasping that proposition and associating it with the German sentence, we come to know what it means. However, how do we grasp the proposition? Merely referring to the proposition isn’t sufficient, for if we had named the proposition that snow is white ‘Betty’ and substituted that for the complement, when we told someone what ‘Schnee ist Weiss’ meant, she would be none the wiser. A Fregean might say that there is a mode of presentation attached to ‘that snow is white’ that suffices for one to grasp what it refers to, but this is mysterious—what mode of presentation ipso facto suffices for entertaining its object if it is a proposition? And how would this explain the importance of the appearance of the sentence itself in the complement rather than a name?

There is a simpler answer to the question how (7) informs us of what ‘Schnee ist Weiss’ means in German, namely, that (i) it is a condition on the truth of (7) that the sentence in the complement translate ‘Schnee ist Weiss’ and (ii) we understand that sentence. Once we see this, we can also see that what the complement refers to, if anything, is irrelevant to the work that the sentence does for us. It might as well be the sentence itself rather than a proposition, for all the use that the proposition is to us (Ludwig 2014). So here we have a device for conveying the meaning of a sentence that involves using a sentence in our language, where it is crucial for the work that is to be done that our interlocutor understand the sentence, even though the extensional properties of the sentence do not contribute in any way to determining the truth conditions of the containing sentence.

Now consider in contrast (8), where we take the quotation terms to be pure quotation. In this case, it is clear that one could understand the sentence without understanding either of the quoted expressions and so remain in the dark about the meaning of either term. This stands in contrast to (9) and (10) which we use to explain what a term in German means to someone who speaks English. The difference is simply that we presuppose that our audience understands the complement expressions (and so
assume that the audience doesn’t fully understand the sentence without doing so) and that the sentences are true only if the term appearing to the right of the verb means the same as the term mentioned on the left. In (8) we relativize the meaning relation to both German and French. In (9) and (10) we relativize only the term mentioned on the left because in using the terms on the right in English we fix their interpretations. In (9) we use italics to indicate that the expression to the right of ‘means’ is being used to give the meaning of the expression on the left, that is, that it is both to be understood and to be understood as the same in meaning as the expression on the left. In (10) the same information is carried simply by context.

With this in mind, when we consider (2), we can see that while pure quotation is being used on the left, the expression quoted on the right is intended to be understood, for this is a sentence we use to convey the meaning of one expression by using another. This use of quotation involves reference to the contained expression, and that reference is secured by (GQ), but there is another dimension to the use which, like the function of the complement in (7), does not come out in thinking about the contribution of the expression to the truth conditions of the sentence. We call this a quasi-use of the expression, by which we mean that it is essential to its function in the context that it be understood as used by the speaker (this, e.g., secures disambiguation and fixes the contributions to meaning by context sensitive terms), but the extensional properties of the expression contained do not contribute to fixing the truth conditions of the sentence. We will call quotation of the sort illustrated on the right side of ‘means’ in (2) quasi-use quotation.

### 3.2 Direct Discourse

With this in hand we turn to the use of quotation with direct discourse. A common view about direct discourse is that the function of a sentence such as (3a)

(3) (a) He said, “Get serious, boy.”

is to give a literal rendering of the words spoken by someone on a particular occasion. However, the practice is more complicated than this. In particular, we will distinguish between strict and non-strict direct discourse. In strict direct discourse, the sentence of
direct discourse is true iff its subject bears the relation expressed by the verb to the sentence in quotation marks (excluding punctuation introduced solely as a result of printers’ conventions).

The strict use is illustrated in (3b-d).

(3)  
(b) She said, “*Gorse* is common in Scotland”; she did not say, “*Furze* is common in Scotland.”
(c) Caesar literally said, “*Veni, Vidi, Vici,*” not “I came, I saw, I conquered.”
(d) He said, ‘All mimsy were the borogoves,” but didn’t have anything in mind by it.

Here what is important are the words themselves rather than any translation of them. ‘*Gorse*’ and ‘*Furze*’ mean the same, but switching ‘*Gorse*’ and ‘*Furze*’ in (3b) may change a truth into a falsehood. Similarly, in (3c), ‘I came, I saw, I conquered’ is a translation of ‘*Veni, Vidi, Vici*’, but a contrast is being drawn. In (3d) clearly the meaning of the words can’t be at issue because it is a nonsense sentence. For strict direct discourse, we can give the truth conditions as in (DQS) (direct quotation strict), where ‘ref(α, u, t)’ expresses a reference function from a name, speaker and time to a referent of the name as used by the speaker at that time, that is,

$$\text{For any } x, u, t, \text{ref}(α, u, t) = x \text{ iff } α \text{ as used by } u \text{ at } t \text{ refers to } x,$$

and we relativize the truth predicate to the speaker and time as well.

(DQS) For any speaker u, time t, expression φ, name α, [α said, “φ”] is true(α, u, t) iff there is a time t’ < t such that ref(α, u, t) says φ at t’.

But not all uses are strict. First, very often understanding the expression quoted is essential to the function of the sentence, as in dialogue in a novel. This is the case for (3a). Thus, it must be construed as involving a quasi-use of the contained expressions. This does not show up in the specification of the truth conditions, but is an aspect of the
conventions associated with the use of direct discourse in certain uses. Ideally these
would be marked with a special sort of quotation mark, but in practice context
disambiguates.

Second, in direct discourse we also often use words in our language to report what
someone said in another language as in (3e).

(3) (e) Then Jesus said to them, “Render to Caesar the things that are Caesar’s, and to
God the things that are God’s.”

In this case, we use a translation of the words of Jesus (as reported in Mark) into our
language, but they are not the words that Jesus used. And despite the contrast with (3c)
above, there is nothing problematic about this use. Thus, in the non-strict use of direct
quotation, we intend a quasi-use, and that the subject have uttered the sentence referred to
or a sentence that translates it. The first of these requirements, as mentioned, does not
show up in the truth conditions. The second is accommodated in (DQNS) (direct
quotation non-strict), in which we introduce the standard event analysis of action
sentences, which treats the action verb as introducing an existential event quantifier
(Ludwig 2010). For this purpose, we use the following abbreviation (where ‘σ’ is a
variable whose values are sentences):

\[
says(e, ref(\alpha, u, t), t', \sigma) = \ref(\alpha, u, t) \text{ is an agent of } e \text{ at } t' \text{ and } e \text{ is an utterance and } e \text{ is an instance of } \sigma.
\]

We also make explicit relativization of the semantic predicates to languages. We
introduce this additional complexity because we need to relativize the translation of φ to
the language the subject used in his utterance of σ, and there may be no unique language
he speaks in which σ is a sentence. The truth conditions are then given in (DQNS).

(DQNS) For any speaker u, time t, expression φ, name α, [α said, “φ”] is true(u, t,
English) iff there is an event e, a time t’ < t, and a sentence σ, such that

\[
(i) \quad says(e, ref(\alpha, u, t), t', \sigma) \text{ and }
\]
(ii) $\phi$ in English translates $\sigma$ in the language of $\text{ref}(\alpha, u, t)$ at $t'$ in $e$.\(^{20}\)

(DQNS) accommodates the case in which the subject uses the same sentence as the speaker, since every sentence is a translation of itself.

There is a further complication presented by the practice of using punctuation and ellipses in direct quotation (of oral speech) as in (3f).

(3) (f) “Good morning! it was kind of you to push the chair up that hill ... I hope it wasn’t heavy for you,” said Connie, looking back at the keeper outside the door.

The exclamation mark indicates something about the mode of delivery. While in pure quotation ['$\phi$!'] refers to an expression that has an exclamation mark at the end, in direct quotation, reporting oral speech, the exclamation mark indicates a non-symbolic feature of the utterance act type. But this does not need special treatment because the type picked out by ['$\phi$!'] has one realization in written language and another in spoken language. The same extends to question marks, italics, boldface, caps, and other devices such as repeating a letter to indicate dragging out a syllable, as in, ‘That was soooo boring’. These indicate aspects of the utterance type that extend beyond what words were used to include how they were used.

Ellipsis comes in two varieties.\(^{21}\)

(1) It can be used to indicate that words in the original are omitted. This is illustrated in (3g).

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\(^{20}\) It might be objected that ‘x said …’ doesn’t contain a reference to English in its analysis. Then replace ‘English’ with ‘the language of $u$ at $t$ in uttering [$\alpha$ said, “$\phi$”]’.

\(^{21}\) Of course, an ellipsis mark may be a part of an expression referred to in quotation marks. One can say, for example: when he wrote, “Well … I wouldn’t go so far as to say it is entirely worthless!”, he used the ellipsis ‘…’ to convey a hesitation of his thought in writing what he did.
(g) Davidson said, “Quotation is a device used to refer to typographical … shapes by exhibiting samples.”

We call this *omission ellipsis*. Omission ellipsis can be accommodated by conditionalizing on whether or not this sort of ellipsis occurs in a quotation in direct discourse and requiring that the subject (Davidson in the case of (1g)) have uttered a sentence or a translation of a sentence obtained from the sentence with the ellipsis by inclusion of some additional material in the position of the ellipsis. We will not write out the clauses.

(II) But in (3f) that is not the function of the ellipsis. The ellipsis indicates neither that something is omitted nor that the subject uttered or wrote anything that corresponds to the ellipsis ‘…’, but just that there was a temporal gap (a hesitation) between utterance corresponding to the material before the ellipsis in the quotation and the material after it, though it is intended as a single speech act.

For the case of ellipsis of the sort illustrated in (3f), one might initially think that we could treat

\[ x \text{ said "---- \ldots ----"} \]

as roughly equivalent to

\[ x \text{ said "----" followed by a pause and then "----"} \]

This could be incorporated straightforwardly into a truth conditional account. But an ellipsis can occur anywhere, including multiple times in a single sentence such as: He said, “I think … you really don’t want to … tease the sasquatch.” To report this as his saying “I think” followed by a pause, then “you really don’t want to” followed by a pause, then “tease the sasquatch,” is compatible with his not having said, “I think you really don’t want to tease the sasquatch.” It is more straightforward to treat ellipsis in this use—like an exclamation mark, or italics, or a question mark—as indicating something about the utterance type beyond what words in what order are included in it,
namely, that it includes somewhat greater than usual temporal gaps between portions of what is uttered.

Importantly, for all these ways of indicating something about the utterance type, we have to take *translation*, as it figures in (DQNS), to require *preservation of devices indicating something about the type of utterance beyond its content*.

Dialogue in fiction or in reports where the context determines who is speaking (typically called free direct speech) we treat as translatable into (that is, shorthand for) direct discourse.

**3.3 Direct Attitude Attributions**

A striking use of quotation is in direct attributions of thought. These may also include ellipses and punctuation like exclamation marks and question marks inside quotation marks. In these cases, we treat the sentences as if they expressed a thought someone is having or had or will have. We will treat the sentences understood relative to the thinker and time of thought as expressing the contents of occurrent thoughts of the thinker (the subject of the sentence). As in (3h), the sentence that is used to capture the content of a thought may be split between two quotations. First we join the quotations into one, as in (3h.i).

(3h) (i) Alice thought, “And what is the use of a book without pictures or conversation?”

This can be thought of as a purely syntactic operation performed before interpretation.22 Then we give the truth conditions for ‘α thought, “φ”’ in (DQT) (direct quotation thought).

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22 A reader for Springer suggested that (3h) and (3hi) are not equivalent on the grounds that in (3h) ‘Alice thought’ is syntactically parenthetical and that the verb ‘thought’ therefore cannot take the quotation as its object. As evidence, the reader suggested that it is odd to say in response to (3h) *That’s not true!* but it is not odd to say it in response to (3hi). It seems to us to be an odd thing to say in response to either in
(DQT) For any speaker $u$, time $t$, expression $\phi$, [$a$ thought, “$\phi$”] is true($u$, $t$) iff there is a time $t' < t$, and a state $s$, such that

(i) $\text{thinks}(s, \text{ref}(a), t')$ and

(ii) $\equiv(s, \phi, \text{ref}(a), t')$

The variable ‘$s$’ takes states as values. The relational predicate ‘$\equiv(s, \phi, x, t)$’ expresses a sameness-of-content relation between $\phi$ (in English) interpreted relative to $x$ at $t$ (that is, with $x$ and $t$ as values for the contextual parameters), on the one hand, and $x$’s thought $s$, on the other. We wish this to be interpreted broadly so that it subsumes both sameness of propositional content where appropriate but also inner exclamations, thanks, pauses, and so on, since we wish to accommodate examples such as (11) and (12).

(11) “Thank goodness!” he thought to himself.
(12) “Well done,” he thought as he smiled.

ordinary conversational contexts, as opposed to saying ‘That’s not what she thought’, but the oddness seems to come from its being unclear whether the response is focused on the sentence mentioned rather than the sentence it is embedded in, which is not a problem with ‘That’s not what she thought’. Vary the example, though. Consider [*].

[*] “Insanity is doing the same thing over and over again,” Einstein said, “and expecting different results.”

There is nothing odd about responding to this by saying, “That’s not correct. Whil it is a common misattribution, Einstein never said that.” In any case, there are other tests for whether a shifted clause like this takes scope over the sentence. It is perfectly acceptable to report what someone said in uttering [*] by saying: He said that Einstein said, “Insanity is doing the same thing over and over again and expecting different results.” This would be false, however, if the sentence were not in the scope of ‘Einstein said’. The same thing goes for (3h) and (11) and (12).
In this connection, the use of the exclamation point can be taken to reflect an aspect of the state associated with what we might call the reception of its content—it marks the thought as emphatic, as we might put it. A question mark indicates that the psychological mode is “interrogative”—that is, “Which one is it?” he thought’ means the same as “‘Which one is it?’ he wondered’. An ellipsis indicates a pause (or hesitation) in a thought. One way of thinking about it is to think of the relation introduced as aiming to capture something about the way that the thinker him- or herself would express the thought at the time in her language—that if she verbally expressed the thought at the time of thinking it, in a play-by-play report, as it were, what she said could be reported in direct discourse using the sentence used to characterize it. This would mean that such attributions would be limited to linguistic beings, but on reflection this seems plausible, because it is quite difficult to make sense of attributing a thought to a nonlinguistic animal using (3h) or (11) or (12), except under the pretense that it speaks a language or thinks in a language.

An alternative would be to think of these attributions as requiring that the subject (thinker) explicitly be thinking in words, in the way that we sometimes have a particular sentence in mind or a particular sentence occurs to us which we do not utter (‘What a nincompoop!’). However, since we may also want to attribute something like (12) to someone without supposing that he has in mind, in this way, the words for expressing the thought, but merely that if he did express it, using those words to report what he said would be apt, this cannot cover all cases. But there may be a use that aims precisely to get at having a particular “thought sentence” in mind. To capture this, we can substitute for ‘thinks’ a relation that expresses being in a state of verbally thinking a thought at a time, and change the equivalence relation to require the state to be not just like in content but to be like in respect of involving a thought sentence that is the same as (on the strict reading) or a translation of (on the non-strict reading) the sentence in quotation marks.

One difference between direct discourse and direct attribution of thoughts is worth drawing attention to. In direct discourse, we relate a sentence $\phi$ used by the person uttering it to a sentence $\sigma$ uttered by its subject, requiring that the one be the same as or a translation of the other, where this just requires a translation manual, not that the
sentences be interpreted relative to context (they may contain nonsense terms even). In
direct thought attributions we interpret the complement sentence relative to the thinker
and time of the thought because we are interested in sameness of propositional content
between a sentence and a state. This ensures that indexical elements like the ‘I’, in the
complement of (3i), and demonstratives and tense are correctly interpreted for the
purpose of conveying the content and mode of the thought.

(3) (i) “If I had a child!” she thought to herself; “if I had him inside me as a child!”

This can be extended to inner dialogues in fiction and reporting where the context
determines who the thinker is (that is, free direct thought attributions) by treating them as
translatable into (shorthand for) direct attributions.

4 Quotation in Exposition
The examples in (4) involve exposition in which an author is expressing something in his
own voice, but in part using the words of another, as in (4a-b), or a translation of the
words of another, as in (4c).

(4) (a) In this chapter, Mill attempts to delineate when the authority of society can
rightly limit individuality and the “sovereignty of the individual over himself.”
(b) Berkeley’s objective in the New Theory of Vision was “to shew the manner
wherein we perceive by sight the distance, magnitude, and situation of objects.
Also to consider the difference there is betwixt the ideas of sight and touch, and
whether there be any idea common to both senses” (NTV §1).
(c) They substituted, as Kant has pointed out, “a physiology of the human
understanding” for the Critical investigation of the claims of reason, and
anthropology for ethics.23

23 We do not assimilate this to indirect discourse. The parenthetical ‘as Kant pointed out’
is a comment on what the writer is saying, which is given by the sentence sans phrase and
quotation marks.
We wish first to say that the speaker (of any of (4a-c)) asserts what is expressed by the sentence stripped of a first layer of quotation marks. Then we wish to say that the words in quotation marks in the sentence, or a translation of them, were used by another, whom we will call ‘the subject’, as indicated in the sentence, or by a citation, or the context. We will not require that the subject have uttered a sentence that expresses the same thing as what the speaker utters, however. For one may say, in one’s own voice, e.g.,

I reject, in distinction from Kant, the mere “empirical reality of time” and accept its “absolute and transcendental reality.”

In addition, one may use words or phrases in a single sentence drawn from different sentences and even different texts. We will call this variety of quotation ‘scholarly quotation’ and the quotation marks in this use ‘scholar quotes’.

A question arises about whether we should put into the truth conditions of sentences like (4a-c) the implication that the subject (of the clause) used the words in quotation marks, or treat it as a conventional implicature, the truth conditions being given by the sentence stripped of one layer of quotation marks. In the latter case, it is a requirement for felicitous utterance, but not for truth, that the subject mentioned used those words or a translation of them. We will just represent truth conditions for sentences containing scholarly quotation as in (SQ), putting the implication into the truth conditions. The alternative would treat (i) in (SQ) as giving the truth conditions and (ii) as giving the content of the conventional implicature.

For this purpose, we introduce two operators for removing and putting quotations on expressions, ‘UNQ’ and ‘QUO’. (We will find these useful in the next section on mixed quotation in indirect discourse as well.) UNQ(φ) is the result of removing one “layer” of double-quotiation marks from φ together with any square brackets surrounding material inside an outermost layer of quotation marks (cf. Maier 2017). QUO(γ) is the result of adding double quotation-marks at both ends of the expression γ (cf. Gomez-Torrente 2017). Thus UNQ(“‘religious” leaders are “creatures of exalted emotional sensibility’”) = ‘religious leaders are individuals of exalted emotional sensibility’.
QUO(‘creatures of exalted emotional sensibility’) = ‘“creatures of exalted emotional sensibility”’. If there are no double quotation marks in \( \phi \), then UNQ(\( \phi \)) = \( \phi \). To cut a corner, let \( \text{SUB}(\phi, u, t, \gamma) \) = the person or text to which the quoted words \( \gamma \) in \( \phi \) are referred relative to \( u \) and \( t \).  

(SQ) For any speaker \( u \), time \( t \), atomic sentence \( \phi \) that contains scholar quotes, \( \phi \) is true\((u, t, \text{English})\) iff 
(i) UNQ(\( \phi \)) is true\((u, t, \text{English})\) and 
(ii) for all \( \gamma \) such that QUO(\( \gamma \)) occurs in \( \phi \), there is a \( \gamma' \) in a language of \( \text{SUB}(\phi, u, t, \gamma) \) that is a translation of \( \gamma \) in English and is used by (or in) \( \text{SUB}(\phi, u, t, \gamma) \).

We treat ‘is used by’ as tenseless, that is, as equivalent to ‘has been, is, or will be used at some time or other by’.

5 Mixed Indirect Discourse and Attitude Attribution

5.1 Mixed Indirect Discourse

We begin with a simple case of mixed indirect discourse and quotation (dubbed mixed quotation by Cappelen and Lepore (1997)).

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24 There is no simple or uniform syntactic method of identifying the person to whom or text to which the quoted words are referred. Sometimes it is the subject of the sentence (that is, who the sentence is about) as in (4a-b). Sometimes an adverbal clause provides the information, as in (4c). Sometimes a citation to a text is given at the end of a sentence. Sometimes it is given in a footnote. Sometimes it is left entirely to the context.

25 In section 5, we give a treatment for authorial brackets used in mixed quotation (as in (5c)). The treatment there can be adapted to scholarly quotation. If “monstrous” operators are to be tolerated, the treatment in section 6 could be adapted for scholarly quotation. It should be clear how the extensions go from the treatment below.

26 Of course, scare quotes may be used in the complements of verbs of indirect discourse, but that has a quite different point relating to the attitude of the speaker to words appearing in the complement rather than to words that the subject used. See note 5.
(5a) Macomber said that he “bolted like a rabbit.”

Intuitively, (5a) says that (i) Macomber said that he bolted like a rabbit and (ii) he used “bolted like a rabbit” (or perhaps something that translates that) in saying that of himself (given that the report is of his narration of what he did). We take this to be a semantic phenomenon. We learn how to interpret the appearance of quotation marks in complements of indirect discourse sentences in much the same way we learn how to interpret other constructions, and what we learn can be expressed with a rule. The goal of this section is to state the rule.

However, we cannot always treat the quoted expression as something the subject is saying of himself (it may make no reference to the subject at all). So the gloss on (5a) cannot stand in as a general treatment. In addition, (5b) shows that there may be multiple instances of quoted material in the complement clause.

(5b) Alice said that she had “heard nonsense” compared with which that would be “as sensible as a dictionary.”

In giving an account of how the subject of the sentence expressed what is attributed to her, we must keep track of the grammatical role of the various quoted expressions in the complement. In fact, given that the same word can be quoted multiple times, in different roles, it is clear that merely saying that the word was used in the subject’s saying what she did will not convey what is intended.

(5c) illustrates how an expression may be substituted in the quoted expression (here in brackets) so that the referent interpreted relative to the speaker corresponds to the referent of the word used by the subject of the attribution, since in indirect discourse the complement sentence is, except for the tense, which is governed by the event time for the main verb, interpreted relative to the speaker’s context (though see section 6).

(5c) She said that it had been many years since “such trifles had broke across the web of [her] solitude.”
(5d) illustrates a case in which the subject of the attribution did not use the words in quotation marks at all.

(5d) La Rochefoucauld said that jealousy “ends as soon as we pass from suspicion to certainty.”

In this case, the function of the quoted expression is to indicate that these words are, or are a translation of, the words that the subject used. There are, however, cases in which it looks like a stricter standard is called for, and so in the case of indirect discourse, as for direct discourse, we will distinguish between a strict and a non-strict reading. We will begin with the non-strict reading, and return below to examples that suggest that a stricter reading is also sometimes intended.

In Ludwig and Ray (1998), we offered a general account of the multiple appearances of quotation in indirect discourse against the background of a sententialist account of indirect discourse and attitude sentences, but we did not extend it to interpolations as in (5c) or to using translations of expressions used by the subject as in (5d). We refine that account here (and fix a few things). We make use of the two operators introduced in the previous section for removing and putting quotations on expressions, ‘UNQ’ and ‘QUO’.

A sententialist account contrasts with a propositionalist account of indirect discourse (and attitude attributions). On the sententialist account, the complement clause in a report of indirect discourse refers to the contained sentence and characterizes what the subject said in terms of a content equivalence relation. On the propositionalist account, it refers to the proposition expressed by the complement, which is said to be the same as that expressed by something the subject said. While we prefer the more minimalist sententialist account, after we present the refinement and extension of our earlier account, we will sketch how to extend the same ideas to a propositional account, which requires only minor modifications.

On the sententialist account given in Ludwig and Ray (1998), we treated ‘x said that ϕ’ as relating x to the sentence ϕ understood relative to the speaker of the sentence
and time of utterance. In the following, we use the event analysis of action verbs (as we did for direct discourse) in order to secure that the two clauses are linked in the right way. For this purpose we use

\[ \text{saying}(e, t', x, \text{UNQ}(\phi), u, t) \]

to abbreviate

\[ e \text{ is a saying by } x \text{ at } t' \text{ which } \text{samesays } \text{UNQ}(\phi) \text{ understood relative to } u \text{ at } t \]

where \( e \) is an event, \( x \) is the agent of \( e \), \( t' \) is the time at which \( x \) is the agent \( e \), \( t \) is the time of utterance, \( u \) is the speaker, and ‘samesays’ is a possibly context-sensitive equivalence relation that relates utterances and sentences.\(^{27}\) For present purposes it is not necessary to settle the details of how to interpret the samesaying relation, and, in particular, whether and how it differs from a generalization of the synonymy relation.

We will develop the account in two stages. In the first stage we ignore pronouns, and indexicals\(^{28}\) in the complement sentence that need reinterpretation across contexts, in order to illustrate how to accommodate multiple appearances of quoted material in the complement. In the second stage, we will fix the problem this leaves us with pronouns and indexicals. This will provide a template for other verbs of indirect discourse.

\(^{27}\) Davidson used ‘samesaying’ to relate speakers (1968, pp. 140-141) in an informal rendering of his account of indirect discourse. Lepore and Loewer appropriated it for use as relating utterances in a defense of Davidson’s paratactic account (1989, 343), and it has been pressed into service (in a generalization) as the equivalence relation invoked by ‘says’ between the subject’s utterance and whatever the complement clause refers to in indirect discourse ever since.

\(^{28}\) Under ‘indexicals’ we include not just what Kaplan called pure indexicals (like ‘I’, ‘now’, ‘today’, etc., whose referents are determined fully relative to a specification of contextual parameters) but also (what he called \textit{true}) demonstratives (like ‘this’, ‘that’, ‘then’, ‘there’, and demonstrative uses of pronouns).
Stage 1. Ignoring pronouns, etc., in the complement, using the notation just introduced, (MID) (mixed indirect) provides an account of the truth conditions of indirect discourse using the verb ‘to say’ whether involving mixed quotation or not.

(MID) For all speakers $u$, times $t$, sentences $F$, names $\alpha$, [said that $F$] is true($u$, $t$) iff there is an $e$, and a time $t' < t$, such that

(a) saying($e$, $t'$, ref($\alpha$, $u$, $t$), UNQ($F$, $u$, $t$)) and

(b) If UNQ($F$) $\neq F$, then

(i) there is a sentence $\theta$ such that $e$ is an utterance of $\theta$ and $\theta$ in the language of ref($\alpha$, $u$, $t$) at $t'$ in $e$, relative to ref($\alpha$, $u$, $t$) at $t'$, is a translation of UNQ($F$) understood relative to $u$ at $t$,\(^{29}\) and

(ii) for all expressions $\gamma$, and formulas $\psi$, if $F = \text{the result of replacing}$ ‘$x$’ in $\psi$ with QUO($\gamma$), then

(iii) a translation of $\gamma$ into the language of $\theta$ as used by ref($\alpha$, $u$, $t$) has the same grammatical role in $\theta$ as QUO($\gamma$) has in $F$.

Clause (a) ensures that the subject says what the sentence in the complement says minus the first layer of quotation marks. Clause (b) ensures that wherever a term appears in quotation marks in the complement, there is a translation of it that was used in the same role in a sentence the subject used to express what he did.

Stage 2. Pronouns and indexicals used in the complement clause, as in (13) and (14),

(13) Betty said that she was “pixelated”

\(^{29}\) We let ‘understood relative to $u$ at $t'$’ do double duty, fixing both interpretation of the sentence and contextual parameters. See the discussion below of the use of words in complements that aren’t strictly in English. Ultimately, in a truth-theoretic semantics, we would wish to introduce the speech act the speaker performs as another contextual parameter, in which case we could add a further relativization to the use of the sentence in the speech act itself.
(14) Betty said that I was “pixelated”

make for some complication because in giving the truth conditions for (13) we want to say that Betty uttered, not a translation of ‘she was pixelated’, but rather of ‘I am pixelated’, using ‘pixelated’. Similarly, for (14), we want to say that she uttered not a translation of ‘I was pixelated’ but of a sentence such as ‘You are pixelated’ using ‘pixelated’. In the case of a pronoun cross-indexed with the subject, we want to shift specifically to a sentence in which the first-person pronoun is used. This can be incorporated into (MID) by introducing in the place of ‘translation of UNQ(F)’ a defined term, ‘index-shifted translation of F’.

(Def) q’ understood relative to x at t’ is an index-shifted translation of q understood relative to u at t iff q’ is a mere indexical-variant of a translation of UNQ(q) such that

(i) for every occurrence of an indexical g in q there is in the same grammatical role in q’ an occurrence of an indexical (or directly referring term) d such that d understood relative to u’ at t’ refers to the same thing as g understood relative to u at t

(ii) and if g is co-indexed with the subject position, then d is the first-person pronoun agreeing in number with g.

To say that q’ is a mere indexical-variant of a translation of UNQ(q) is just to say that but for possibly these indexical shifts, q’ does not differ from a translation of UNQ(q). By way of example, suppose when A greets you this morning, A says, “You were late for a very important date yesterday”. Then ‘I am late for a very important date today’ understood relative to you and yesterday is an index-shifted translation relative to A today. Together with the definition of ‘UNQ(x)’ this handles (5c).

For a propositionalist account of the function of the complement, we can replace (a) with (a’).

(a’) saying(e, a, ref([that UNQ(ϕ)], u, t)) …
We relativize the reference of \([\text{that UNQ}(\phi)]\) to speaker and time because the proposition it designates is determined in general relative to the interpretation of UNQ(\phi) relative to the context of utterance.

The approach above extends naturally to cases involving quantification into the complement clause, as in

There is something such that Galileo said that it moves.

On a sententialist account, we want to say that this is true just in case an assertion of Galileo’s samesays a completion of the sentence form ‘\(x\) moves’, i.e., a sentence in which ‘\(x\)’ is replaced by a singular referring term.\(^3\) However, we must provide a way of generalizing this requirement that allows for the possibility that there is no completion in English of the sentence form ‘\(x\) moves’ that samesays with any sentence that Galileo uttered. This can be done by providing a satisfaction clause for open sentences along the lines of (MIDQ) (mixed indirect quantification).

\[(\text{MIDQ}) \quad \text{For all sequences } f, \text{ all speakers } u, \text{ times } t, \text{ formulas } Fx, \text{ names } \alpha, \lbrack \alpha \text{ said that } Fx \rbrack \text{ is satisfied by } f \text{ relative to } u \text{ and } t \text{ iff ...}\]

The remainder of this condition would be just as in (MID), but in place of ‘\(F\)’ we will put ‘\(F^*\)’ which latter would be shorthand for

the result of replacing ‘\(x\)’ in \(F\) with a constant \(b\) in a language that extends the language of \(F\) only by the addition of \(b\), and in which \(b\) refers to \(f(\langle x \rangle)\).

Clearly, the approach could be generalized to formulas with any number of free variables. It should be noted that attitude attributions, with the exception of present-tense

\(^{30}\) We give an account for the sententialist view of the referent of the complement. For the propositionalist, it is just a matter of quantifying into a complex term that refers to a proposition, and so relativizing the referent of the complement to the object assigned to the variable (relativized to speaker and time).
attributions, involve quantification into temporal argument positions in the complement, and so are to be treated in accordance with the account of quantification given here.

As Cappelen and Lepore have noted (1997), in reporting what people say, we can put words they use in quotation marks in the complement of indirect discourse even though they misuse or misspell them or just use expressions that are not words in the language we are speaking at all, as in (15).

(15) Nicola said that his father is a “philtosopher”\footnote{Is this an instance of scare quotes? Not if the intention is to attribute the word to Nicola. We can use scare quotes in indirect discourse without there being any suggestion that the subject used them: John said that he was into “adult films”, though that is not what he called them. However, there may be a kind of dual use of the quotation marks when one both wants to attribute words to someone in indirect discourse and to distance oneself from them.}

This is a case in which a stricter standard for what sentence the subject uttered is called for, for the intention is to indicate that Nicola used ‘philtosopher’, not just any word that means the same as the speaker’s use of it, to express being a philosopher (or whatever she expresses by it). For the strict reading, we need only to replace (iii) in (MID) with (iii\*):

(iii\*) an occurrence of $\gamma$ as used by ref($\alpha$, $u$, $t$) has the same grammatical role in $\varphi$ as QUO($\gamma$) has in F.

The result of applying UNQ to the complement sentence in (18) is ‘his father is a philtosopher’. That is not a sentence of English, but the account requires only that it be interpreted relative to the use by the attributor in the utterance context and the subject at the event time. (What if Nicola didn’t mean anything very definite by ‘philtosopher’? See the discussion below of nonsense words in complements of indirect discourse verbs.)

We also sometimes intend to convey that specific words were used rather than synonyms or translations of them quite apart from cases in which we wish to convey that...
someone used a misspelling of a word (or a neologism or a malapropism). For example, consider this exchange:

A: Brian said that he was allergic to “gorse.”
B: I heard he said he was allergic to “furze.”
A: No, he definitely said that he was allergic to “gorse.”

This makes sense even if A and B both know that ‘gorse’ and ‘furze’ are synonyms. In this case, we invoke the strict reading to capture the sense of the exchange.

What about a case in which someone uses a nonsense term (a term that didn’t mean anything in the mouth of the subject of the sentence), as in (16)?

(16) Nicola said that her father is a “jabberwocky”.

Here we intend the strict reading. These cases too can be accommodated as long as we allow that ‘her father is a jabberwocky’ can stand in the same-saying relation to some utterance of Nicola and allow translation to relate expressions that are not fully meaningful. (iii*) requires that the particular nonsense word in the complement be used rather than another, so no additional difficulties arise about getting the right target. Nothing in the account requires sentences that appear in complements to be fully meaningful or to have propositional content that determines truth conditions for them.

A question arises about how to treat iterated indirect discourse as in (5e).³²

(5e) Professor Elugardo said that William James said that religious leaders are “creatures of exalted emotional sensibility.”

The question is whether this should be treated as saying that Professor Elugardo said something that is the same in content as (17) or (18).

³² This example was raised by Ray Elugardo as an objection to our earlier account.
William James said that religious leaders are “creatures of exalted emotional sensibility.”

William James said that religious leaders are creatures of exalted emotional sensibility.

On the first reading, we are saying (roughly) that

Professor Elugardo said that: William James said something whose content was that religious leaders are creatures of exalted emotional sensibility and he [James] used ‘creatures of exalted emotional sensibility’ in the appropriate position.

On the second reading, we are saying (roughly) that Professor Elugardo said something that is the same in content as (18) while he [Elugardo] used ‘creatures of exalted emotional sensibility’ in an appropriate position.

Our account says that (5e) attributes to Elugardo an assertion the same in content as (18) in which he used ‘creatures of exalted emotional sensibility’ (or a translation) in the grammatical role in which it appears in the complement of (5e)—this is the second interpretation. To get the first reading, we would use (19).

Professor Elugardo said that William James said that religious leaders are “‘creatures of exalted emotional sensibility’”.

However, surely it is more natural to give (5e) the first interpretation on which the words are attributed to James and not Elugardo. One reason it may seem more natural is that we already know that William James used that phrase. Another is that the focus is on what James said, so that when quotation marks appear in the complement of the embedded attribution (in contrast to the NP of the embedded attribution) we may be inclined to take the speaker to be intending to convey something about the words with which James said it. But we can also get the other (second) reading for iterated indirect mixed quotation. Consider (20).
Though she said that he put it more politely, Sue told me that John complained that he was being “jerked around by his asshole boss”.

In this case, we interpret the speaker of (20) as intending to attribute to Sue the use of ‘jerked around by his asshole boss’ rather than to John. We react to (5e) and (20) by trying to figure out what the speaker could be intending, and we use whatever knowledge we have to help us arrive at a reasonable interpretation.

We think it is doubtful there is much of a practice attached to iterated mixed quotation. We have only come across it in examples proposed by philosophers intended to test our account. Most likely, we interpret these on the fly using whatever information we can to divine the intentions of the speaker. If this is right, then we are not faced so much with the question of what interpretation the rules of the language give to (5e), but how to extend them to cover such cases. For this purpose, we recommend extending our account since it provides a systematic way of disambiguating the different readings speakers may intend. One could develop an alternative which made (5e) literally express the first reading by conditionalizing on whether F in (MID) was itself an instance of indirect discourse, and giving a different treatment of embedded complements when it was, but this would make certain things we might want to say using iterated mixed quotation inexpressible by any literal interpretation. (Of course, the quotation marks in these cases can be interpreted strictly or non-strictly.)

5.2 Mixed Attitude Attributions

The case of mixed attitude attributions as illustrated in (5f) is curious.

(f) She thought that it was curious that that “thin, proud man” should have had “that little, sharp woman for a mother!”

In the case of direct attributions of thought, we treated the quotation term in the complement as giving the content of the thought interpreted relative to the context of the thought (the thinker and time of the thought). In indirect attitude attributions in non-mixed cases, it would seem that the difference is that the sentence in the complement is
interpreted relative to the speaker rather than the subject and time of the thought. What purpose could interpolation of quotation terms in attributions of thought on analogy with mixed indirect discourse serve?

It is clear that mixed indirect attitude attributions are intended to provide a more fine-grained characterization of the thought that is being attributed. In the case of direct attributions of thought, we suggested that we aim to use a sentence a translation of which the subject would be disposed to use to express her thought. With this in mind, we can make sense of the point of mixed indirect quotation, namely, to indicate that the thinker would be disposed to use translations of the material quoted in the complement in corresponding positions in announcing the thought in a sentence. Using (MID) as a template, we can give the following account in (MIA) (mixed indirect attitude) for attitude attributions, where we replace the quantifier over events with a quantifier over states. (This is given for the verb ‘thought’ but as above it provides a template that can be extended to other propositional attitude verbs.)

(MIA) For all speakers $u$, times $t$, sentences $F$, names $\alpha$, $[\alpha$ thought that $F]$ is true($u$, $t$, English) iff there is a state $s$ and a time $t' < t$, such that

(a) thinks($s$, $t'$, ref($\alpha$, $u$, $t$), UNQ($F$), $u$, $t$) and

(b) If UNQ($F$) $\neq F$, then

(i) ref($\alpha$, $u$, $t$) is disposed to express $s$ at $t'$ using a sentence $\theta$ that relative to ref($\alpha$, $u$, $t$) at $t'$ is an index-shifted translation of UNQ($F$) understood relative to $u$ at $t$ and

(ii) for all expressions $\gamma$, and formulas $\psi$, if $F = \text{the result of replacing} \ 'x' \ \text{in} \ \psi \ \text{with QUO}(\gamma)$, then

(iii) a translation of $\gamma$ into the language of the sentence $\theta$ that ref($\alpha$, $u$, $t$) is disposed to use has the same grammatical role in $\theta$ as QUO($\gamma$) has in $F$.

As above, there is a propositionalist version of clause (a) and we can make provision for a more strict use of quotation marks as well so that what is required is an index-shifted version of the sentence $\theta$ itself.
6 Monstrous Operators

Kaplan (1989) defined a ‘monstrous operator’ as one that shifts the context of evaluation away from the context of utterance. Cappelen and Lepore (1997; 2003) have suggested that mixed quotation can involve this kind of shift. Here is an example from their 1997 paper:

Mr. Greenspan said he agreed with Labor Secretary R.B. Reich “on quite a lot of things”. Their accord on this issue, he said, has proved “quite a surprise to both of us”.

In the second sentence, the ‘us’ in quotation marks is clearly intended to be interpreted relative to the context of Greenspan’s utterance rather than the context of the report. The practice of replacing pronouns and indexicals in quoted material in complements so that when interpreted relative to the speaker’s context the referent comes out correct is illustrated in (5c). In light of this, one might dismiss examples like these as careless and ungrammatical, an example of changing from indirect to direct quotation in midsentence and failing to notice.

Without trying to settle this issue about usage, it is interesting to ask from the theoretical standpoint how such a practice could be accommodated in a semantics for a language. Take as a sample (21),

(21) She said that “of all of us” she was “the least happy camper”

where we assume that the speaker of (21) is not among those that the subject was talking about. We want to have the speaker say something to the effect:

(22) She said that of all of them she was the least happy camper and she used a sentence that translates ‘of all of us I am the least happy camper’ in saying that.
(MID) does not give us (22) because its clause (a) requires the speaker to say that she said that of all us she was the least happy camper, and this requires the speaker to include herself among those referred to, contrary to our assumption.

The first thing to do is to transform the complement sentence into a sentence in which indexicals in quotation marks are replaced by bracketed indexicals that corefer, taken relative to the speaker’s context, with those they replace taken relative to the subject’s context. We use the following definition.

(Def) q’ relative to x at t is an index-shifted transform of q relative to y at t’ iff q’ is a mere indexical variant of q such that
for all g such that QUO(g) appears in q, for every occurrence of any indexical or demonstrative δ in g (unless in authorial brackets), in q’ there is in the same grammatical role as δ in q an occurrence of an indexical (or directly referring term) δ’ in authorial brackets such that δ’ understood relative to x at t refers to the same thing as δ understood relative to y at t’.

Then we replace (a) in (MID) with (a*):

(a) saying(e, t’, ref(α, u, t), UNQ(F), u, t)

(a*) there is an F* such that F* relative to u at t is an index-shifted transform of F relative to ref(α, u, t) at t’ and saying(e, t’, ref(α, u, t), UNQ(F*), u, t)

For the rest, we replace ‘F’ with ‘F*’ in clause (b).33

7 Translation Practices
Before concluding, it is worth taking a glance at our practices in translating quotation, which raise some questions about the account presented here. When it is pure quotation

33 For arguments that quotation is not actually monstrous, see Jaszczolt and Huang (2017) and Johnson (2017).
that is in view, we translate the quotation marks but not the expression enclosed within it. (This is support for the view that quotation marks are not semantically inert but a distinct device in the language, and it is evidence against the proper name theory for which, as remarked, what is interior to the quotation marks is nothing more than spelling.) Strikingly, however, translations for other forms of quotation, direct and mixed, often do not preserve the identity of the material in quotation marks. When we translate dialogue in fiction or in reporting, we typically translate the sentences that appear in quotation marks as well. Similarly, when we translate mixed quotation, we typically translate the expressions that appear in quotation marks as well. How is this compatible with the view that at the core of all of these uses of quotation marks is pure quotation?

The answer is that ordinary translation does not aim to preserve faithfully every aspect of meaning. Sometimes this is because there is no best fit between the expressions in the target and home language. We can at best paraphrase the German ‘torschlusspanik’ into English as ‘the fear of diminishing opportunities as one ages’, because we have no one-word equivalent. But in other cases the trouble is that in preserving certain aspects of meaning we fail to convey something important about the function of the word or sentence in the original. The most literal translation of a poem may do a very bad job of conveying the literary qualities of the original. In other cases, the problem has to do with a function internal to the conventional rules for using the expressions. Tyler Burge (1978) pointed out that in cases of self-reference like ‘This sentence is false’ we do not aim, when we translate it into French or German, to preserve the referent of the subject term to the English sentence. What we would lose in this case is the fact that the subject term is used to refer to the sentence in which it appears. In a context in which we are interested in the phenomenon of self-reference, it is more important to preserve that in the translation than the reference to the English sentence. Burge noted that the same thing applies to translation of dialogue in novels. A translation of War and Peace into English in which all the Russian dialogue was left untranslated would not sell very many copies. Dialogue is what we called quasi-use quotation. For it to function as intended, the audience must understand the expressions contained in quotation marks (so far as possible—dialogue can contain nonsense words too). Preserving this function is more important in translation that preserving reference to the
words that appear in the quotation marks. Furthermore, given the account of (non-strict) direct discourse we have given, the original sentence and its translation will still share the same truth value. These remarks carry over straightforwardly to direct attitude attributions and to mixed quotation. Thus, the fact that reference to words in quotation marks, other than in pure quotation, is not preserved in translation is not a counterexample to the analyses offered above.

8 Conclusion
In this paper we have argued for a unified account of quotation devices in natural languages. We have not argued that there is one analysis of all uses of quotation marks, but rather that though quotation is polysemous it is unified in that every form of quotation (excepting those set aside in note 5) can be seen as making use of a core function of quotation marks, namely, their use in pure quotation. The general rule for pure quotation

\[(GQ) \quad \text{For any expression } \phi, \text{ QUOT}(\phi) \text{ refers to } \phi.\]

is a remarkably simple and clear device that exploits the fact that expression types have tokens by which we recognize them. Uses of quotation that extend beyond pure quotation have two features in common.\(^{34}\) First, the material appearing in quotation

\[\text{34 These remarks can be generalized to devices that function like quotation marks in encasing an expression to form a term that refers to, or is about, or applies to instances of, a type of entity related to the enclosed expression in some way. Thus, for example, putting a sentence in angle brackets to form a name of a proposition [\langle \phi \rangle], or putting a word in all caps to refer to the concept it expresses ‘RED’, or Wilfrid Sellars’s dot quotes, [\bullet \phi \bullet], for types of linguistic entities individuated by function, all depend on the device that is exhibited in pure quotation. Sellars writes: “I shall use dot quotes to form the names of expressions … which is realized in English by the sign design illustrated between them” (Sellars, Scharp, and Brandom 2007, pp. 163-4, n. 3). In all of these cases, the entity referred to is located relative to the sentence or expression flanked by the}

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marks is intended to be understood and that it is understood is essential to the function that such quotations play in communication (modulo a strict form of direct and indirect discourse), even though this does not always involve the expressions contributing their extensional properties to fixing truth conditions for the sentences in which they appear. Second, they appeal to a relation born to the expression appearing in quotation marks that plays a role in determining the truth conditions of the sentences in which they appear. Thus, in all of these uses, a reference to the expression in quotation marks is made in relation to which other things are characterized, such as some utterance someone has made or a thought she has had.

References
Harth, M. (2011). Quotation and pictoriality. In E. Brendel, J. Meibauer & M. Steinbach (Eds.), special delimiters, and the fact that we understand the contained terms is essential to their functioning in the way they are intended to.
Understanding Quotation (pp. 195-208). Berlin: De Gruyter.


Maier, E. (2017). The pragmatics of attraction: explaining unquotation in direct and free indirect discourse. In this volume.

