

The treatment of reported speech

Lesley Stirling
The University of Melbourne

Abstract

Despite the substantial literature on reported speech, its treatment in structural and quantitative-distributional analyses of discourse has remained problematic. This article surveys and discusses a range of methodological issues created by the occurrence of embedded segments of direct reported speech in narrative discourse. Analysis of a personal experience narrative from the Australian language Ganalbingu is used as illustration. Stories like this include substantial passages of direct reported speech. Detailed investigation of such stories allows us to address questions such as: (i) what is the narrative function of these passages of direct speech and (ii) how is reference to characters mapped across the distinct deictic frames represented by the narrated action and the represented speech of participants within the story world? It is argued that any approach to discourse structure which is formal or quantitative in orientation will need to address such issues. The article concludes by formulating some open questions for investigation which tease out cognitive predictions and assumptions implicit in the ways in which direct speech has previously been handled.

1. Introduction

In this article I survey and discuss a range of methodological issues created by the occurrence of embedded segments of direct reported speech in discourse, and in particular in narrative discourse.

There is a substantial literature on represented speech and thought, across a diverse range of research domains and approaches, including literary theory, philosophy, sociology, and various subdisciplines of linguistics such as linguistic typology, syntax, semantics and discourse-pragmatics (see for example Vološinov 1971, Bakhtin 1981, Coulmas 1986, Lucy 1993, Güldemann and von Roncador 2002, Holt and Clift 2007). The focus of concern here, however, is not the syntactic, semantic or pragmatic analysis of represented speech, nor its dialogic functions. Rather we are concerned with the problems it poses for structural and distributional analyses of discourse, especially over large corpora.

While it is not appropriate to review here the range of approaches to represented speech and thought, nor even the range of terminological distinctions which have been made in this area, it is relevant to the discussion to comment on the conventional distinction between ‘direct’ and ‘indirect’ reported speech. It has been ‘direct reported speech’ which has raised methodological difficulties for the approaches I will be discussing.

The key distinction of ‘direct’ speech is that it purports to represent the speech actually produced by a reported speaker at a time distinct from the time of reporting. Example (1) is from a corpus of interviews with women who had had breast cancer and shows the use of direct reported speech within this conversational context¹.

(1) when I got diagnosed I was told nothing and,
 (0.5)
 more or less told by him,
 (0.8)
 well if you was my wife,
 this was his words,
 if you was my wer- wife I would-
 (0.7)
 y-
 (0.4)
 I'd make you have a m- mastectomy.
 you know,

Note that the speaker explicitly introduces the reported speech with the verb *told*. Example (2), taken from the same interview, illustrates indirect reported speech, again introduced by a report introducing verb, *said*.

(2) I mean the first time,
 because you said you were diagnosed while you were still pregnant,
 how did you know then?
 (0.8)

The key characteristic of direct reported speech is that it purports to represent two distinct deictic spaces: that of the on-going current interaction, and that of the reported situation in which the utterance was originally produced. Thus person, place and time deixis of the reported speech content are encoded as reflecting the deictic centre of the reported situation. This means that the same entity may be referred to both within the surrounding narrative context, and within the embedded direct speech, but with a different 'mode of reference' used. This is illustrated in (3), where 3a shows a slightly tidied up segment of the direct reported speech in (1) and 3b gives an indirect speech version of this. Clearly the first person pronouns of the direct speech in 3a refer to the same referent as *he*, and the second person pronouns refer to the current speaker, elsewhere identified as *I/me*. In contrast in the indirect speech of 3b, pronoun person is consistent across matrix clause and embedded report.

(3) a. He told me 'If you was my wife, I'd make you have a mastectomy'.
 b. He told me that if I was his wife, he'd make me have a mastectomy.

In example (1) the speaker explicitly orients to the presentation of the speech as a verbatim representation of the original words of the reported speaker with the interpolated comment *this was his words*. However, numerous researchers have shown that so-called 'direct' speech should not in fact be seen as an accurate reproduction of the speech purportedly being reported (for example Tannen 1989, Lehrer 1989, Clark and Gerrig 1990, Mayes 1990). Furthermore, the dividing line between 'direct' and 'indirect' speech is problematic (for example Sakita 2002, Clift and Holt 2007), with oftentimes 'mixed' versions of reporting

being used. Nevertheless, there is clearly something deictically distinctive about direct speech, and it is this deictic discontinuity with the surrounding discourse which raises additional problems for structural and quantitative analyses of discourse.

I first review the ways in which reported speech has been handled in such approaches, taking as examples narrative structure analysis and reference tracking analysis. I then consider a range of methodological issues posed by the handling of direct reported speech, and work through an analysis of a personal narrative in the Australian language Ganalbingu as a case study. I conclude by pinpointing a number of cognitive predictions deriving from this discussion, and making some recommendations for future work in this area.

2. The treatment of direct speech in discourse analysis

Theories of discourse analysis have found the occurrence of represented speech and thought, in particular direct speech, somewhat problematic. This is particularly the case for structural, quantitative-distributional, and formal approaches to discourse analysis. I consider below how two distinct approaches, each with a different agenda, have dealt with these problems. However it is important to note that similar issues arise for any approach which attempts to codify the macro-structure and reference relations within discourses so as to allow for generalisations across collections of types of text, such as narratives.

2.1. Labovian structural analysis of narrative

Labov and Waletzky (1967) and Labov (1972) proposed a model for the structural analysis of narrative texts which has been very influential and is still being used in narrative analysis, although aspects of the model have been revised and critiqued (see for example Labov 1997 and other papers in Bamberg 1997). For instance Norrick (2000), working on conversational narrative, notes its usefulness for codifying and comparing distinct versions of story retellings.

This self-described ‘structural-functional’ approach postulates that narratives can be segmented into parts which have distinct functions with respect to the narrative task. Clauses can be assigned a narrative function accordingly. Six main segments are proposed, as listed below.

1. Abstract
2. Orientation
3. Complicating action
4. Resolution
5. Evaluation
6. Coda

All six need not occur in every narrative and they need not occur strictly in the order listed. Furthermore, in some cases there may be more than one segment with a particular function in the narrative, and individual clauses may in some cases encode elements of more than one narrative function.

Thus while it is essential for a narrative to include at least two clauses representing ‘complicating action’, the main temporally sequential chain of events making up the narrative, it is not essential for a narrative to include an Abstract or a Coda. The ‘backbone’ of the narrative is the chain of complicating action clauses, which are temporally ordered ‘narrative clauses’ describing events that move the action forward.

Within this schema, represented speech and thought, including direct speech, are regarded as falling within the category of ‘Evaluation’. Thus Labov (1997: 404) comments:

When an actor in the narrative is animated to speak directly, no matter what the topic or the addressee, the current situation is open to evaluation.

‘Evaluation’ refers to narrative elements which highlight the point of the narrative or comment on some aspect of it. It is a heterogeneous category, and Labov notes numerous types of linguistic phenomena which are included within its purview. Represented speech and thought is regarded as a departure from the normal narrative syntax, which interrupts the temporal sequentiality of the text, hence highlighting that part of the narrative. At the same time it is a way of overtly representing the perspective of the characters.

Thus there is a strict separation assumed between represented speech and thought (as a subtype of Evaluation) and the complicating action presenting the spine of the narrative.

I return to a consideration of this approach in section 3, however it is worth mentioning here that some recent research in communication disorders has indicated the importance of distinguishing direct speech from other aspects of Evaluation. Carey (2008) (also Leekam and Carey 2008) found that written narratives by a group of children with autism differed significantly from those by a group of typically developing children in (other) aspects of Evaluation but not in amount of direct speech. In addition, the balance of Evaluation and direct speech within narratives varied both between these two groups, and for the autism group over subsequent story tellings.

2.2. Quantitative distributional analyses of reference tracking

A body of work beginning with Givón (1983a) uses a quantitative distributional methodology to investigate the contextual factors determining choice of referring expression within a functional model of language.

The underlying model assumes that form of reference reflects ‘recipient design’ factors, to do with the cognitive accessibility of the referent to the hearer. Such ‘accessibility’ models of reference have gained prominence, with numerous researchers, such as Ariel (1990) and Gundel, Hedberg and Zacharski (1993) following on from Givón. Thus, crudely, recency of mention, importance of the referent in the discourse, and lack of competing alternative referents means the referent is cognitively more *accessible* or *activated* for the hearer and a more minimal form of reference can be used: ellipsis, verb agreement or cross-referencing, or unstressed pronouns. But if the referent has not been mentioned recently, is not very important, or there are many other referents being talked about at that point in the discourse,

then a more informative, fuller form of reference needs to be used: full definite Noun Phrases (henceforth 'NPs') or proper names.

The basic methodology involves dividing the text into clauses (or comparable units such as intonation units) and identifying the referring expressions. Then for each referring expression a number of measures are calculated designed to correlate with degree of cognitive accessibility of the referent. For instance, 'referential distance' (RD) counts back the number of clauses to when the referent was last mentioned (to give a measure of accessibility). 'Topic persistence' counts forward the number of clauses in which the referent is mentioned continually (to give a measure of cognitive importance, assumed to correlate with accessibility). It is then possible to compare different forms of referring expression with respect to these measures. Some robust and interesting results were found, for instance showing that crosslinguistically verb agreement, clitics, and pronouns did indeed have lower average RD than, for example, full definite NPs.²

In this early work within this paradigm, direct reported speech was implicitly recognised as problematic for the methodology, but researchers avoided the problem by effectively passing over passages of direct speech in their coding. It is interesting from a historiological and philosophical perspective to consider the treatment of direct speech within this paradigm at this time.

Some researchers did not recognise it at all. For instance Givón (1983b: 350), writing on spoken English, states:

Materials inside direct quotes were not studied, nor were they considered a gap for the purpose of computing either referential distance or persistence.

Hinds (1983: 58) similarly, reporting work on Japanese, notes: 'I have not analysed any of the quoted material' while Fox (1983: 220) on Biblical Hebrew notes 'Direct quoted speech was not counted'. And Brown (1983: 318) on written English narrative states:

Sections of conversation in the book were skipped so as to avoid the added complication of trying to determine whether a conversation is a single piece of discourse participated in by two (or more) or whether it is two pieces of intertwined discourse.

Alternatively, it was partially analysed. Thus Givón (1983c: 157) on Ute specifies the following methodological procedure for calculating referential distance:

Non-appearance inside direct-quoted portions of the narrative was *not* counted as a gap, while appearance inside such direct-quote portions *was* counted as an instance of occurrence.

And concomitantly for the calculation of topic persistence:

As above, the absence of a referent in direct-quoted portions of the narrative [...] was *not* counted as a gap. But neither was presence in [such portions – LS] counted as an added clause in the persisting chain.

Cooreman (1983: 443), working on the American language Chamorro, says:

...direct quotes are not considered as a gap in the counts when the NP referent is not found in them, but they do count as an instance of occurrence when the NP referent appears in them

And Bentivoglio (1983: 261) working on Latin-American Spanish notes that reported speech and thought introducers do potentially interrupt continuity, but concludes:

From my analysis thus far it seems clear that such interference does not break the reference of a given topic [and] does not impede the use of weak strategies (in the scale of continuity) such as verb-agreement and clitics.

Later work began to recognise the importance of higher-level discourse structural divisions as a factor affecting the forms of referring expressions (for example Fox 1987, and in a somewhat different tradition, Ariel 1990; see also Stirling 2001). ‘Thematic discontinuities’ such as paragraph boundaries, or in oral discourse, spatial or temporal discontinuities, seemed to make otherwise accessible referents, less accessible. Thus numerous cases where a full NP was used to refer to a participant which had only recently been mentioned could be explained.

Contrary to what had earlier been claimed, for example by Bentivoglio, there began to be evidence suggesting that shifts in and out of direct speech passages sometimes functioned as just such a discontinuity. Thus Kibrik (1996) and Lichtenberk (1996) both make explicit claims that reported speech contexts do introduce discontinuities from the point of view of referent accessibility. Kibrik (1996: 280f.), reporting on written narratives in Russian, introduces the notion of a ‘world boundary’ as a block prohibiting use of a reduced form of reference even if the referent is otherwise highly activated, and notes:

the only type of world shift found in the sample discourse is a shift between the physical world described by the author, and the world of a character’s thoughts and images.

Lichtenberk (1996: 381-2; see also Lichtenberk 1988), speaking of To’aba’ita, notes that in accounting for the distribution of two deictics used in lexical NPs to refer back to previously mentioned participants, choice of one over the other relates to accessibility and that ‘intervening direct speech lowers the degree of accessibility’.

Similar claims were made for English and Japanese by Clancy (1980), for Chamorro by Scancarrelli (1985), for Sùpyiré by Carlson (1987) and for Polish by Flashner (1996). However, as Carlson (1987: 4) notes, there is a serious problem in knowing how to operationalise the notion of ‘thematic discontinuity’, and the ‘thematic discontinuities’ discussed in this work are described in such vague terms as to preclude a distinction between direct and indirect speech. This reinforces the critique of earlier work as singling out direct speech for special treatment, presumably due to the practical difficulties arising from the deictic shifts it encodes. Only Carlson addresses this issue, noting that in Sùpyiré, indirect reported speech appears to be seen as more disruptive than direct. However even here it is unclear to what extent he is making any claim about reported speech as a thematic break-point independent of other discontinuities.

3. Represented direct speech in a Ganalbingu hunting narrative

To explore the issues of represented speech in narrative analysis in more detail, I will now consider a narrative from the Australian language Ganalbingu. Ganalbingu is a Yolngu language, spoken in Eastern Arnhem Land, Northern Australia. Yolngu languages make up an enclave of Pama-Nyungan (non-prefixing) languages in the predominantly non-Pama-Nyungan (prefixing) languages of Arnhem Land. Ganalbingu, also referred to as a dialect of Djinba in the literature (Waters 1989), is part of the western inland linguistic sub-group of the Yolngu family (Wilkinson 1991). Little work has been done on this language with the exception of Waters (1989) in which he presents some discussion of the ‘Ganalbingu dialect’ of Djinba, although the main focus of his study is the closely related language Djinang.

Ganalbingu is a suffixing language with agglutinative morphology and relatively free word order. There is a split case marking system with an optional three-way marking on nouns, a Nominative-Accusative marking system on pronouns and Ergative-Absolutive marking system on demonstratives. The orthography used in examples is the standard Yolngu orthography (see also Wilkinson 1991): the velar nasal is represented with the IPA symbol (ŋ) and retroflexion is represented with an underline diacritic (ṅ, ḷ, ḍ).

The ‘Kangaroo story’ is a personal narrative about an instance of hunting a kangaroo. It describes a particular occasion on which the narrator, her grandmother and her aunty went hunting and killed a kangaroo in the traditional manner, and emphasises the value of traditional hunting practices. The narrative was recorded by Lauren Campbell. The story had first been told in English in spontaneous conversation, and was then recorded a few days later, on request, in Ganalbingu. In transcribing the text, the tactics of the chase were very important to the narrator, who went to the extent of drawing diagrams on a whiteboard to clarify deictic queries. The transcription was later checked and revised by the narrator and Djulibing and the text used here is this revised version. Revisions mostly involved code-switched lexical items from the narrator’s first language Djambarrpuyngu and did not substantially affect the phenomena at issue here.

3.1. *Issues with direct speech (1): mapping co-referentiality across different spaces*

The first issue is that the same participant in the discourse may be referred to both within the narrative context and within the embedded direct speech. However clearly a different ‘mode of reference’ may be used if the participant is being deictically referred to in either case. This is because person, tense and other deictics are presented in the direct speech as if anchored to the original deictic centre rather than that of the narrating context. An example from the narrative in question is given in (4).

- (4) ṅaw garm-i bini Lanarra-riḷ,
 1pl.exclNOM go-PST DIST.ALL place.name-ALL
 ‘We went there to Langarra,
 mak nyalukanywu gridjmitj-wu marri
 maybe FILLER Christmas-DAT maybe
 maybe it was for Christmas.

Yan *ɲaw* *garm-i* [...]

just 1pl.exclNOM go-PST

We were just there [...]

Ga *nyan* *waŋ-i*

And 3sg.ERG say-PST

And she said,

‘Bini *lim* *guwa*

DIST.ALL 1pl.incl.NOM go

‘We’ll go there,

guwayɲaŋ-wu *lim* *garm-ak*

long-neck.turtle-DAT 1pl.incl.NOM go-FUT

bini *guɭun-ril.*’

DIST.ALL billabong-ALL

we’ll go to the billabong for long-necked turtle.’’

In this case reference is made in the narrative context via a first person plural exclusive form *ɲaw* (‘us group excluding you’) to a group referred to in the direct speech using a first person plural inclusive form *lim* (‘us group including you’).⁴

This situation can be modelled schematically as in Figure 1. In the world of the reported incident (the ‘story world’), participants conversed with one another at the time about the entities at issue and the events unfolding. They referred to themselves with first person pronouns, to their interlocutors with second person pronouns, to the group with first person inclusive pronouns and to other participants in the third person. The ‘narrative world’, the text as produced and told to an audience, involves the narrator producing a series of utterances describing the incident. Since this is a first person narrative, she refers to herself using the first person, and to all other participants in the incident using third person expressions.

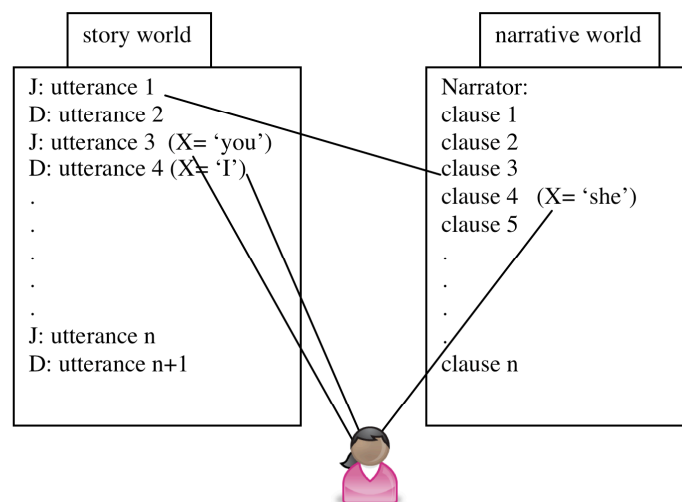


Figure 1: Mapping coreferentiality across narrative and direct speech contexts in a Ganalbingu hunting narrative

3.2. *Issues with direct speech (2): direct speech and the storyline*

The second issue is that direct speech is not extraneous to the main storyline, as assumed in the Labovian analysis of narrative structure where direct speech is treated as part of the evaluative component of the narrative.

Even later, more sophisticated approaches to modelling direct speech, such as Fauconnier's (1985,1997) mental space theory, treat direct speech as indicating a complete switch into the subjective away from the narrative mode. Instead, as Mushin (1998, 2001) has convincingly argued, direct speech must be seen as having the dual aspects of a) functioning as a narrative event at the level of narration and b) indicating the subjectivity of the reported speaker.

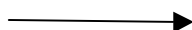
To see the potential scope of the problem here, we consider once more the Ganalbingu hunting narrative. Of the 53 clauses in this story, 16, or 30%, occur within direct speech contexts. Of the 90 referring expressions in the story, 29, or again roughly 32%, also occur within direct speech. Crucial information about both goals and actions are conveyed using direct speech rather than narrative clauses. Table 1 gives a schematic representation of the structure of the Ganalbingu narrative, indicating which episodes are mostly conveyed via narrative clauses and which are mostly conveyed via direct speech.

Table 1: Schematic representation of the episode structure of the Ganalbingu hunting narrative

A. Initial setting or orientation	
B. Plan 1: to go for turtles	Mostly conveyed via DIRECT SPEECH
C. Carrying out the plan: plan fails	Mostly narrative clauses, no DIRECT SPEECH
D. Plan 2: to hunt for kangaroos	Mostly conveyed via DIRECT SPEECH
i. Generic discussion about kangaroo hunting in old days and general plan	
ii. Specific plan of how to go about hunting for a kangaroo now	
E. Carrying out the plan: complex and successful	Mostly narrative clauses, no DIRECT SPEECH

If we consider the story (narrative) content minus the contribution of information presented within direct speech as in (5), it is clear that the latter does not have simply an evaluative function. There are several significant hiatuses in the story (represented here by the arrows).⁵

(5) We went there to Langarra,
 maybe it was for Christmas.
 We were just there
 and we were staying there.



Then we went.
 We went on.
 Finally we arrived at the billabong.
 We looked for long-necked turtles
 and we didn't find any.
 I was getting hungry
 but I didn't tell Djulibing.
 We went on.
 And we went with the dogs.

—————▶
 So true, we sat and waited
 and then it--
 that kangaroo was on the other side
 and she went to the other side.
 Then she stood up.
 And that kangaroo ran towards us.
 When (it) got closer,
 And we two stood up,
 And it, that kangaroo, turned around towards the water.
 And the dogs, they bit this neck (of the kangaroo) for a long time.
 And we looked.
 And he, that dog,
 bit that neck for a long time,
 Otherwise, whatsit, that kangaroo would have run.
 And some of those dogs, they saw,
 Then they say 'ku ku kuk' (barking) like this.
 As for me, I grabbed the stick,
 then I really hit (it).
 Then (I) hit that kangaroo in(to) the billabong.
 Then (it) died.

If, on the contrary, we consider the content of the direct speech contexts as in (6), we see that these clauses constitute a report of the planning that went on in the course of the hunting expedition which is being related in this story. These clauses are part of the narrative timeline only in introducing the speech events they report, and do not themselves introduce key events in the hunting sequence. They nevertheless provide key motivational and explanatory information. This is one reason why Labov included direct speech as a kind of 'Evaluation'. Notably, direct speech clauses do not occur in this story at climactic sequences, as has been claimed by others to commonly occur (Mayes 1990, Clift and Holt 2007).

(6) Then she my grandmother said,
 'Let's go!'
 And I said,
 'Where to?'
 And she said,
 'We'll go there,

we'll go to the billabong for long-necked turtles.'

—————▶

Then she said,

'There are no turtles here,

let's eat kangaroo.'

And I said like this,

'We don't have a gun.'

'No, this time we're going to do it like in olden days,

live like the old people.

We will trick the kangaroo into (going into) the water.'

'Kangaroo, oh yeah!'

'I'll go over to there.'

I go this way.

So going, the kangaroo will run towards you two,

and you two, you sit/wait,

but you two hide yourselves.'

'Hey, where's that kangaroo?'

Direct speech contexts also introduce the prospective object of the hunt. The kangaroo is one of the major participants in the story, and references to a kangaroo whether the initial hypothetical animal or the later actual one account for 15 out of the 62 references to main participants (24%). This is eclipsed only by references to the group of hunters (24 or 39%).

While the kangaroo which is introduced in the direct speech is a specific but hypothetical one, the fact that it has been talked about within this context does affect the initial narrative world reference to it. This can be seen in (7). Note the repair here, where an initial complex emphatic pronominal reference to the kangaroo is replaced by a lexical NP.

(7) Ga burralamdja ŋaw nyin-nyin
and true 1pl.exclERG stay-REDUP
'So true (we did it), we sat and waited

ga nyan-ma ŋuŋiny--
and 3sg.NOM-EMP DIST.NOM
and then it--

ŋuŋuŋurbani ŋarrku nyin-nyin
other.side kangaroo stay-REDUP
the kangaroo was on the other side'

4. Theoretical status of reference across direct speech and narrative contexts

In deciding how to handle direct speech contexts in quantitative, structural discourse analysis, there are two extreme positions to take and a cline of intermediate possibilities.

At one extreme, researchers can act as if the material within direct speech isn't there (the status quo). For example, if undertaking counts of referential distance, or considering issues

of accessibility of referent more generally, the researcher would skip over direct speech contexts when counting clauses back to a previous mention. Further they would not include any referring expressions from within the direct speech in the analysis.

The other extreme position would be to act as if the direct speech context is the same as the rest of the narrative context. The researcher would count clauses within direct speech in calculating measures of distance such as referential distance, and include referents within direct speech contexts in the analysis.

I now wish to demonstrate that methodological choices of this kind may have a significant effect on the outcomes of analysis and thus our understanding of the functional grammar of different forms of NP in a language. Here I demonstrate the difference just between these two extreme choices, but one could perform the same exercise with intermediate possibilities. For instance, an alternative approach would be to not code instances of reference inside direct speech, on the grounds that we do not have access to the appropriate chain of reference of which they are purportedly part. However, we could still count back to these referring expressions, and we could also count the direct speech clauses themselves as included in measures of textual ‘distance’. Another alternative would be to develop a ‘weighted’ model whereby clauses inside direct speech contexts would be assigned additional ‘disruptive’ weighting. More radically, one and the same referent could be counted as activated in different ‘worlds’ independently. Specific procedures are relevant only to those intending to pursue this form of analysis across a corpus of data. The point here is that it remains an empirical matter, should one wish to undertake such quantitative distributional work, to establish how to do it.

Table 2 gives the results for Referential Distance for the Ganalbingu narrative with and without including direct speech clauses.

Table 2: ‘Referential distance’ for NP types under two methods of analysing direct speech

Without	Direct		With	Direct	
	Speech			Speech	
NP type	Number	Mean RD	NP type	Number	Mean RD
Demons	1	5	Demons	3	8.3
Nouns	10	14.1	Nouns	16	10.4
Pronouns	26	3.1	Pronouns	41	3.5
Zeroes	5	1.6	Zeroes	5	1.6
Emphatic*	4	4.25	Emphatic*	6	7.17
Complex	15	12.2	Complex	19	13.28
TOTAL	61		TOTAL	90	

*Note that emphatic NP types, flagged as problematic in Bickerdike, Campbell and Stirling (ms.) because of their unusually low RD and thus ‘high’ accessibility ranking, have a higher RD if direct speech is included in the analysis, while Nouns have a lower RD.

Notice also that inclusion of direct speech changes the order of elements on a scale organised according to average referential distance. When direct speech clauses are included, complex expressions are ordered as ‘less accessible’ than nouns. Without the inclusion of direct speech, nouns are ordered as ‘less accessible’ than complex expressions. Table 3 gives the relevant orderings.

Table 3: NP types ordered by mean RD under two methods of analysing direct speech

Without Direct Speech			With Direct Speech		
NP type	Number	Mean RD	NP type	Number	Mean RD
Zeroes	5	1.6	Zeroes	5	1.6
Pronouns	26	3.1	Pronouns	41	3.5
Emphatic	4	4.25	Emphatic	6	7.17
Demons	1	5	Demons	3	8.3
Complex	15	12.2	Nouns	16	10.4
Nouns	10	14.1	Complex	19	13.28
TOTAL	61		TOTAL	90	

These results raise questions for the generalizability of descriptions of the discourse function of types of referring expressions within particular languages. At minimum they suggest that multiple analyses of stories both with and without direct speech should be undertaken and at most, that this issue needs to be resolved before any such analyses can be trusted. In sum, clearly it does not work to ignore episodes of reported speech in attempting to understand the way in which either narrative structure or reference tracking works in narrative. A much more complex and sophisticated understanding is needed.

To frame the empirical question which needs to be answered here, see Figure 2.

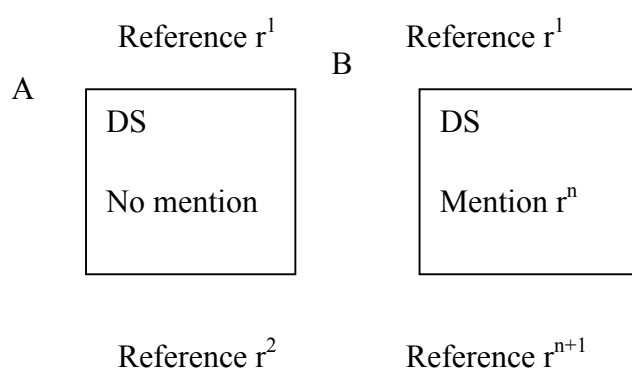


Figure 2: schematic representation of two structural scenarios

The question is whether discourse situation A differs from discourse situation B, and if so how? Will referent r^2 be different in form from referent r^{n+1} ? Let us consider first the forms of reference within the reported speech context. If we assume that direct speech is some approximation of the speech which was actually produced at the time, then any factors

affecting the selection of one form of reference over another should derive from the reported context rather than from the surrounding narrative text. However we know that direct reported speech cannot in fact be considered verbatim report irregardless of the embedding context of speech. We must assume that the text which is produced is produced in such a way as to make it interpretable to the current hearer, so referring expressions within the direct speech will be designed at least to some extent from the recipient's point of view. Additionally, if we consider forms of reference following the direct speech context, it is an open question as to what extent the form of a reference r^{n+1} will be affected by the presence of a reference r^n within the direct speech context: or to put it another way, to what extent mention of an entity within direct speech affects its accessibility for the hearer in the narrating context.

Importantly, as indicated in section 1, this is not an issue just for quantitative distributional analyses such as the Givónian approach. Similar decisions are made in work on the Centering Theory of discourse coherence and reference tracking (Grosz, Yoshi and Weinstein 1995, Walker, Joshi and Prince 1998). Thus Prasad (2003: 98) states that, so as to not upset the computation of transitions:

Following Kameyama (1998), we assumed direct speech segments to be inaccessible to the utterances in the next higher level of segmented discourse.

Reddeker and Egg (2006) note that the treatment of reported speech in the Rhetorical Structure Theory of discourse coherence is also problematic. Further, formal semantics of discourse and computational representations of the semantics of discourse also need to manage reference across different contexts of this kind. An example of such a formal theory is Discourse Representation Theory, which aims to account for the discourse-semantics of texts (for example Kamp and Reyle 1993, Smith 2003). In this theory, the reference of each referring expression must be represented and resolved and the nature of the connection between this reference and the surrounding text must be specified in order to derive the dynamic formal semantics of the discourse. Embedded segments of direct speech must be managed within this formal treatment.⁶

5. Cognitive modelling of reported speech

A number of researchers have proposed cognitive models of reported speech contexts. In each case these have been handled as just one type of embedded subjective context within a higher level objective 'real world' model. These include works in the tradition of Fauconnier's Mental Space theory (Fauconnier 1994/1985, 1997, Fauconnier and Sweetser 1996); Sanders and Redecker (1995); Mushin (1998); works within the tradition of Cognitive Linguistics including Langacker (1996); Sakita (2002); and Smith (2003).

From our perspective, the key element required in such models is the ability to map relations between referents in different spaces (or modes, or structures). Figure 3 represents three different kinds of models of how this could work loosely taken from these different approaches.

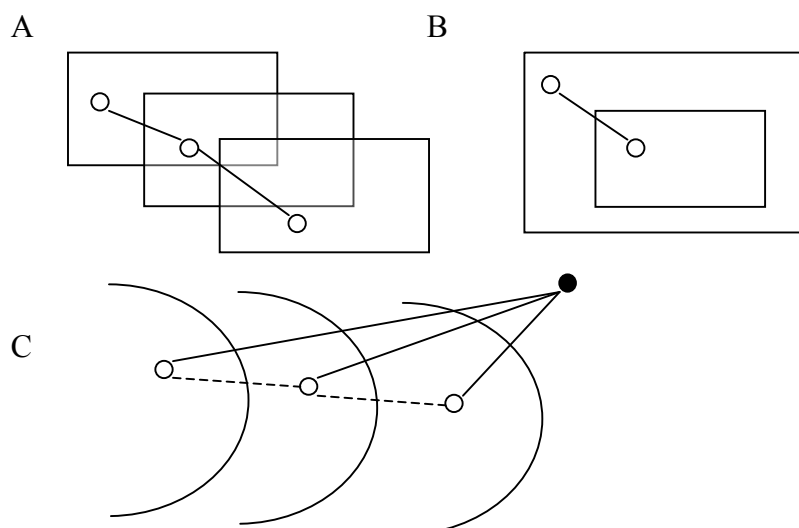


Figure 3: *alternative representations of reference-mapping across spaces*

Outstanding issues include the following. Should the mental spaces for the narrative context and the reported speech context be seen as in parallel (as in A) or as an embedded structure (as in B)? Should we represent the fact that reference to ‘counterparts’ in different spaces is mediated by a juncture at an on-going mental representation of the entity (as in C, an augmented version of representations from Rubba 1985, for example 233)? If so, how? Finally, are the mental spaces corresponding to reported speech contexts distinguishable in any way from other kinds of mental spaces? For example, tense and modal expressions are also considered to be ‘space-builders’, but are the spaces they set up different from reported speech spaces in any way other than in that the counterparts within direct speech contexts are grammatically distinct by virtue of their shifted person deixis?

While there has been discussion of this (for example in Fauconnier, Rubba, and Smith), there is not yet a proper marriage between the most adequate models, such as Mushin’s, and a full treatment of anaphoric links across spaces. Fauconnier (1994: 163) notes:

Defining the conditions under which an element can have counterparts in other spaces is a complex question [...] not yet dealt with.

6. Conclusions and future directions

I have shown in this article that any researcher who wishes to make use of ‘structural-functional’ analysis of narrative, whether along the lines proposed by Labov and Waletzky or some other model, should begin by assuming that passages of direct reported speech require a distinguished account. They need to be pulled out and considered separately, but on the other hand it cannot be assumed that the overall storyline or global structure of the story can necessarily be specified independently of the content of these passages.

I observed in section 2.2 that quantitative distributional work on reference tracking in the 1980s and 1990s incorporated a certain amount of casting around to find an appropriate methodological solution to the handling of direct reported speech. This methodological question is to a large degree an artefact of this kind of analysis. Nevertheless I have shown that the methodology used can have a significant effect on the outcomes of the analysis. One

conclusion to be drawn from this discussion is that researchers wishing to pursue quantitative distributional analysis of referring expressions in this vein need to undertake explicit exploration and hypothesis testing to determine what kind of methodology is most appropriate to map patterns of accessibility.

More interesting is that the nature of these explorations imply a range of cognitive predictions and presuppose a range of research questions of a theoretical nature about the way in which direct speech segments integrate with surrounding discourse and effect subsequent reference. These questions have broader cognitive and linguistic significance. I would like to conclude by posing some of these questions in explicit form here, with a view to encouraging further research on these topics.

1. Does the boundary between reported speech and surrounding narrative constitute a barrier to accessibility?

Do we in fact find that speakers process and encode references within passages of direct reported speech differently from references in the surrounding narrative? If a passage of direct speech acts like any other discontinuity then the prediction would be that fuller forms of Noun Phrase reference would be found following such passages, even if the referent had been mentioned either just before or during this passage (cf. Fox 1987, Stirling 2001). General claims have been made to this effect for a few languages, as indicated in section 2.2. However to my knowledge, no detailed analysis, cross-linguistic investigation nor psycholinguistic experimentation has as yet been undertaken to explore this question.

2. How do interlocutors orient to references within reported speech?

Do speakers and addressees in fact act as if references to an entity within a passage of direct reported speech are different in kind from reference within the main storyline of narrated text? For example, do they use what would be termed by Givón a ‘less continuous’ form of reference after such introductions or re-identifications? Do addressees give any indication that such embedded references require a different kind of processing or more processing effort?

3. Is there any difference in gist memory of a story according as events are introduced initially within main narrative clauses or within reported speech?

It would be straightforward to test this by manipulating the content of a stimulus story and asking different groups of participants to recall the story at a later time.

4. Is indirect reported speech treated differently cognitively from direct reported speech?

It is suggested in the Conversational Analysis literature (for example as reviewed in Holt and Clift 2007) that the distinction between direct and indirect speech is not an interactionally salient one. We have already seen that it is in any case a difficult distinction to draw, for all kinds of reasons. Is there any processing evidence for treating them differently?

Direct speech is regarded within the literature as a ‘proxy’ for differential perspective taking. Experiments such as those proposed here thus can be seen as testing for the effect of differential perspective marking on aspects of cognitive processing of discourse, such as the

representation of the main storyline of a narrative, or the processing of referring expressions. Until such time as experiments such as these have been conducted, claims about the effect of direct speech boundaries in discourse remain speculative or anecdotal at best.

¹ My thanks to Lenore Manderson for access to this data, which we have reported on in Manderson and Stirling (2007) and Stirling and Manderson (under submission). Thanks also to an anonymous reviewer for comments on an earlier version of this article.

² There are a range of methodological problems with this approach, some of which have been addressed in later work, however these are not germane to the argument of this paper (see for example Givón 1990, Fox 1987, 1996).

³ I am grateful to Isabel Bickerdike and Lauren Campbell for joint work on this text, reported in Bickerdike, Campbell and Stirling (Ms.). We thank the Ganalbingu speakers Justine Gawinyawiny Gay'amangu and her grandmother Djulibing, Justine for the recorded narrative and Djulibing for assistance with transcription and exposition.

⁴ Standard practice in Givónian analysis is to exclude first and second person references from counting, on the assumption that speaker and hearer are always accessible to the addressee. However where there are a variety of forms available for reference to these participants or, as here, reference to groups including third persons is at issue, arguably they should be taken into account.

⁵ Given the focus of discussion and limitations on space, the original text is not included here; it can be found in Bickerdike, Campbell and Stirling (ms.).

⁶ Kamp and Reyle don't deal with *direct* speech but note of *indirect* speech that it is 'notoriously hard' and that 'at this point even a preliminary treatment of it [...] is out of the question' (p. 287).

References

- Ariel, M. 1990. *Accessing noun-phrase antecedents*. London: Routledge.
- Bakhtin, M. 1981. *The dialogic imagination*. (M. Holquist, (Ed.), C. Emerson & M. Holquist, (Trans.)). Austin: University of Texas Press.
- Bamberg, M. 1997. Oral versions of personal experience: Three decades of narrative analysis. Special Issue, *Journal of Narrative and Life History* 7(1-4).
- Bentivoglio, P. 1983. Topic continuity and discontinuity in discourse: A study of spoken Latin-American Spanish. In T. Givón, (Ed.), 255-311.
- Bickerdike, I, Campbell, L. & Stirling, L. Ms. Referential choice in a Ganalbingu hunting narrative.
- Brown, C. 1983. Topic continuity in written English narrative. In T. Givón, (Ed.), 313-341.
- Carey, L. 2008. Narrative, autism and mainstream secondary schooling in England: Issues in Assessment, inclusion and intervention. PhD dissertation, University of Durham.
- Carlson, R. 1987. Narrative connectives in Sùpyiré. In *Coherence and grounding in discourse*, R. Tomlin (Ed.), 1-19. Amsterdam: John Benjamins.
- Clancy, P. 1980. Referential choice in English and Japanese. In W.L. Chafe (Ed.). *The Pear Stories*. Advances in Discourse Processes Vol. 3, 127-202. Norwood: Ablex.
- Clark, H H. & Gerrig, R. J. 1990. Quotations as demonstrations. *Language* 66: 764-805.
- Clift, R. & Holt, E. 2007. Introduction. In E. Holt & R. Clift, (Eds.), 1-15.
- Cooreman, A. 1983. Topic continuity and the voicing system of an ergative language: Chamorro. In T. Givón, (Ed.), 425-489.
- Coulmas, F. (Ed.) 1986. *Direct and indirect speech*. Berlin: Mouton de Gruyter.

- Duchan, J., Bruder, G. & Hewitt, L. (Eds.) 1995. *Deixis in narrative*. Hillsdale, N.J.: Lawrence Erlbaum.
- Fauconnier, G. 1994/1985. *Mental Spaces*. Cambridge: Cambridge University Press. (2nd edition)
- Fauconnier, G. 1997. *Mappings in Thought and Language*. Cambridge: Cambridge University Press.
- Fauconnier, G. & Sweetser, E. (Eds.) 1996. *Spaces, Worlds, and Grammar*. Cambridge: Cambridge University Press.
- Flashner, V. 1987. The grammatical marking of theme in oral Polish narrative. In R. Tomlin, (Ed.). *Coherence and grounding in discourse*, 131-156. Amsterdam: John Benjamins.
- Fox, A. 1983. Topic continuity in Biblical Hebrew narrative. In T. Givón, (Ed.), 215-254.
- Fox, B. 1987. *Discourse structure and anaphora*. Cambridge: Cambridge University Press.
- Fox, B. (Ed.) 1996. *Studies in Anaphora*. Amsterdam: John Benjamins.
- Givón, T. (Ed.) 1983a. Topic Continuity in Discourse: A Quantitative Cross-Language Study. Amsterdam: John Benjamins.
- Givón, T. 1983b. Topic continuity in spoken English. In T. Givón, (Ed.), 343-363.
- Givón, T. 1983c. Topic continuity and word order pragmatics in Ute. In T. Givón, (Ed.), 141-214.
- Givón, T. 1990. Syntax: A functional-typological introduction. Vol. II. Amsterdam: John Benjamins.
- Grosz, B., Joshi, A. & Weinstein, S. 1995. Centering: A framework for modelling the local coherence of discourse. *Computational Linguistics* 2.21: 203-225.
- Güldemann, T. & von Roncador, M. (Eds.) 2002. *Reported discourse: A meeting ground for different linguistic domains*. Amsterdam: John Benjamins.
- Gundel, J., Hedberg, N. & Zacharski, R. 1993. Cognitive status and the form of referring expressions in discourse. *Language* 69.2: 274-307.
- Hinds, J. 1983. Topic continuity in Japanese. In T. Givón, (Ed.), 43-93.
- Holt, E. & Clift, R. (Eds.) 2007. *Reporting talk: Reported speech in interaction*. Cambridge: Cambridge University Press.
- Kamp, H. & Reyle, U. 1993. *From discourse to logic*. Dordrecht: Kluwer.
- Kibrik, A. A. 1996. Anaphora in Russian narrative prose: A cognitive calculative account. In B. Fox, (Ed.), 255-303.
- Labov, W. & Waletzky, J. 1967. Narrative analysis: Oral versions of personal experience. In J. Helm, (Ed.), *Essays on the Verbal and Visual Arts*, 14-22. Seattle: University of Washington Press.
- Labov, W. 1972. *Language in the inner city*. University of Pennsylvania Press.
- Labov, W. 1997. Some further steps in narrative analysis. *Journal of Narrative and Life History* 7(1-4): 395-415.
- Langacker, R. W. 1996. Conceptual grouping and pronominal anaphora. In B. Fox, (Ed.), 333-378.
- Leekam, S. & Carey, L. 2008. Written narratives in children with autism. Paper presented at the HCSNet Workshop on Narrative and Communication Disorders, Sept. 13-14, Melbourne, Australia.
- Lehrer, A. 1989. Remembering and representing prose: Quoted speech as a data source. *Discourse Processes* 12: 105-125.

- Lichtenberk, F. 1988. The pragmatic nature of nominal anaphora in To'aba'ita. *Studies in Language* 12: 299-344.
- Lichtenberk, F. 1996. Patterns of anaphora in To'aba'ita narrative discourse. In B. Fox, (Ed.), 379-411.
- Lucy, J. A. (Ed.) 1993. *Reflexive language: Reported speech and metapragmatics*. Cambridge: Cambridge University Press.
- Manderson, L. & Stirling, L. 2007. The absent breast: Speaking of the mastectomied body. *Feminism and Psychology* 17(1): 75-92.
- Mayes, P. 1990. Quotation in spoken English. *Studies in Language* 14: 325-363.
- Mushin, I. 1998. Viewpoint shifts in narrative. In J.-P. Koenig, (Ed.). *Discourse and Cognition*, 323-36. Stanford: CSLI.
- Mushin, I. 2001. *Evidentiality and Epistemological Stance: Narrative retelling*. Amsterdam & Philadelphia: John Benjamins.
- Norrick, N. 2000. *Conversational narrative: Storytelling in everyday talk*. Amsterdam/Philadelphia: John Benjamins.
- Prasad, R. 2003. Constraints on the generation of referring expressions, with special reference to Hindi. PhD dissertation, University of Pennsylvania.
- Redeker, G. & Egg, M. 2006. Says who? On the treatment of speech attribution in discourse structure. In A. Benz & P. Kühnlein, (Eds.). *Proceedings of the workshop 'Constraints in discourse'*, 2006, Maynoth University, Ireland.
- Rubba, J. 1995. Alternate grounds in the interpretation of deictic expressions. In J. Duchan, G. Bruder and L. Hewitt, (Eds.), 227-261.
- Sakita, T. 2002. *Reporting Discourse, Tense, and Cognition*. Elsevier.
- Sanders, J. & Redeker, G. 1995. Perspective and the representation of speech and thought in narrative discourse. In J. Duchan, G. Bruder and L. Hewitt (Eds.), 290-317.
- Scancarelli, J. 1985. Referential strategies in Chamorro narratives: preferred clause structure and ergativity. *Studies in Lanuage* 9.3: 335-362.
- Smith, C. 2003. *Modes of discourse*. Cambridge: Cambridge University Press.
- Stirling, L. 2001. The multifunctionality of anaphoric expressions: A typological perspective. *Australian Journal of Linguistics* 21(1): 1-23.
- Stirling, L. & Manderson, L. Under submission. *About you: Authority, objectivity and the generalized you*.
- Tannen, D. 1989. *Talking voices*. N.Y.: Cambridge University Press.
- Vološinov, V. N. 1971. Reported speech. In L. Matejka & K. Pomorska, (Eds.). *Readings in Russian poetics*, 149-175. Cambridge, MA: MIT Press.
- Walker, M., Aravind J., & Prince, E. 1998. *Centering Theory in discourse*. Oxford: Clarendon Press.
- Waters, B. E. 1989. Djinang and Djinba-a grammatical and historical perspective. Canberra: Pacific Linguistics.
- Wilkinson, M. P. 1991. *Djambarrpuynu: A Yolngu Variety of Northern Australia*. Department of Linguistics, University of Sydney.