On the Functions of Left-Dislocation in English Discourse*
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0. Linguistic competence and discourse function.
Perhaps the most striking feature of natural language is how well it works. Language users are typically unaware of the complexities that are the bread and butter of linguists and instead focus their attention on issues that linguists consider trivial or secondary, for example, capricious orthography or stigmatized dialect differences like negative concord or ain’t in English. That is, the really interesting complexities of language work so smoothly that they become transparent. Chomsky raised this issue back in 1965 with respect to syntax:

A...reason for the failure of traditional grammars...to attempt a precise statement of regular processes of sentence formation and sentence interpretation lay in the widely held belief that there is a "natural order of thoughts" that is mirrored by the order of words. Hence, the rules of sentence formation do not really belong to grammar but to some other subject in which the 'order of thoughts' is studied. Thus in the Grammaire générale et raisonnée (Lancelot et al., 1660) it is asserted that, aside from figurative speech, the sequence of words follows an 'ordre naturel', which conforms 'à l'expression naturelle de nos pensées'. (Chomsky 1965, p. 7f.)

Interestingly, this naive attitude has not completely died out; however, it is now relegated by some to the domain of discourse, in particular to the correlation between linguistic form and discourse function. More precisely, it is not clear whether most generative syntacticians consider the knowledge of such correlations to be part of linguistic competence or not. That is, the level of the sentence is often taken to be the highest level that a theory of linguistic competence must posit, since any wellformedness conditions on levels higher than the sentence are assumed to follow from some other faculty—social competence, common sense, logical reasoning, and so on. For example, in 1984, Chomsky notes two possible 'general discourse conditions' (‘Avoid repetition of R-expressions, except when conditions warrant,’ 'When conditions warrant, repeat.’) and adds that they 'quite possibly fall together with the Avoid Pronoun Principle, the principles governing gapping, and various left-to-right precedence conditions as principles that interact with grammar but do not strictly speaking constitute part of a distinct language faculty’—but then he continues: ‘...or at least, are specific realizations in the language faculty of much more general principles involving "least effort" and temporal sequence. Still, interactions with grammar may be very close, as is particularly clear in the case of the Avoid Pronoun principle' (Chomsky 1984:227; emphasis EFP).

In a different vein, but with the same result of putting in doubt the place of form-function correlations within the domain of linguistic competence, are those
functionalists who posit iconicity as the motivation for form-function correlations. For example, Greenberg's (1966:103) claim, cited by Haiman (1980:528), that 'the order of elements in language parallels that in physical experience or the order of knowledge' is reminiscent of Lancelot's 1660 claim cited by Chomsky (1965). The difference, however, is that Haiman cites it as an 'observation', as supporting evidence for his own iconicity thesis. (See Newmeyer 1992 for an insightful survey and critique of the various iconicity claims.)

At the same time, there is an increased awareness that an understanding of the discourse function of a particular syntactic form can help in the syntactic characterization of that form, if only to distinguish what is truly ungrammatical from what is infelicitous on functional grounds. Consider, for example, the work of Guéron, Rochemont, and Selkirk, among others, responding perhaps to the insistent proddings of Kuno and his co-workers. It is to be hoped that this trend continues, and that form-function studies receive the same sort of careful attention to the facts that is considered obligatory in purely syntactic studies. Language is, after all, complex, at the level of discourse as well as at the level of the sentence.

In this paper, I shall attempt to illustrate this complexity by examining the functioning in discourse of what is apparently one syntactic form, Left-Dislocation. I can think of few syntactic forms whose discourse function has been mentioned as often in the literature as has Left-Dislocation. However, as I shall try to show, statements of its discourse functioning have often been vague and always grossly incomplete. A careful account of how it actually works will show, I believe, that such form-function correlations must lie squarely within the domain of linguistic competence, attributable neither to common sense reasoning nor to 'iconicity'.

1. **Left-Dislocation: form and previously claimed functions.**

Left-Dislocation, to my knowledge first identified in Ross 1967, denotes a syntactic form in which some (nonvocative) NP appears in initial pre-clausal position, coreferential with a personal pronoun occurring somewhere in the clause, as shown in 1 and as exemplified in 2:

\[ \text{[ } \text{[X]} \text{]} \text{[ ...[X]... ] } \]

(1) \[ \text{CP} \text{ NP} \_i \text{ IP NP}_i \text{ pro} \]

(2) a. **The man my father works with in Boston,** he's going to tell the police that the traffic expert has set that traffic light on the corner of Murk Street far too low. (= Ross 1967:6.128a)


c. **My wife**, somebody stole her handbag last night. (= Ross 1967:6.137)

Most previous discussions of the discourse functions of Left-Dislocation have crucially involved the notion of 'topic', either introducing a new topic (Gundel
1974, 1985, Rodman 1974, Geluykens 1992, among others) or marking a topic
(Halliday 1967, Reinhart 1981, Davison 1984, among others). However, these
discussions are often simply claims or, worse, repetitions of claims as general truths,
with no compelling evidence backing them up. For example, Lehmann (1988:187)
writes, with no supporting references: ‘...sentence-initial position usually identifies
the topic (...) of the sentence. This is well-known from left-dislocated NPs.’

Entirely consistent with these claims is, I believe, Keenan’s (1977) claim that Left-
Dislocations produce a 'Referent + Proposition' utterance, which she relates to her
notion of 'discourse topic', and that they are 'transitional structures', that they
'stand between single subject-predicate constructions and discourse,' that they are
characteristic of unplanned, oral discourse. Of course, the fact that her corpus
consists overwhelmingly of unplanned, oral discourse detracts from the significance
of this finding.2

One problem with all such claims is that it is not independently obvious what a
topic is, at least in languages like English with no topic-marking morphology. For
example, following Halliday’s (1967) definition of topic (or 'theme', in his
terminology) as the initial constituent, ascribing the function of topic-marking to
Left-Dislocation is entirely circular: a speaker utters a Left-Dislocation so as to mark
the initial constituent as the topic, and that constituent is the topic solely because it
occurs as the initial constituent.3

Other treatments are less circular, e.g. Reinhart’s notion of ‘pragmatic aboutness’,
whereby a referent evoked by an NP is the topic because, at the conceptual level, the
rest of the proposition is taken to be 'about' that entity and is retrieved/stored
'under' that entity in the mental model. One problem with such an approach,
intuitive though it may be, is the lack of an algorithm for determining what exactly
is about what and how exactly information is retrieved or stored. A more troubling
problem, however, is that, even at an intuitive level, such an approach fails to
account for all the data, as we shall see below.

Other functions claimed for Left-Dislocation are 'marking a new information-unit'
(Halliday 1967) and 'marking contrast' (Chafe 1976, Geluykens 1992). We shall
return to these two sets of claims below.

In what follows, I shall try to show that no single function can in fact account for all
the Left-Dislocation data in English, since what we are subsuming under the single
syntactic rubric of 'Left-Dislocation' in fact comprises at least three different form-
function correlations: simplifying discourse processing, triggering a (po)set
inference, and amnestying an island violation.
2. Three discourse functions of Left-Dislocation.
2.1. Function 1, Simplify discourse processing: 'Simplifying' LDs.

Consider the following passage from a newsboy’s description of his job:

(3) ‘It’s supposed to be such a great deal. The guy, when he came over and asked me if I wanted a route, he made it sound so great. Seven dollars a week for hardly any work. And then you find out the guy told you a bunch of lies.’ (Terkel 1974:13)

If the topic of a sentence is that entity under whose entry information is stored/retrieved and if I may introspect on how I store information, I do not think that the proposition in the Left-Dislocated sentence in 3 would be stored primarily under an entry for the entity evoked by the guy. Whether I would store it under my entry for this particular newsboy or newsboys in general or the job of being a newsboy, I cannot say, but it seems counterintuitive that I would process this proposition as being ‘about’ the referent of the guy in any relevant sense.

Likewise, if we apply Gundel’s (1974, 1985) and others’ topic tests, the ‘what about’ test, the ‘as for’ test, and the ‘speaking of’ test, the referent of the guy fails as topic every time:

(4) a. A: It’s supposed to be such a great deal.
   B: #What about the guy?
   A: The guy, when he came over and asked me if I wanted a route, he made it sound so great. Seven dollars a week for hardly any work. And then you find out the guy told you a bunch of lies.
   b. #It’s supposed to be such a great deal. As for/Speaking of the guy, when he came over and asked me if I wanted a route, he made it sound so great. Seven dollars a week for hardly any work. And then you find out the guy told you a bunch of lies.

Furthermore, this is not an isolated case; consider the data in 5:

(5) a. ‘...there won’t be any dead up there. There’ll just be tombstones setting there. Because the coal is under the graves. An old preacher down there, they augered under the grave where his wife was buried. And he’s nearly blind and he prayed and everything.’ (Terkel 1974:44)
   b. ‘I know what this piece of equipment’s raised to do. Any company, if they’re worth 150 million dollars you don’t need to think for a minute they’re not gonna know what you’re doin’. They didn’t get there that way.’ (Terkel 1974:46)
c. 'I was thinking what we had to work for. I used to work for $1.50 a week. This is five days a week, sometimes six. If you live in the servant quarter, your time is never off, because if they decide to have a party at night, you gotta come out. My grandmother, I remember when she used to work, we'd get milk and a pound of butter. I mean this was pay. I'm thinking about what my poor parents worked for, gettin' nothing.' (Terkel 1974:161)

d. 'My sister got stabbed. She died. Two of my sisters were living together on 18th Street. They had gone to bed, and this man, their girlfriend's husband, came in. He started fussing with my sister and she started to scream. The landlady, she went up, and he laid her out. So sister went to get a wash cloth to put on her... ' (Welcomat, 12/2/81, p. 15.)

e. 'Everybody talk about it all the time. Especially Aunt Katherine up here, that's all me and her talk about—what they done to us. My father and mother sold their land out.' (Terkel 1974:43)

If we administer the tests for topichood that have been proposed in the literature, the Left-Dislocations in 5 likewise fail miserably, on the assumption that the Left-Dislocated NP refers to the topic. Consider, for example, 5a with Gundel's (1974) 'as-for' test (6a) and 'what-about' test (6b):

(6) a. ...there won't be any dead up there. There'll just be tombstones setting there. Because the coal is under the graves. #As for an old preacher down there, they augered under the grave where his wife was buried. And he's nearly blind and he prayed and everything.

b. A: ...there won't be any dead up there. There'll just be tombstones setting there. Because the coal is under the graves.
B: #What about an old preacher down there?

I leave it to the reader to administer the tests to 5b-e.

In addition, note that definiteness is not relevant, pace Gundel 1985, among others. The initial NPs in 5a,b are indefinite and those in 5c-f are definite. Similarly, 'shared knowledge', or 'Hearer-status', (Prince 1981b, 1992) is not relevant. That is, whether or not the speaker is warranted in assuming that the hearer already has an entry for the particular entity in his/her knowledge-store does not seem to be significant for Left-Dislocation. Thus, the initial NP in 5a introduces a Hearer-new (and therefore Discourse-new) entity; 5b involves free-choice any; 5c,d involve an Inferrable (and therefore Discourse-new) entity; and 5e involves either a Hearer-old/Discourse-new or else Inferrable (and therefore Discourse-new) entity.

What does seem relevant is the Discourse-status of the entity evoked by the initial NP (Prince 1981b, 1992): all Left-Dislocations like those in 5 crucially involve Discourse-new entities, entities that are being introduced into the discourse-model for the first time, regardless of whether the hearer is assumed to already know about
them or not. However, it is immediately apparent that Discourse-newness is not a sufficient condition; consider the distinctly odd variant of 5e in 7:

(7) My sister got stabbed. She died. Two of my sisters were living together on 18th Street. They had gone to bed, and this man, their girlfriend’s husband, came in. He started fussing with my sister and she started to scream. The landlady went up, and he laid her out. So a wash cloth, sister went to get it/one to put on...

What I believe is crucial in Left-Dislocations like those in 5 is the position which the initial NP would occupy if the sentence were in canonical form. In all cases, the NP would be in a position that is strongly disfavored for NPs evoking Discourse-new entities: a possessive in 5a and subjects in 5b-e, most of these embedded. As shown in Prince 1981b, 1992, among others, speakers have a favored position for introducing Discourse-new entities—object position, with subjects and possessives being strongly disfavored as a site for Discourse-new entities.

Left-Dislocations like those in 5, which I shall refer to as the ‘Simplifying’ Left-Dislocations, appear then to have the discourse function described in 8:

(8) **Discourse Processing Function of Left-Dislocation: 'Simplifying' LDs**
A ‘Simplifying’ Left-Dislocation serves to simplify the discourse processing of Discourse-new entities by removing them from a syntactic position disfavored for Discourse-new entities and creating a separate processing unit for them. Once that unit is processed and they have become Discourse-old, they may comfortably occur in their positions within the clause as pronouns.

Finally, it is presumably such 'Simplifying' Left-Dislocations that Halliday 1967 has in mind when he says that they serve to 'mark a new information unit', that Geluykens 1992 is considering when he says they introduce a new referent, and that Keenan 1977 is discussing when she says they are characteristic of spontaneous, unplanned, oral discourse.

**2.2. Function 2, Trigger a poset inference: 'Poset' LDs.**
Now consider 9:
a. 'There are many groups of cacti worthy of collection. Even **opuntias**, the plants which tend to give cacti a bad name, with their nasty little barbed hairs or glochids, which are used for 'itching powder', and sharp, barbed spines which go into one's flesh much more easily than they come out, even they have much to offer and can make an interesting—if forbidding—collection. Echinocereus is another group with marvellous, often highly colorful spination...' (Glass, C. and R. Foster. 1976. *Cacti and succulents for the amateur*. Poole/Dorset: Blandford Press. P.31)

b. [response to a story about the addressee's refusal to give a student an incomplete] 'Your Aaron is no worse than most of our students. Ours demand incompletes for no reason whatsoever—except "I didn't have time." I think colleges these days do much too much catering to these babies—they think that just because they got into an Ivy League school they're tremendously special, and that's all they need to get through. Well, I guess poor Aaron will have learned. **Me** usually end up giving them their stupid incompletes.' (X., electronic mail message, 12/15/86)

c. [Reply to a note whose sender says he is considering buying Miss All-American Beauty, Touch of Class, Folklore, Pristine, Brigadoon, Red Lion, and Sheer Elegance.] 'David, Forget Miss All American Beauty, not a show rose. Touch of Class and Folklore are. Pristine is if you can get the show before it opens. Brigadoon, maybe with older plants, **Red Lion** [e] dug it years ago, Sheer Elegance [sic], [e] see a few in the shows but no queens here. To find out the best show roses for your area you must check on the shows and keep record of what wins there this year, not ten years ago.' (WH, Prodigy Gardening BB, 11/14/92)

d. 'This I don't call cooking, when you go in that refrigerator and get some beans and drop them in a pot. And **TV dinners**, they go stick them in a pot and she say she cooked. This is not cooking.' (Terkel 1974:165)

e. 'She had an idea for a project. She's going to use three groups of mice. **One**, she'll feed them mouse chow, just the regular stuff they make for mice. **Another**, she'll feed them veggies. And the third she'll feed junk food.' (SH, 11/7/81)

f. "'My father loves crispy rice," says Samboon, "so we must have it on the menu. And **Mee Grob**, too, he loves it just as much." Mee Grob ($4.95) is a rice noodle...' (Philadelphia Inquirer Magazine, 5/19/91, p. 42)

Clearly, the Left-Dislocations in 9 are of a very different nature from the 'Simplifying' Left-Dislocations in 5. First, we see in 9a that they are not restricted to unplanned, spontaneous, oral discourse. Second, we see in all of them, but most obviously in 9b,c,e, that the entity represented by the initial NP is not necessarily Discourse-new. Third, we see in 9c-f that the position they would occupy were the
clause canonical, i.e. the position of the coreferential pronoun, is object-position—presumably not one that would present any processing difficulty even if the entities in question were Discourse-new. Thus there is no basis for ascribing a processing simplification function to such Left-Dislocations. Furthermore, it seems intuitively that Left-Dislocations like those in 9 are prosodically distinct from the 'Simplifying' Left-Dislocations like those in 5, the initial NPs in 9 but not in 5 having a fall-rise contour. However, as most of my data are from written texts or transcripts of oral texts, I must leave this as a subject for further study.

What I claim is the function of Left-Dislocations like those in 9, which I shall call 'Poset' Left-Dislocations, is presented in 10:

(10) **Set-inference Triggering Function of Left-Dislocation: 'Poset' LDs**
A 'Poset' Left-Dislocation serves to trigger an inference on the part of the hearer that the entity represented by the initial NP stands in a salient partially-ordered set relation to some entity or entities already evoked in the discourse-model.

Partially-ordered set, or 'poset', inferences are understood here as presented in Hirschberg 1985, where they were introduced to account for the relation between linguistic (including prosodic) form and scalar implicature. Briefly, posets are defined by a partial ordering R on some set of entities, \( \{e\} \), such that, for all \( e_1, e_2, \) and \( e_3 \) that are elements of \( \{e\} \), R is either reflexive, transitive, and antisymmetric or, alternatively, irreflexive, transitive, and asymmetric. Poset relations include, along with the usual set relations and the identity relation, relations like is-a-part-of and is-a-subtype-of. See Ward and Prince 1991 for a discussion of poset inferences triggered by Topicalization.

Returning to the Left-Dislocations exemplified in 9, we see that all involve poset inferences but that they require several different strategies. The simplest situation is found in 9c. Here the previous turn has evoked a set, the set of rosebushes David wants to buy, and has enumerated the members of that set. The reply in 9c repeats each member of that set, predicating something of each one.

A slightly more complex situation arises in 9a and 9e. Here, a set has been evoked, a set of cactus types in 9a—*many groups of cacti worthy of collection*—and the set evoked by *three groups of mice* in 9e. In each case, the following 'Poset' Left-Dislocation evokes a member of this set, *opuntias* in 9a and *one [group of mice]* in 9e.

The situation in 9b, 9d, and 9f is more complex still. In these cases, an entity has been evoked and then an NP evoking another entity is Left-Dislocated. Since the Left-Dislocation instructs the receiver that this entity is in a relevant poset relation to something already in the discourse-model, the hearer, presumably after not finding any appropriate set which has been explicitly evoked, construes the previous entity as an alternate member of some unmentioned set, that set available only by
In 9b, the current addressee had, in a previous message, discussed her student Aaron's request for a grade of 'Incomplete' and her refusal to grant the request. The writer of 9b responds with a kind of 'supporting evidence' for the thesis that students, particularly the type of students that go to the coparticipants' universities (both Ivy League), make unreasonable demands with respect to incompletes. After this corroboration, she 'pops up' to the discussion of the Aaron incident in particular by uttering Well, I guess Aaron will have learned. What Aaron will have learned from, of course, is the addressee's refusal to give him an incomplete. The following 'Poset' Left-Dislocation, with the initial me, serves to induce the inference that the writer and the addressee are salient co-members of some relevant set, here presumably the set of professors at Ivy League universities, those individuals who can give or refuse to give incompletes to such students.

In 9d, the referent of one entity, beans, has been evoked, and then the NP evoking a second entity, TV dinners, is Left-Dislocated. In the absence of any explicitly evoked set to support TV dinners, the entity evoked by beans is construed as an alternate member of some set available only by inference, presumably the set of 'fast-food home-cooked foods'.

Likewise, in 9f, the Left-Dislocation of Mee Grob induces the reader to find a relevant poset relation. In the absence of any explicitly evoked relevant set, the entity evoked by crispy rice is chosen as an alternate member of some set available only by inference, presumably the set of menu items available at the speaker's restaurant.

2.2.1. Contrast.
Let us now return to the notion of contrast. Although claimed to be the function of Left-Dislocation in Chafe 1976 and one of two functions (the other being the introduction of a new topic) in Geluykens 1992, it is clear from the data in 9 that contrast is not even a necessary effect of 'Poset' Left-Dislocation, 9b and 9e being the only ones that could be considered contrastive. As I have argued elsewhere (Prince 1981a), contrast is not a primitive notion but rather arises when alternate members of some salient set are evoked and when there is felt to be a salient opposition in what is predicated of them.

First, in 9d and 9f, we see that there is clearly no contrast, since there is no opposition, salient or otherwise, in what is predicated of the entities evoked by the Left-Dislocated NPs; in 9a, we find a sort of 'counter-contrast', opuntias being the least likely member of the set of cacti to be worthy of collection but in fact to be so worthy.

The situation in 9c is, I believe, extremely interesting in that it clearly demonstrates the irrelevance of contrast to Left-Dislocation, even when it obtains: of the seven
roses that the writer is discussing, two (Miss All-American Beauty and Red Lion) are clearly not show roses, two (Touch of Class and Folklore) are, two (Pristine and Brigadoon) are, with (different) conditions, and one (Sheer Elegance) competes in shows but never wins. But, in fact, the bottom line is that none of this matters: the reader is advised to ascertain what wins in his area, at this point in time. (The writer is in southern California and the addressee is in Alabama, two very different rose-growing regions.) Thus, while an inference of contrast may arise when alternate members of a set (one of the poset relations) are discussed, it is in no way directly induced by the Left-Dislocation construction.9,10

2.2.2. 'Poset' Left-Dislocation vs. Topicalization.
In 9e, we find two 'Poset' Left-Dislocations, followed by a Topicalization, and this example will help demonstrate the difference between the two constructions with respect to discourse function.11 First, however, I shall briefly review the discourse functions of Topicalization, presented in 11 (Prince 1981a, Ward 1988):

(11) Double Discourse Function of Topicalization:
1. Topicalization triggers an inference on the part of the hearer that the entity represented by the initial NP stands in a salient partially-ordered set relation to some entity or entities already evoked in the discourse-model.
2. First, if the entity evoked by the leftmost NP represents an element of some salient set, make the set-membership explicit. Then, in all cases, the open proposition resulting from the replacement of the tonically stressed constituent (in the clause) with a variable is taken to represent information saliently and appropriately on the hearer’s mind at that point in the discourse, the tonically stressed constituent representing the instantiation of the variable and the new information.

Note that the first part of this double function is identical to the single function we are ascribing to 'Poset' Left-Dislocation. In contrast, the second part of this double function is not ascribed to Left-Dislocation. Simply put, it attributes a 'focus/presupposition' or 'focus/focus frame' (Partee 1991) information structure to the proposition conveyed by a Topicalization, analogous (but not identical) to it-clefts and wh-clefts, the best-known 'focus-presupposition' information-structuring constructions (Chomsky 1971, Prince 1978, Delin 1990, among others). In contrast to clefts, however, Topicalization does not 'focus' the syntactically marked, or fronted, constituent. Rather, the ‘focus’, i.e., the instantiation of the variable in the corresponding open proposition, is the prosodically prominent constituent within the clause. To compare Topicalization with 'Poset' Left-Dislocation, consider the Topicalization in 9e, repeated here as 12:
(12) 'She had an idea for a project. She's going to use three groups of mice. One, she'll feed them mouse chow, just the regular stuff they make for mice. Another, she'll feed them veggies. And the third she'll feed [e1] junk food.' (SH, 11/7/81)

Following 11.1, the initial NP, the third, triggers a poset inference, in particular that its referent is a member of a salient already-evoked set, intuitively the three groups of mice mentioned earlier. Following 11.2, the replacement of the tonically stressed constituent, here junk food, with a variable yields the open proposition and instantiation shown in 13:

(13) **Open proposition:** She'll feed the third (∈ {the three groups of mice}) X.

    **Instantiation:** X = junk food

That is, at the point of hearing the Topicalization, the hearer is assumed to have on his/her mind that the agent is planning a feeding experiment, feeding each of the three groups of mice something different. The new information in the sentence is that it is junk food that the third group will be fed.

One question that arises is whether the speaker could have used a Topicalization earlier, in place of the preceding Left-Dislocations. I believe that she could have, but with certain subtle differences in either what she was taking to be salient shared knowledge or else in the information structure. Imagine, for example, that 14 had been uttered:

(14) She had an idea for a project. She's going to use three groups of mice. **One**, she'll feed [e1] mouse chow, just the regular stuff they make for mice. Another, she'll feed (them) veggies. And the third she'll feed junk food.

In 14, where the first enumerative sentence is a Topicalization, we can assign to it two possible information-structures (following Wilson and Sperber 1979, among others), presented in 15:

(15) a. **Open proposition:** She'll feed one (∈ {the three groups of mice}) X.

    **Instantiation:** X = mouse chow

b. **Open proposition** She'll X one (∈ {the three groups of mice}).

    **Instantiation:** X = feed mouse chow

With the information-structure in 15a, the speaker is taking as salient shared knowledge of some sort that experiments with mice are necessarily, or at least prototypically, feeding experiments. That is, since no mention has been made of feeding, the warrant for taking the open proposition in 15a as saliently and
appropriately on the hearer's mind can only be due to general background knowledge that this is what one does with mice. Since there is in fact no such warrant (one can do all sorts of things in experiments involving mice), it is highly unlikely that the speaker, a biologist in fact, would structure the information in this way.

The situation in 15b is different: here, the salient shared knowledge is simply that one will do something with respect to each of the groups of mice—perhaps feed one group mouse chow, make another group listen to music, and have the third run a treadmill. In any event, this is a plausible information structure, but not one that the speaker chose. Rather, I claim, the speaker did not choose to take any open proposition for granted at this point and that is why a 'Poset' Left-Dislocation was used for the first group of mice, rather than a Topicalization, the 'Poset' Left-Dislocation overtly marking an NP as representing an entity in a salient set-relation to some entity already in the discourse-model but not marking any open proposition as being assumed to be on the hearer's mind.

Interestingly, there is no marking of an open proposition even in the description of the second group of mice. Presumably, this is a matter of personal choice and style, for clearly a Topicalization in this sentence would be felicitous:

(16) She had an idea for a project. She's going to use three groups of mice. One, she'll feed them mouse chow, just the regular stuff they make for mice. Another, she'll feed [ei] veggies. And the third she'll feed junk food.

That is, it would seem that, once the intent with respect to the first group has been described, the speaker is warranted in taking for granted that the hearer understands that it is a feeding experiment and therefore has the open proposition in 17 on his/her mind:

(17) **Open proposition:** She'll feed another (\(\in\) {the three groups of mice}) X.
**Instantiation:** X = veggies

However, this was not the information structure chosen by this speaker; rather, she waited until after the intent with respect to the second group of mice was described to take for granted that the hearer understood that it was a feeding experiment.

Let us now turn to 9f, which provides another interesting situation in which to compare Topicalization and 'Poset' Left-Dislocation. The triggering of the set relation inference, shared by both constructions, is clear: *Mee Grob* is seen as evoking a member of some set of which *crispy rice* also evokes a member, in fact the set of Thai dishes available at the restaurant being discussed. But now consider 18, modifications of 9f:
(18)  a. "My father loves crispy rice," says Samboon, "so we must have it on
the menu. And Mee Grob\textsubscript{i} he loves [e\textsubscript{i}] just as much." Mee Grob
($4.95) is a rice noodle...

   b. "My father loves crispy rice," says Samboon, "so we must have it on
the menu. #And Mee Grob, too\textsubscript{i}, he loves [e\textsubscript{i}] just as much." Mee
Grob ($4.95) is a rice noodle...

In 18a, the 'Poset' Left-Dislocation has been turned into a Topicalization and the too
has been removed. I believe that the discourse is still coherent, with the following
information structure for the Topicalization:

(19) \textbf{Open proposition:} He loves Mee Grob (∈ \{Thai dishes\}) to-X-degree.
\textbf{Instantiation:} X = just as much/the same/equally

Now consider 18b. With the \textit{too} present, a Topicalization seems infelicitous. This
would be predicted, however, on the basis of the information structure:

(20) \textbf{Open proposition:} He loves Mee Grob (∈ \{Thai dishes\}) too/the
same to-X-degree.
\textbf{Instantiation:} X = just as much/the same/equally

That is, Topicalization, being a focus-presupposition construction, forces us to
understand the sentence in terms of a salient shared open proposition and a new
instantiation, where the new instantiation corresponds to the tonically stressed
constituent in the clause. The only candidate for the new information in 18b is \textit{just as much},
given the prosody it must have. However, with \textit{too} in the open
proposition, the instantiation is redundant to the point of infelicity\textsuperscript{12}. To see that
this is true, consider the infelicity of 21:

(21)  a. "My father loves crispy rice," says Samboon, "so we must have it on
the menu. #And Mee Grob, too\textsubscript{i}, he loves [e\textsubscript{i}] less." Mee Grob ($4.95)
is a rice noodle...

   b. "My father loves crispy rice," says Samboon, "so we must have it on
the menu. #And Mee Grob, too\textsubscript{i}, he loves [e\textsubscript{i}] more." Mee Grob
($4.95) is a rice noodle...

If the instantiation is redundant, i.e. if the new information is already in the
presupposed open proposition, then there is no motivation for using a
Topicalization. In contrast, a 'Poset' Left-Dislocation imposes no such information-
structuring into old and new and is therefore felicitous in this case.

2.2.3. 'Poset' Left-Dislocation: Summary.
In sum, then, 'Poset' Left-Dislocations serve a discourse function whereby they
trigger an inference that the entity represented by the initial NP is related by a salient
partially-ordered set relation to some entity already in the discourse-model. This is identical to one of the two (simultaneous) functions of Topicalization; where 'Poset' Left-Dislocation differs is that it is not a focus-presupposition construction, that is, that it does not share the second function of Topicalization.

2.3. Function 3, Amnesty an island-violation: 'Resumptive pronoun' LDs.
A third type of Left-Dislocation appears to be the result of an attempt to produce a syntactically impossible Topicalization, where the pronoun is of the 'resumptive' type, occurring instead of the illicit gap. First, let us consider the analogous and better known case of such a phenomenon, resumptive pronoun relative clauses; consider 22:

(22) a. 'There are always guests\textsubscript{i} who I am curious about what they\textsubscript{i} are going to say.' (Dick Cavett)
   b. 'The only one\textsubscript{i} we could see her\textsubscript{i} figure was Number 2.' (Kitty Carlisle, To Tell the Truth, 9/8/81)
   c. 'Let's get to our first guest\textsubscript{i}, who I asked for [e\textsubscript{i}] and was so delighted that he\textsubscript{i} could make it.' (Orson Wells, Tonight Show)

The sentences in 22 contain relative clauses with resumptive pronouns instead of gaps. As is well known (Langendoen 1970, Kroch 1981, Sells 1987, among others), such resumptive pronoun relative clauses occur in spontaneous speech when the extraction would violate an island constraint. Thus, the gapped versions of 22 are impossible, as shown in 23:

(23) a. *There are always guests\textsubscript{i} who I am curious about what [e\textsubscript{i}] are going to say.
   b. *The only one\textsubscript{i} we could see [e\textsubscript{i}]’s figure was Number 2.
   c. *Let's get to our first guest\textsubscript{i}, who I asked for [e\textsubscript{i}] and was so delighted that [e\textsubscript{i}] could make it.

Following Kroch 1981, resumptive pronoun relative clauses like those in 22 are means that speakers have when they have gotten themselves into an impossible situation, having begun a relative clause that cannot be completed grammatically. Thus he calls them ways of 'amnestying island constraints'.

Whether sentences like those in 22 are acceptable but ungrammatical (Langendoen 1970, Kroch 1981, Sells 1987) or in fact grammatical (Kayne 1981, Newmeyer 1991) is not relevant here. What is relevant is the fact that they occur and their possible implications for Left-Dislocation. In particular, is it the case that some occurrences of Left-Dislocation are in fact resumptive pronoun versions of Topicalization, where an extraction would be impossible due to an island constraint? Consider 24:

(24) A: You bought Anttila?
   B: No, this is Alice Freed's copy.
A: My copy of Anttila\textsubscript{i} Henry has [ei].

The Topicalization in 24 is felicitous: the entity represented by the initial NP is a member of the set \( \{ \text{copies of Anttila} \} \), another member of which has just been evoked, and, as shown in 25, the open proposition, 'X has my copy of Anttila (\( \in \{ \text{copies of Anttila} \} \))', is appropriately on the hearer’s mind at this point in the discourse, given that she has just said something equivalent to I have Alice Freed’s copy of Anttila.

(25) Open proposition: X has my copy of Anttila (\( \in \{ \text{copies of Anttila} \} \))
Instantiation: X = Henry

But now consider 26:

(26) a. GC: 'You bought Anttila?'
   EP: 'No, this is Alice Freed’s copy.'
   GC: 'My copy of Anttila\textsubscript{i} I don’t know who has it\textsubscript{i}.'
   b. *?My copy of Anttila\textsubscript{i} I don’t know who [ei].

(27) Open proposition: X has my copy of Anttila (\( \in \{ \text{copies of Anttila} \} \))
Instantiation: X = I don’t know who

In 26a, informationally equivalent to 24 in all the relevant respects, we find in fact not a Topicalization but a Left-Dislocation, a Topicalization being difficult if not impossible, as seen in 26b, due to the problem of extracting from the wh-island. Now, 26a may in fact be a bona fide 'Poset' Left-Dislocation. However, given the facts about relative clauses noted above, we must conclude that the apparent Left-Dislocation in 26a may equally well be a Topicalization, with a resumptive pronoun occurring in place of the impossible gap. Note that all cases of 'Resumptive Pronoun' Left-Dislocations would be indistinguishable from 'Poset' Left-Dislocations, since all involve poset inferences triggered by the initial NP, whereas 'Resumptive Pronoun' Left-Dislocations are eminently distinguishable from 'Simplifying' Left-Dislocations, the latter not involving poset inferences.

3.0. Topics for further study.
Finally, a number of issues suggest themselves for further study, which I simply note.

3.1. Left-Dislocation and prosody.
First, the possibly distinguishing role of prosody has already been mentioned and should be investigated. I believe it would be particularly fruitful to compare the prosody of 'Poset' and 'Resumptive pronoun' Left-Dislocation with that of Topicalization, illustrated above, and the prosody of 'Simplifying' Left-Dislocation with that of sentences like Lambrecht’s (1988) 'syntactic amalgams', exemplified in
28a, and 'run-ons', exemplified in 28b:

(28)  
  a. I have a friend of mine in the history departmenti [Ø] [ei] teaches two courses per semester. (= Lambrecht 1988, ex. 9)  
  Compare: A friend of mine in the history departmenti, hei teaches...  
  b. There are many Americansi theyi approve of violence. (= Lambrecht 1988, ex. 37c)  
  Compare: Many Americansi, theyi approve of violence.

3.2. 'Poset' Left-Dislocation and Initial N'.
'Simplifying' Left-Dislocation may in fact be distinguished syntactically from both 'Poset' and 'Resumptive pronoun' Left-Dislocation, i.e., from those involving poset inferences, in that the latter may occur with an initial N', as in 29, whereas I have found no instances of 'Simplifying' Left-Dislocation with less than an initial NP; in fact, replacing the initial NP with an N' in actually occurring 'Simplifying' Left-Dislocations produces infelicity, if not ungrammaticality, as seen in 30:

(29)  
  a. [Speaker has been married four times before the present husband]  
     "The first time was 1968, just to get out of my dad’s house," she says. Second guyi, I just met himi and didn't have anything else to do. Didn't work out... Third and fourth times were business partners. We got married for business reasons." (Philadelphia Inquirer, 4-J, 7/3/88)  
  b. 'I was just raised an old hillbilly and I’ll die one. Radioi, iti’s sitting up there, but I can't hear too good. Don't have a television.' (Terkel 1974:40)

(30)  
  a. It's supposed to be such a great deal. #Guyi, when he came over and asked me if I wanted a route, hei made it sound so great. Seven dollars a week for hardly any work. And then you find out the guy told you a bunch of lies.  
  b. My sister got stabbed. She died. Two of my sisters were living together on 18th Street. They had gone to bed, and this man, their girlfriend’s husband, came in. He started fussing with my sister and she started to scream. #Landladyi, shei went up, and he laid her out. So sister went to get a wash cloth to put on her...

Interestingly, note that such instances of N' representing alternate members of a salient set are not limited to Left-Dislocation, so long as they are initial. Thus, in 29a, we find an initial N' representing the next alternate member of the salient set of husbands (Third and fourth times...), although the syntax is apparently canonical. In contrast, in 29b, where the next alternate member is represented non-initially, it is represented by a full NP, not an N’ (...a television). Furthermore, Ward 1988 notes that Topicalization may occur with an initial N' where an NP would be expected, as illustrated in 31:
(31) C: 'What do you recommend?'
W: [pointing at another customer] 'He recommends the cheeseburger.'
C: 'Cheeseburger; it is [e1] then.'
W: 'Cheeseburger; it is [e1].' (Customer to waitress at L'il Pete's, Philadelphia, PA, collected by G. Ward)

This suggests that further study of possible relations between poset inferences and initial N’ might prove fruitful.

3.3. Analogous constructions with demonstratives and full NPs in situ.
Third, while we have considered as Left-Dislocations only those sentences with personal pronouns in situ, it should be noted that analogous constructions abound where the in situ constituent is a demonstrative or a full NP. Demonstrative Left-Dislocations in the corpus all involve poset inferences, i.e. are all 'Poset' or 'Resumptive pronoun' Left-Dislocations; they are illustrated in 32:

(32) a. P: 'So what you really come to is what we do. Let’s suppose that you and Haldeman and Ehrlichman and Mitchell say we can’t hold this? What then are you going to say? What are you going to put out after it? Complete disclosure, isn’t that the best way to do it?’
D: 'Well, one way to do it—' (PT, p. 116)
b. 'The difficulty is not in running a crane. Anyone can run it. But making it do what it is supposed to do, that’s the big thing.' (Terkel 1974:49)
c. 'To be or not to be, that is the question.' (Shakespeare, Hamlet, Act III, Scene I)
d. '...The reason I am taking up some of the bushes is to resoil. Mainly to check the roots to see if they are waterlogged. Only a couple have been shabby. I just get so much rain here. Do I need not water as often with clay bottom like I have? Not all the holes retain water that are dug right now. The ones that do I am going to take your advice and digg [sic] deeper in thoses [sic].' (DMcM, Prodigy Gardening BB, 12/7/92)

In 32a-c, as well as in most of the other demonstrative Left-Dislocations in the corpus, the leftmost constituent evokes a propositional entity, represented by a nominalization, as in 32a, or a nonfinite clause, as in 32b,c. This suggests that at least some Left-Dislocations with demonstrative pronouns in situ are distinguished from Left-Dislocations with in situ personal pronouns only in that the former refer to an event/state rather than to a (simple) entity. This in turn suggests that the in situ pronoun in Left-Dislocation is simply a discourse deictic, which is not surprising, and that demonstratives occur under the normal conditions for discourse deixis; see Webber 1991 and Gundel, Zacharski, and Hedberg 1992.13
However, not all in situ demonstratives refer to propositional entities, as seen in 32d above. But of course not all demonstratives in canonical sentences are instances of discourse deixis, either. Thus, while it seems clear that demonstratives are limited to poset-inference-inducing Left-Dislocations, a more precise statement of their distribution requires further research on the distribution of demonstratives in discourse in general.

In a different vein, alongside of in situ demonstratives, we find a whole range of situations where the construction looks like Left-Dislocation but where there is no coreferential in situ pronoun, personal or demonstrative. Some of these are illustrated in 33:

(33) a. 'Sirica, there was some indication that Sirica might be putting together a panel.' (J. Dean, PT, p. 83)
 b. '...Any questions that are not answered here, you can call the White House staff member and they will be directed to answer any questions on an informal basis.' (R. Nixon, PT, p. 147)
 c. [Discussion about Colson, referent of he, directed at Ehrlichman, referent of you] 'Haldeman, in this whole period, Haldeman, I am sure, [Bob and you] both of you talked to both of you about the campaign.' (R. Nixon, PT, p. 188)
 e. [Article about new Westinghouse contract giving employees’ unmarried pregnant daughters Blue Cross coverage] ‘...Frank Calabrese, vice president of the local, said yesterday, "Times are changing. These young kids anymore, marriage is going out of style, I guess."' (Philadelphia Evening Bulletin, p. 46, 7/23/76)14

In 33a, we find the simplest case, where the in situ constituent is a full NP, identical and coreferential with the initial constituent. In 33b, there is also a full NP in situ, but here it is an abbreviated version of the initial constituent.15 The situation in 33c is fairly complex, since there are several 'initial' constituents, but the relevant one is presumably the innermost one, Bob and you, and the in situ constituent is a coreferential complex NP, both of you. Finally, cases like 33d,e, which are in fact not at all uncommon, are formally the farthest of all from canonical Left-Dislocations in that they lack a coreferential in situ item. What they do have, however, is an in situ NP which evokes an entity which is inferentially related to the entity evoked by the leftmost constituent, either via a poset inference, as in 33d, or via a functional dependency inference, as in 33e. At the present time, constructions like those in 33 seem functionally indistinguishable from canonical Left-Dislocations containing in situ personal pronouns, but further research is required.
4. Summary.
In this paper, I have tried to show that what is taken to be a single syntactic form, Left-Dislocation, in fact has three separate functions, distinguishable on distributional (and possibly prosodic) grounds, and that these functions differ in type as well as substance. First, 'Simplifying' Left-Dislocations, which serve to simplify discourse processing by removing a Discourse-new entity from a position in the clause which favors Discourse-old entities, replacing it with a Discourse-old entity (i.e. a pronoun), can be seen as having a 'meta-discourse' function in that they facilitate the incrementation of the discourse-model under construction but do not affect the contents of that model. Second, 'Poset' Left-Dislocations, which serve to trigger an inference that the entity represented by the initial NP stands in a salient partially-ordered set relation to some entity or entities already in the discourse-model, have what I would call a true discourse function in that they signal substantive aspects of the discourse-model being constructed, in particular, poset relations among entities in that model. Third, 'Resumptive pronoun' Left-Dislocations, which serve to amnesty an island violation, can be understood as having a meta-sentential function, enabling the completion of a sentence that would otherwise be disallowed by the sentence-grammar. To return to our initial discussion of the function of syntactic form in a model of linguistic competence, I believe that we have seen that the situation is far richer and more sensitive to linguistic detail than an explanation of iconicity or common-sense reasoning would have us believe, leading us to wonder where an account of such functions might lie, if not in the realm of linguistic competence.
Notes

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1 The parse in 1 is intended merely to help the reader identify the construction under discussion and is not intended as a stand on the actual syntactic analysis of Left-Dislocation. In addition, as will be discussed below, it may well be that there is no functional reason, at least, for distinguishing personal pronouns in this position from demonstratives and even perhaps full NPs.

2 In fact, Keenan says that Left-Dislocations 'rarely appear in highly planned discourse' (Keenan 1977:21; emphasis EFP). If she is correct about their 'transitional', pre-syntactic, childlike nature, one wonders why they would appear at all in highly planned discourse.

3 Note that it is the definition of topic as 'initial constituent' that makes Halliday's treatment circular. If he presented an independent definition of topichood and if the occurrence of topics in initial position were simply an empirical finding, the account would of course be nonvacuous.

4 Throughout this paper, naturally-occurring examples are enclosed in single quotes; invented examples are not.

5 It should be pointed out that the leftmost occurrence of the guy in 3a evokes the first mention of this entity in this passage; the last sentence cited here contains the last mention of him.

6 I do not know whether the speaker of 5e has a warrant for assuming the interviewer knows of Aunt Katherine. If s/he does, then it is Hearer-old/Discourse-new; if not, then it is Inferrable. In either event, it is Discourse-new.

7 In fact, I suspect the significant generalization is that the entity represented by the initial NP is being introduced for the first time not necessarily in the discourse-model but in the current segment of the discourse-model. Further research is required on the interaction between discourse-structure and reference. See Polanyi and Martin 1993, among others.

8 Note that 9c contains two examples of Subject Pro-drop, common in many
informal registers of English (Schmerling 1973). In *Red Lion* [e] dug it years ago, the missing subject is unambiguously *I*; in *Sheer Eligance* [sic], [e] see a few in the shows..., the missing subject could be *I* or some Proarb, as in nonspecific you. *Sheer Eligance* is a misspelling of *Sheer Elegance*. I have not modified the spelling or punctuation of any of the naturally-occurring tokens.

9 A rather dramatic example of the use of Left-Dislocation in discussing multiple alternate members of a set, where no particular inference of contrast is intended or induced, is the following:

i. 'BUT [G], most of us in FL[orida] can garden year round. I have seen many on *P[rodigy]* from FL, yet none in this "Feeling Left Out" area except [DC] and myself. I wonder where they are all are? I haven't heard from [BMcM] for months, since before the hurricane in the Miami area. [BM] and [AO] from here in my same area, I heard from them a couple wks before we had our FL Get Together at Wekiva Springs, but not since. [AE] we know by other reports is around, so new to FL she is having fun shopping at all the nurseries. [RMK] which is a nurse in St Petersburg. [MD] in Jacksonville, he's on the board but not posted in this area, some I know might still be reluctant to write. [DD] I have [sic] heard from her in a while. [DS], I know he travels alot [sic] but he's from Ft Lauderdale area. [WS] from St Petersburg, [SN]-here in the Orlando area. [DR] from West Palm Beach. [FR] from Winter Haven, he was at the Get Together, but he could tell what a day that was...his family, myself and my son. Then [DS] and a friend showed up a few mins before it rained and the park emptied... [CH] is busy I know with Sierra Club work. I could go on with all the people I have met from FL here on *P*, and more added since the FL Get Together, but around 50 people. FL has many members on *P* too with what we call our Tropical Paradise... I call it different ways of gardening in one state, depending on where one is living. You move from east to west or north to south...its like trying to start in another state:> BUT its fun. CA[ifornia] is another state that has lots of members here on *P.* (ES, Prodigy Gardening BB, 11/24/92)

10 Interestingly, Geluykens 1992 notes with some puzzlement that some Left-Dislocations in his corpus seem to involve a listing rather than a contrastive set, but he fails to tie these together as reflexes of poset relations. Rather, he states (pp. 138f.) that my claim of Left-Dislocation as marking a set-relation (Prince 1985) is 'rather surprising' and is not borne out by his data.

11 The term Topicalization is used here to denote simply a syntactic form like that in 1 but with a gap instead of the in situ pronoun, as sketched in ii:

\[(ii) \quad [ \quad [X_i] \quad [ \quad \ldots[e_i]\ldots ] \quad ] \quad CP \quad NP_i \quad IP \quad NP_i \]
No relation to the notion 'topic' is here intended or, in fact, believed to exist, pace the many (unsupported) assumptions of their relation in the literature.

Of course, redundancy per se does not make for infelicity (Walker, In prep.); the problem in 18b is that what is redundant is overtly—and contradictorily—marked as new.

We also find Left-Dislocations where the initial constituent evokes a propositional entity but where there is a personal pronoun rather than a demonstrative in situ, illustrated in iii:

(iii) a. '...Women showing up in pants, it wasn’t ladylike. Hot pants are in now.' (Terkel 1974:76)
   b. 'If we had proper compensation we wouldn’t have to work 17 hours a day and following the crops. We could stay in one area and it would give us roots. Being a migrant, it tears the family apart. You get in debt... ' (Terkel 1974:38)

For those unfamiliar with this usage, 33e contains an occurrence of the regional 'positive anymore'; see Sag and Hindle 1975.

As I understand this discourse, the in situ any questions is coreferential with the initial any questions that are not answered here and are not interpretable as 'any questions at all'.

Interestingly, each of these three functions appears to be exemplified in Ross' original discussion. That is, 2a appears to be a 'Simplifying' Left-Dislocation in that it removes a heavy and therefore probably Discourse-new NP, the man my father works with in Boston, from subject position, 2b appears to be a 'Poset' Left-Dislocation in that it triggers poset inferences by enumerating the two members of a salient set, my father {my parents}, my mother {my parents}, and 2c appears to be a 'Resumptive pronoun' Left-Dislocation in that it may be amnestying an island violation: as Ross notes, the pronoun in situ cannot be a gap for syntactic reasons, my wife, her handbag.

Moreover, note that a closely related language, Yiddish, has a syntactic analog of Left-Dislocation of both the 'Poset' type and also the 'Resumptive pronoun' type, as well as a third, 'corelative', type (Keenan 1985) which English lacks, but Yiddish lacks an analog of the 'Simplifying' Left-Dislocation. Angelika Kratzer has noted (personal communication) that the same is true of Modern German. In a similar vein, Vallduví 1992 notes an unrelated function for the Catalán analog of Left-Dislocation. This gives us even stronger evidence that these form-function correlations cannot be explained by poor planning, as Chafe’s 'premature subject' claim and Keenan's ascription of Left-Dislocation to 'presyntactic' child language suggest, nor to an appeal to 'iconicity'.
References


Davison, A. 1984. Syntactic markedness and the definition of sentence topic. Language 60.4.797-847.


Shakespeare, W. 1601?. Hamlet.