ON ANTECEDENT-CONTAINED DELETION*

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0. Baltin (1987) deals with the process of ‘antecedent-contained deletion’, which was first noted by Bouton (1970). Baltin argues that what has been assumed to be ‘antecedent-contained deletion’ is actually not ‘antecedent-contained’ at all, and claims that antecedent-contained deletion cannot take place in principle. The aim of this note is to re-examine some of the basic facts he builds his argument on.

1. In sentence 1 (= Baltin’s 4), ‘antecedent-contained deletion’ appears to have taken place.

(1) Bill [hit the man who asked him to [______]].

The ‘deleted’ VP (the circled VP) appears to be contained in its antecedent VP (the boxed VP).

Baltin (1987) assumes that ‘string-vacuous’ Extraposition is operative in the derivation of ‘antecedent-contained deletion’ sentences such as sentence 1. After the application of Extraposition, the phrase structure for sentence 1 would look like 1’.

(1’)

* I am indebted to anonymous reviewers for making me reconsider some of the
Since the relative clause containing the ‘deleted’ VP is extrapoosed out of the antecedent VP and Chomsky-adjoined to it, the ‘deleted’ VP (the circled VP) is no longer contained in its antecedent VP (the boxed VP): thus sentence 1, he argues, is actually not an instance of antecedent-contained deletion.

Let us consider another example in Baltin 1987 (= Baltin’s 31).

(2) I persuaded everyone that I could ___ to be polite.

Before the application of Extraposition, the phrase structure for sentence 2 looks like 2'.

(2')

Sentence 2, Baltin claims, arises from a dual application of the rule of detachment, or Extraposition. One application moves the infinitival complement of persuade, adjoining it to the S; the other application adjoins the relative clause contained within the object of persuade to the VP. According to his account, the s-structure for sentence 2 would look like 2''.

(2'')

The ‘deleted’ VP (the circled VP) is not contained in its antecedent VP (the boxed VP) in 2''.

data which were crucial to my argument. I am grateful to participants of Tokyo University English Linguistic Circle, especially Noriko Imanishi, for useful discussion on this topic. Remaining errors and inadequacies are, of course, my own.
2. But is 2" really the correct phrase structure for sentence 2? Consider the following sentence.

(3) What I did was \([\text{VP persuade everyone that I could } \text{ to be polite}]\).

The acceptability of sentence 3 clearly shows that the infinitival complement of \textit{persuade} in sentence 2 is within the matrix \textit{VP}, and hence is not adjoined to the matrix \textit{S}.

Then what is the correct phrase structure for sentence 2? The infinitival complement of \textit{persuade} must be within the matrix \textit{VP}, as the grammaticality of sentence 3 shows. And in order to retain Baltin's claim that antecedent-contained deletion cannot take place, the 'deleted' \textit{VP} must be outside its antecedent \textit{VP}. We might assume, then, that both the relative clause and the infinitival complement are extraposed and Chomsky-adjoined to the matrix \textit{VP}, as shown in 4.

(4)

\[
\begin{array}{c}
\text{S} \\
\text{VP} \\
\text{NP} \\
\text{I} \\
\text{V} \\
\text{persuaded} \\
\text{everyone} \\
\end{array}
\quad
\begin{array}{c}
\text{S'} \\
\text{Comp} \\
\text{to be polite} \\
\text{NP} \\
\text{S'} \\
\text{e} \\
\text{that} \\
\text{NP} \\
\text{Infl} \\
\text{VP} \\
\text{I could} \\
\text{e} \\
\end{array}
\]

Note that the infinitival complement of \textit{persuade} is within the matrix \textit{VP} in 4. Note also that the 'deleted' \textit{VP} (the circled VP) is not contained in its antecedent \textit{VP} (the boxed \textit{VP}).

3. But how is this phrase structure 4 to be derived? One possible derivation is to extrapose the relative clause first, and then the infinitival complement of \textit{persuade}. But consider the intermediate stage given in 5, where the relative clause has already been extraposed, while the infinitival complement is still in its original position.

(5) ?I persuaded everyone \[\text{to be polite [that I could]}\].

Sentence 5 seems less acceptable than sentence 2, if not totally unacceptable. But if we are to assume this derivation, sentence 5 involves

\[\text{Note that this sort of Extrapolation results in lower acceptability regardless of whether or not 'antecedent-contained deletion' is involved.}\]

(i)  a. I persuaded everyone [that I met] to be polite.
    b. ?I persuaded everyone \[\text{to be polite [that I met]}\].
only one ‘gap-filler’ dependency, while sentence 2 involves two ‘crossing’
gap-filler dependencies, as shown below.2

\[
\begin{align*}
(5) & \quad \text{I persuaded everyone } e \text{ to be polite that I could} \\
(2) & \quad \text{I persuaded everyone e e that I could to be polite}
\end{align*}
\]

Under this derivation, sentence 2 should be more ‘complex’ than 5, and it
would be hard to explain why 5 is less acceptable than 2. Hence this
derivation seems implausible, unless there is some independent reason
that the intermediate stage 5, from which a perfectly well-formed sen-
tence 2 is to be derived, should be lower in acceptability.

The above argument is rendered less convincing by the fact that the
difference in acceptability of sentences 2 and 5 is not very striking. But
consider the following sentence, in which the infinitival complement in
sentence 2 is replaced with a that-clause complement.

\[
\begin{align*}
(6) & \quad \text{I persuaded everyone that I could that he should be polite.}
\end{align*}
\]

Now if we are to assume the same sort of derivation for sentence 6, we
would have to derive 6 from 7, which corresponds to 5 in the above
derivation of sentence 2.

\[
\begin{align*}
(7) & \quad \text{?*I persuaded everyone that he should be polite [that I could].}
\end{align*}
\]

Sentence 7, from which the well-formed sentence 6 is to be derived,
seems almost incomprehensible, even though, along the same line of
argument as given above, 7 is supposed to be less ‘complex’ than 6 under
this derivation. Thus, this sort of derivation seems even less plausible
for sentence 6, which is similar in phrase structure to sentence 2.

4. Returning to the derivation of sentence 2, what if we extrapose the
infinitival complement first, and then the relative clause? After the in-
finital complement is extraposed, the following phrase structure would
be derived.

\[
\begin{align*}
(5) & \quad \text{I persuaded everyone } e \text{ to be polite that I could} \\
(2) & \quad \text{I persuaded everyone e e that I could to be polite}
\end{align*}
\]

\[\text{Under this derivation, sentence 2 should be more ‘complex’ than 5, and it would be hard to explain why 5 is less acceptable than 2. Hence this derivation seems implausible, unless there is some independent reason that the intermediate stage 5, from which a perfectly well-formed sentence 2 is to be derived, should be lower in acceptability.}\]

\[\text{The above argument is rendered less convincing by the fact that the difference in acceptability of sentences 2 and 5 is not very striking. But consider the following sentence, in which the infinitival complement in sentence 2 is replaced with a that-clause complement.}\]

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\begin{align*}
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\[\text{Sentence 7, from which the well-formed sentence 6 is to be derived, seems almost incomprehensible, even though, along the same line of argument as given above, 7 is supposed to be less ‘complex’ than 6 under this derivation. Thus, this sort of derivation seems even less plausible for sentence 6, which is similar in phrase structure to sentence 2.}\]

\[\text{4. Returning to the derivation of sentence 2, what if we extrapose the infinitival complement first, and then the relative clause? After the infinitival complement is extraposed, the following phrase structure would be derived.}\]
Now in order to derive phrase structure 4 from 8 by extraposing the relative clause, we must move the relative clause to the front of the already extraposed infinitival complement, as shown by the arrow in 8. But is this a possible landing site for the constituent to be extraposed to?

Baltin's (1987) formulation of Extraposition (or detachment) is given in 9 (=Baltin's 24).

\[
\begin{array}{c}
\text{(9) } \{\text{S'}\} - \text{X} \\
\{\text{pp}\}
\end{array}
\]

\[1 \rightarrow 2 \rightarrow 2 \rightarrow 1\]

Given this formulation of Extraposition, the rule would move the relative clause to the VP-final position, not to the front of the already extraposed infinitival complement. Hence we would get sentence 10, not sentence 2.

\[
\text{(10) } ?\text{I persuaded everyone to be polite that I could.}
\]

5. We have shown that there would be no plausible way of deriving the correct phrase structure for sentences like 2 if we are to retain Baltin's assumption that 'string-vacuous' Extraposition is always operative in the derivation of 'antecedent-contained deletion' sentences. Since Baltin's argument depends crucially on this assumption, the facts and arguments given in this note constitute a piece of evidence against his claim that antecedent-contained deletion does not exist. It is left for further research to clarify the exact nature of this process of 'antecedent-contained deletion'.
REFERENCES