

Copula/Auxiliary Comparisons in African American and Impaired Standard American English

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INTRODUCTION

The valid identification and description of language impairment in children who speak African American English (AAE) has been a major clinical challenge for over 30 years. This challenge centers on the issue of “deficit” versus “difference” for language features that contrast with Standard American English (SAE).

The distinction between “deficit” and “difference” in identifying language disorders in child African American English speakers is the key to valid language assessment in AAE.

Most syntactic targets in SAE are presumably invariable while many syntactic targets in AAE are variable. For example, the SAE target syntactic form for the copula “is” would be represented by “He is bad”. Whereas that same production in AAE might yield either “He is bad” or “He_bad”. Our research focuses on how one determines if a child AAE speaker who uses “He_bad” does so as a function of dialect, not impairment.

Theoretical Framework

The primary theoretical premise underlying this research is that there are linguistic constraint variables for African American English (AAE) that determine whether a particular linguistic form will be present or absent.

In this study we attempt to identify some specific linguistic contexts in which a particular linguistic form will be present or absent in child speakers of African American English

Based on our research, linguistic profiles can be described for several features of child AAE. Our focus for this poster presentation is on copula and auxiliary verb forms and their allomorphs (is, are, and am). Pre- and post-phonetic contexts were examined as possible constraint conditions favoring the retention of copula and auxiliary. In addition, we will comment on “was” and “were”.

Research Method

Copula and auxiliary forms were examined from an existing database of language samples on 22 typically developing (TD) five-year-old speakers of AAE (funded by NIDCD-(01DC8-2104). Additional language samples of 5 SAE speaking children with specific language impairment (SLI) were used for comparison with the existing database. Language samples for the five SAE speakers with SLI were obtained from the Child Language Data Exchange System (CHILDES) (Leonard corpus).

Data about AAE constraints were obtained from audio-visually recorded language samples and narrative stories. Three 1/2 hour samples were taken during the first semester of the child's kindergarten year. The first sample was conversational between the examiner and the child; the second involved the child and one classmate interacting; and the third involved a narrative.

The language samples were transcribed by judges who were trained in transcription procedures and as listeners of AAE features. Utterances containing target forms were transcribed phonetically and then coded according to a taxonomy designed specifically for our research purposes.

The Leonard SLI corpus was coded and entered into a computer database in the same manner as the AAE corpus. All children in the SLI group met SLI inclusion criteria as described by Leonard (CHILDES, 1995).

The constraint analysis was restricted to pre- and post-phonetic constraints. Also, only pre or post constraint contexts that reached an 80% level are represented. Although an arbitrary criterion, this 80% level represents contexts that are most favorable to retention given that most morpho-syntactic AAE features are retained at a level lower than 80%.

Also, constraints analysis are less meaningful when forms are either produced above 90% or below 50%, since all constraint contexts would be either overwhelmingly favorable to retention or not so. Thus, no constraint analysis was applied in these instances, but the >90% and <50% conditions were noted.

Research Questions:

1. Do AAE(TD) and SAE(SLI) differ in their production of copula and auxiliary forms?
2. Are there specific constraints that condition the retention of copula and auxiliary forms and are these constraints similar for AAE (TD) and SAE (SLI)?

Results

Answer to Research Question 1: AAE(TD) and SAE(SLI) differ in their production of copula and auxiliary forms. The following shows the percentages of retention of copula and auxiliary forms between the two groups.

Auxiliary

•“are”: 62% (N=55) AAE-TD vs 17% (N=12) SAE-SLI

•“is”: 81% (N=134) AAE-TD vs 12% (N=77) SAE-SLI

•“am”: 94% (N=320) AAE-TD vs 38%(N=21) SAE-SLI

•“was”: 96% (N=310) AAE-TD vs (N=0) SAE-SLI

•“were”: 95% (N=54) AAE-TD vs (N=0) SAE-SLI

See Figures 1 & 2

Copula

•are:	70% (N=99) AAE-TD	vs	12% (N=54) SAE-SLI
• is:	84% (N=943) AAE-TD	vs	29% (N=310) SAE-SLI
•Am	98% (N=85) AAE-TD	vs	27% (N=15) SAE-SLI
•was:	96% (N=506) AAE-TD	vs	100% (N=3) SAE-SLI
•were:	97% (N=53) AAE-TD	vs	(N=0) SAE-SLI

See Figures 1 & 2

Answer to Research Question 2. There were specific constraints that conditioned the retention of copula and auxiliary forms?

The following results shown in Tables 1 and 2 represent pre- and post-phonetic contexts in which 80% criterion was reached and were based on a minimum frequency occurrence for each constraint context of 10.

Table 1. Pre-phonetic constraint contexts for copula and auxiliary forms	
<p><u>AAE-TD</u> <u>“Is” Cop</u> /t/: 93% (N=523) TD /n/: 86% (N=35) TD /r/: 82% (N=119) TD</p>	<p><u>SAE-SLI</u> <u>“Is” Aux and Cop</u> Retention below 50%</p>
<p><u>“Are” Aux and Cop</u> None at 80% Criterion</p>	<p><u>“Are” Aux and Cop</u> Retention below 50%</p>
<p><u>“Am” Aux and Cop</u> Retention above 90%</p>	<p><u>“Am” Aux and Cop</u> Retention below 50%</p>
<p><u>“Was/Were” Aux and Cop</u> Retention above 90%</p>	<p><u>“Was/Were” Aux and Cop</u> Retention below 50%</p>

Table 2. Post-phonetic constraint contexts for copula and auxiliary forms	
<u>AAE-TD</u> <u>“Is” Aux</u> /k/: 87% (N=30) TD <u>Is cop</u> /vowels/:85% (N=337) /g/: 95% (N=17) /m/:87% (N=53) /r/:83% (N=30) /th-voiced/:87% (N=87%)	<u>SAE-SLI</u> <u>“Is” Aux and Cop</u> Retention below 50%
<u>“Are” Cop</u> /th-voiced/ 98% (N=20)	<u>“Are” Aux and Cop</u> Retention below 50%
<u>“Am” Aux and Cop</u> Retention above 90%	<u>“Am” Aux and Cop</u> Retention below 50%
<u>“Was/Were” Aux and Cop</u> Retention above 90%	<u>*“Was/Were” Aux and Cop</u> Retention below 50% (except for Cop “was”).

* There were 3 copula “was” productions that were all retained. However, this number was too small for a constraint analysis.

Discussion and Clinical Implications

- Both AAE-TD and SAE-SLI children failed to retain overall copula and auxiliary “is” and “are” forms at levels typical of SAE speaking children of comparable age.
- The levels of retention of “is” and “are” for AAE-TD should be attributed to dialect since these levels differed greatly from the clinical group (SAE-SLI) (See Figure 1).
- There were specific contexts where AAE-TD children retained copula and auxiliary “am”, “was”, and “were” forms at levels typical of SAE children of comparable age, whereas SAE-SLI children did not (See Figure 2).

- Copula and auxiliary “am”, “was” and “were” are strong diagnostic markers for AAE in that they are not expected to be absent (see Figure 2).
- There are pre- and post-phonetic constraint conditions that favor the retention of “is” and “are”, which can have diagnostic implications. An elicitation of copula “is” when preceded by a /t/ is more likely than when preceded by an /m/. Similarly, an auxiliary “is” is more likely when followed by a /k/ than by a /g/ (see Figure 3).

Summary

In summary, our findings showed that both TD(AAE) and SAE-SLI children delete copula and auxiliary “is” and “are,” but at very different frequency rates. It is this frequency rate difference that provides insight into the “difference” versus “deficit” distinction. Speakers differed in their overall productions of copula and auxiliary. More specifically, AAE(TD) speakers deleted the copula and auxiliary “is” and “are” less frequently than SAE speakers with SLI. There were specific pre-phonetic contexts that predicted when the copula “is” was present or absent for child AAE speakers. Also, the contrast between groups in rate of retention for “am,” “was” and “were” suggest that these forms may be diagnostic among AAE speakers, i.e., they can differentiate AAE-TD from AAE-SLI.

One important question that remains to be answered from further research is whether these differences are a function of contrasts between AAE and SLI or whether the SLI children were simply showing delayed language forms. If the latter, then a younger group of AAE speakers may perform similarly to the SLI group. Nevertheless, this question does not discount the importance of the observed differences in profiles of typically developing AAE children and the SLI children.

Auxiliary and Copula 'is' and 'are'

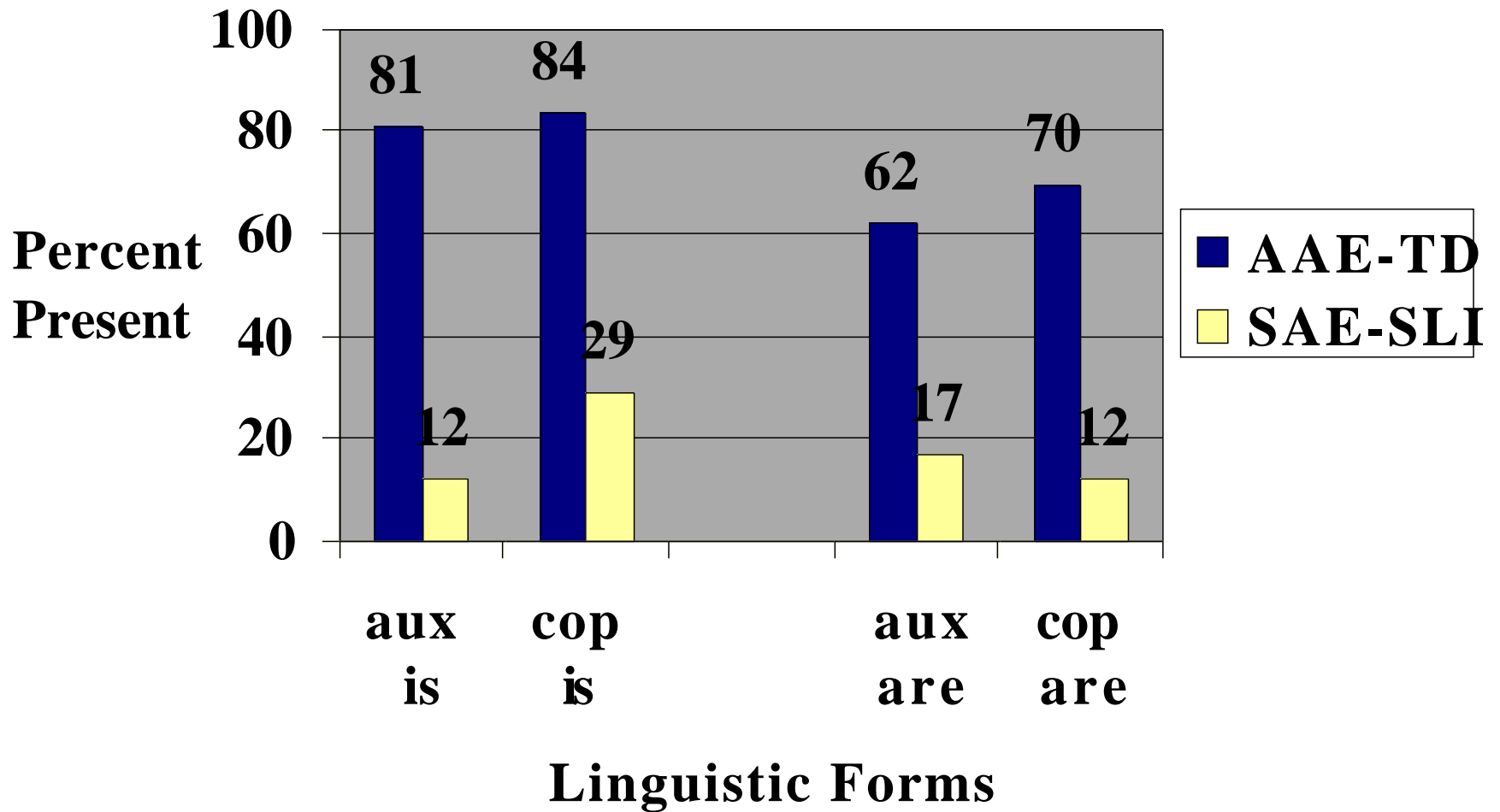


Figure 1

Retained Copula and Auxiliary in AAE

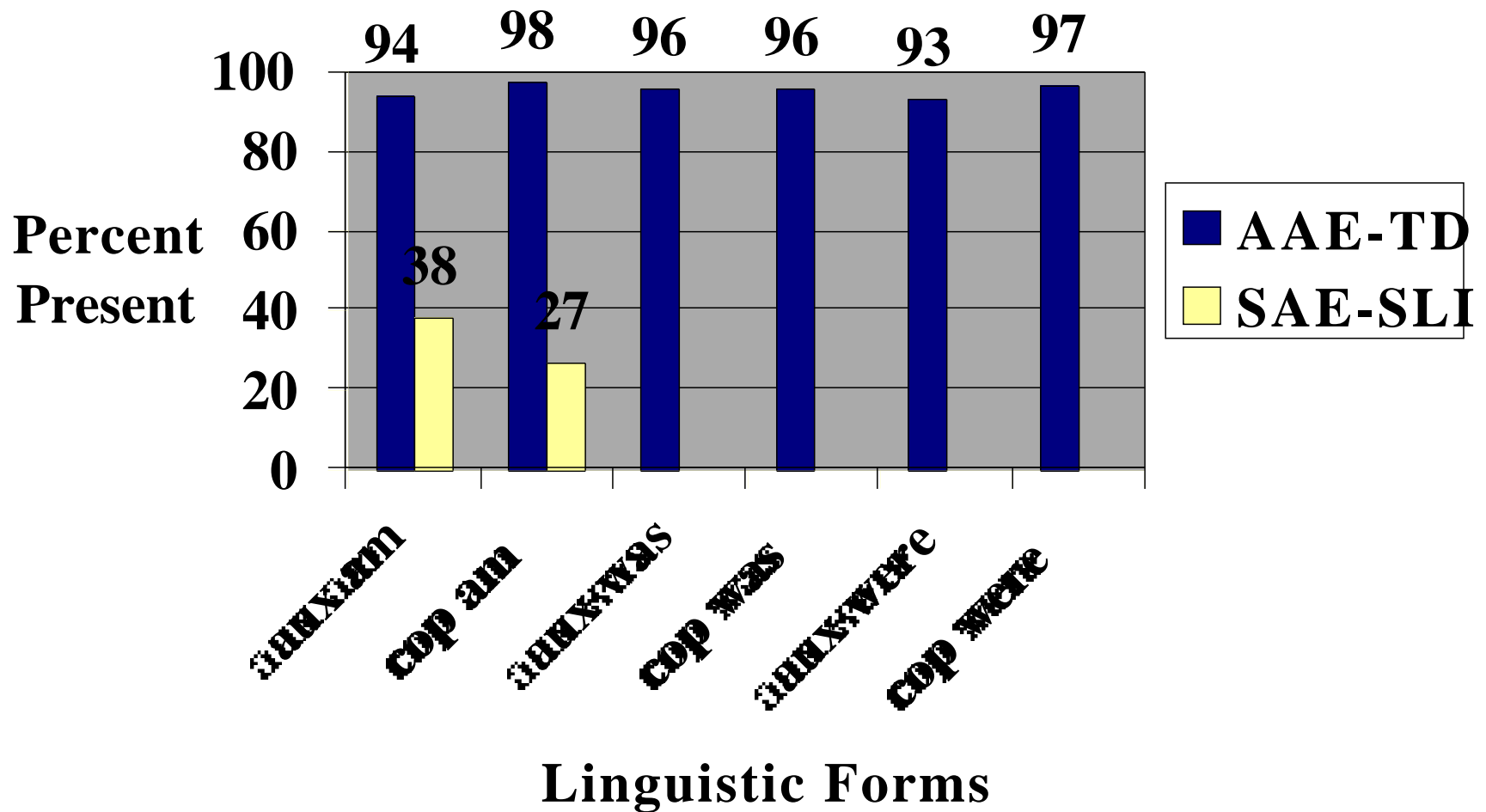


Figure 2