

Exhaustivity Marking in Hausa: A Reanalysis of the Particle *nee/cee**

1. Introduction

Hausa focus constituents are often accompanied by the particle *nee* or its feminine counterpart *cee*. The literature usually describes this particle as a focus marker. Green (1997:29) mentions that the particle leads to an exhaustive interpretation of the focus but does not further develop this idea. In this article, we take up Green's observation and show that *nee/cee* always indicates exhaustivity. Our reanalysis of the particle is based on several observations showing that *nee/cee* does not share most of the typical properties of grammatical focus markers. It is *similar* to focus markers in being focus-related. It *differs* from them in at least three respects: First, it is optional, even if focus is not marked by other strategies. Second, it can associate with the focus at a distance, an untypical property of focus markers. Third, if present, the particle *nee/cee* has a semantic impact in form of a conventional implicature: it causes an exhaustive interpretation of the focus. It is therefore excluded in non-exhaustive environments such as mention-some contexts, or in contexts where a property is known to hold of more than the focused entity.

2. Focus in Hausa

Hausa¹ is a tone language with three lexical tones: a high tone, which is not marked in the examples, a low tone (˘), and a falling tone (^). Its basic word order is SVO. The uninflected verb is preceded by a separate morpheme that encodes temporal, aspectual and agreement specifications (the *auxiliary*). In the perfective and continuous aspects, the auxiliary has two different morphological forms, depending on whether some constituent of the sentence is fronted (Tuller 1986). We follow the traditional terminology and call the auxiliary in clauses without fronting the *absolute* auxiliary. In clauses with fronting we refer to it as the *relative* auxiliary.

Hausa has two strategies to express focus. A focus constituent can be fronted (*ex situ* focus), or it can remain in its base-position (*in situ* focus). *Ex situ* focus (cf. Tuller 1986, Green 1997, Newman 2000, Jaggar 2001,

Hartmann & Zimmermann t.a.) is multiply marked: It is syntactically marked through fronting. In addition, it is morphologically marked since syntactic fronting triggers the relative auxiliary. The fronted focus constituent can be followed by the particle *nee* (or its feminine form *cee*). Finally, focus fronting is prosodically marked by an intonational phrase boundary between the *ex situ* constituent and the rest of the clause (cf. Leben, Inkelas and Cobler 1989). An example for *ex situ* focus is given in (1), with the focus printed in bold face.² Here, as in most other examples, focus is pragmatically controlled for by means of question-answer pairs.

- (1) Q: Mèe su-kà kaamàa?
 what 3pl-rel.perf catch
 ‘What did they catch?’
 A: **Kiifii** (nèe) su-kà kaamàa.
 fish PRT 3pl-rel.perf catch
 ‘They caught FISH.’

In situ focus, on the other hand, is not marked morpho-syntactically (Jaggar 2001, 2004, Green and Jaggar 2003, Hartmann & Zimmermann t.a.). Due to the absence of focus movement, the auxiliary appears in its absolute form. *In situ* focus is also not marked prosodically. Furthermore, it is only rarely accompanied by the particle *nee*, which is often shortened to *ne* in sentence-final position. (2) gives a typical question-answer pair. Since *wh*-phrases are almost always fronted, the relative auxiliary occurs in the question. In the answer, however, the focus (*kiifii*, ‘fish’) is not moved hence the auxiliary is absolute. There is no formal indication of the focus in the answer at all, which can therefore only be determined pragmatically.

- (2) Q: Mèe su-kà kaamàa?
 what 3pl-**rel**.perf catch
 ‘What did they catch?’
 A: Su-n kaamà **kiifii**.
 3pl-**abs**.perf catch fish
 ‘They caught FISH.’

While *ex situ* focus is restricted to maximal projections, *in situ* focus is possible with any constituent (heads and maximal projections alike), with the exception of subjects. If a subject is focused, the auxiliary must be relative, indicating *ex situ* focus. This is illustrated in (3).

- (3) Q: Wàa ya-kèe kirà-ntà?
 who 3sg-rel.cont call-her
 ‘Who is calling her?’
- A: [NP **Dauda**] (nèe) ya-kèe / *ya-nàa kirà-ntà.
 D. PRT 3sg-**rel**.cont / 3sg-**abs**.cont call-her
 ‘DAUDA is calling her.’

Our analysis of the distribution and meaning of the particle *nee/cee* diverges from the opinion held in the recent literature on focus in Hausa, where it is proposed that *nee/cee* is a focus marker (Green 1997, 2004, Newman 2000). Since *nee/cee* always appears together with focus, this analysis seems to be plausible at first glance. There are three arguments against this position, however. In a nutshell: Assuming that focus markers are required to mark the focus, the optionality of *nee/cee* is unexpected (section 3). Second, the frequency of the particle considerably differs between *ex situ* and *in situ* focus: *nee/cee* freely associates with *ex situ* focus, but is quite restricted with *in situ* focus. Given that, at least with question-answer-focus, the *in situ* strategy is the prominent strategy (for a quantitative study of *in situ* and *ex situ* focus, cf. Hartmann & Zimmermann t.a.), the rare occurrence of *nee/cee* in these cases would be unaccounted for if it was indeed a focus marker. Finally, the semantic behaviour of *nee/cee* is untypical of focus markers: it always appears in exhaustive environments (section 4). From these considerations, we conclude that *nee/cee* is not a focus marker, but a focus-sensitive exhaustivity marker.

3. Syntactic Properties of *nee/cee*

In this section, we further investigate the syntactic distribution of *nee/cee*. We first discuss the particle after *ex situ* focus and then turn to its more restricted occurrence with *in situ* focus.

3.1 *Ex Situ* Focus

It is well-known from the literature on Hausa that the particle *nee/cee* is focus-related, i.e. that it only appears if a constituent is focused. (Parsons 1963, Schachter 1966, Tuller 1986, Green 1997, Newman 2000, Jaggar 2001, Green and Jaggar 2003, Hartmann & Zimmermann t.a.). The particle

can occur after a fronted focus. The following examples illustrate subject focus (4ab), object focus (4c), PP focus (4d), and (nominalised) VP focus (4e) (examples (4ade) are from Newman 2000: 187ff.).

- (4) a. [NP **Dèelu**] cèe takèe sôn àgoogo.
 D. PRT 3sg.fem.rel.cont want watch
 ‘DEELU wants a watch.’
- b. [NP **Kànde da Hàwwa**] nee sukà zoo.
 K. and H. PRT 3pl.fem.rel.perf come
 ‘KANDE AND HAWWA came.’
- c. [NP **Àgoogo**] nèe Dèelu takèe sô.
 watch PRT D. 3sg.fem.rel.cont want
 ‘Deelu wants A WATCH.’
- d. [PP **Dà wuƙaa**] nèe ya sòokee shì.
 with knife PRT 3sg.rel.perf stab him
 ‘He stabbed him WITH A KNIFE.’
- e. [VP **Biyà-n hàƙaaji-n**] nee Tankò ya yi.
 paying-GEN taxes-DET PRT T. 3sg.rel.perf
 make
 ‘It was PAYING THE TAXES that Tanko did.’

The particle has a tonal peculiarity in that it always carries polar tone, i.e. a tone opposite to the preceding tone (cf. Parsons 1963:166). We further assume that the particle *nee/cee* is formally unspecified: it neither carries a tense specification, nor is it specified for agreement features, with the exception of gender. Only with feminine singular noun phrases is gender specified and *cee* is used instead of *nee* (4a). In all other cases, e.g. with masculine NPs (see (1), (3) and (4c)), plurals (including coordinated feminine NPs (4b)), PPs (4d), and VPs (4e), *nee* must occur (cf. Parsons 1963).

Hausa scholars usually analyse *nee/cee* after *ex situ* focus as an emphatic marker (Schachter 1966) or as a focus marker (cf. Tuller 1986, Green 1997, Green 2004, Newman 2000, Jaggar 2001, Green and Jaggar 2003). Given the existence of focus markers in a large variety of other African languages (see Bearth (1999) for an overview), this assumption is not far-fetched. Green (1997) represents the most elaborate analysis of focus in Hausa. In her account, *nee/cee* is the head of a focus phrase (FP). Provided with focus features, the particle attracts the focus phrase to its specifier:

- (5) [FP [NP Bintà_F] [F' [F cee [S t_{subj} ta-kèè biyà teelà]]]]
 B. PRT 3sg.f.rel.cont pay tailor
 'BINTA payed the taylor.'

All analyses acknowledge that the particle is optional. The examples in (4) are equally grammatical in the absence of *nee/cee*. In other words, the presence of *nee/cee* is not obligatory for focus marking. It is still optional if there is no word order variation, e.g. with focused subjects, which appear in the same linear position as unfocused subjects. The only indication of subject focus in (6) is the relative auxiliary. Again, the particle is optional:

- (6) **Tankò** (nee) **ya** biyà hàřaaji-n.
 T. PRT 3sg.rel.perf pay taxes-DET
 'TANKO payed the taxes.'

Recall from section 2 that the absolute-relative distinction within the auxiliary paradigm is only attested in the perfective and continuous aspect. In the future and habitual aspect, the auxiliary has the same form independent of focus fronting. If *nee/cee* was a focus marker, one might expect it to be obligatory when focus is not marked by other morpho-syntactic means (word order, relative auxiliary), such as subject focus in the subjunctive, future, and habitual aspect. However, *nee/cee* may be absent even then. (7) illustrates subject focus in the future aspect.³

- (7) Q: Wàanee nèe⁴ zâi tàfi Jamùs?
 who PRT fut.3sg go Germany
 'Who will go to Germany?'
 A: **Audù** zâi tàfi Jamùs.
 Audu fut.3sg go Germany
 'AUDU will go to Germany.'

In light of these data, the hypothesis that the particle *nee/cee* is a focus marker appears to be unwarranted. Its possible absence in sentences with no other morpho-syntactic signs of focus marking suggests that the prime function of the particle is not that of a focus marker. In section 4, we present an alternative analysis showing that the presence of *nee/cee* adds a conventional implicature, which leads to an exhaustive interpretation of the focus. We will argue that the particle is a focus-sensitive exhaustivity marker, rather than a syntactic focus marker.

3.2 *In Situ* Focus

In section 2, we pointed out that focus constituents do not have to be fronted, but may remain in their base position. *In situ* focus is quite frequent, it even represents the predominant focus-strategy for new-information focus (cf. Hartmann & Zimmermann t.a.). In addition, we argued that *in situ* focus need not be marked at all.

Concerning the particle *nee/cee*, it is optional with *in situ* foci, too, although it seems to occur much less frequently with these. If *nee/cee* appears, it generally follows the *in situ* focus (Jaggar 2001:497). There seem to be two positions for *nee/cee* with *in situ* focus. The particle can either appear in the sentence-final position (8-A1), or it appears “at the end of the core sentence but before adverbial adjuncts or complements”, cf. (8-A2) (Newman 2000:546).

- (8) Q: Mèenee nèe Tánko ya sàyaa à kàasuwaa?
 what PRT T. 3sg.rel.perf buy at market
 ‘What did Tanko buy at the market?’
 A1: Tankò yaa sàyi [NP **kàazaa**][PP à kàasuwaa] nè.⁵
 T. 3sg.abs.perf buy chicken at market PRT
 A2: Tankò yaa sàyi [NP **kàazaa**] nèe [PP à kàasuwaa].⁶
 ‘Tanko bought CHICKEN at the market.’

Notice that the particle does not have to be adjacent to the *in situ* focus, see (8-A1) where the particle follows the locative adverbial which belongs to the informational background.

In the following, some further examples are presented that provide more evidence for the two particle positions with *in situ* focus. First, when the right edge of the focus extends to the right periphery of the clause, *nee/cee* has to appear in clause-final position. This is shown for *in situ* object focus (9), locative focus (10), predicate focus (11) and sentence focus (12).

- (9) Q: Mèenee nèe Audù ya sàyaa?
 what PRT A. 3sg.rel.perf buy
 ‘What did Audu buy?’
 A: Audù yaa sàyi [NP **zoobèe**] ne.
 A. 3sg.abs.perf buy ring PRT
 ‘Audu bought a RING.’

- (10) Q: (A) *inaa nèe Tankò ya sàyi kiifii?*
 where PRT T. 3sg.rel.perf buy fish
 ‘Where did Tanko buy fish?’
 A: *Tankò yaa sàyi kiifii [pp à kàasuwaa] nè.*
 T. 3sg.abs.perf buy fish at market PRT
 ‘Tanko bought fish AT THE MARKET.’
- (11) Q: *Mèe Hàwwa ta yi?*
 what H. 3sg.fem.rel.perf do
 ‘What did Hawwa do?’
 A: *Hàwwa taa [vp yankà naamàa] ne.*
 H. 3sg.fem.abs.perf cut meat PRT
 ‘Hawwa CUT THE MEAT.’
- (12) Q: *Mèe ya fàaru?*
 what 3sg.rel.perf happen
 ‘What happened?’
 A: *[ip Muusaa yaa yi minì màganàa] ne.*
 M. 3sg.abs.perf make me speech PRT
 ‘MUSA TALKED TO ME.’

The particle can also follow an *in situ* focus in non-final position, cf. (8-A2), as well as (13):

- (13) Q: *Mèenee nèe màkaanikèe ya gyaaràa à gaañeeji?*
 what PRT mechanic 3sg.rel.perf repair at garage
 ‘What did the mechanic repair at the garage?’
 A: *Màkaanikèe yaa gyaaràa [NP mootàr] nee à gaañeeji.*
 mechanic 3sg.abs.perf repair car PRT at garage
 ‘The mechanic repaired the CAR at the garage.’

In addition, *nee/cee* can associate with the focus at a distance, as already observed in connection with (8-A1). A further example is given in (14).

- (14) Q: *Wàacee cèe ka ganii à makañantar?*
 who.fem PRT 2sg.rel.perf see at school
 ‘Whom did you see at school?’

A: Naa gaa [_{NP} **Dèelu**] à makařantar nè.
 1sg.abs.perf see D. at school PRT
 ‘I saw DELU at school.’

The fact that the particle does not have to follow the focus immediately corroborates our conclusion from section 3.1 that *nee/cee* is not a typical focus marker. Grammatical markers are usually adjacent to the constituent they mark.

We would like to propose that the position of the particle is not primarily determined syntactically (as in Green (1997)), but follows from prosodic requirements instead: *Nee/cee* always occurs before a prosodic phrase boundary.⁷ In Hausa, there are obligatory phrase boundaries between an *ex situ* focus constituent and the rest of the clause, and between the direct object and subsequent embedded clauses and/or adverbials (cf. Leben, Inkelas and Cobler 1989).⁸ As it happens, these are exactly the positions where *nee/cee* appears. It goes without saying that the end of a sentence also demarcates a prosodic boundary, hence the occurrence of clause-final *nee/cee* is predicted here, too. That the particle is sensitive to its prosodic environment receives further support from the fact that it is sensitive to another phonological property of the preceding material, i.e. its tone. Recall that *nee/cee* has polar tone, i.e. a tone with opposite direction to the preceding one.

Note that there is no prosodic phrase boundary between the verb and the object NP in transitive sentences. It is therefore not surprising that *nee/cee* is banned from this position. This restriction holds even if the verb is narrowly focused. Such cases are illustrated in (15) and (16). If the particle is present, it must appear after the direct object.⁹

(15) Q: Mèenee nèe màkaanikèe ya yi wà mootàr à gaarèejì?
 what PRT mechanic 3sg.rel.perf do with car at garage
 ‘What did the mechanic do with the car at the garage?’

A: Màkaanikèe ya [_V gyaarà] (*nee) [_{NP} **mootàr**] (nee) à gaarèejì.
 ‘The mechanic REPAIRED the car at the garage.’

(16) Q: Mèe Tanko ya yi wà hàraajì-n?
 what T. 3sg.rel.perf do to taxes-DET
 ‘What did Tanko do with the taxes?’

A: Tanko yaa [_V **biya**] (*nèe) hàraajìn (ne).
 ‘Tanko PAID the taxes.’

The examples in (15) and (16) suggest a close structural relationship between the verb and the object. It might seem unexpected that verb focus does not lead to a restructuring of the prosodic structure, as it happens for instance in some Bantu languages (Kanerva 1990). But recall from section 2 that *in situ* focus is absolutely unmarked, even prosodically. Hence, *in situ* focus has no repercussion on the prosodic structure in Hausa, and the tight connection between verb and object remains even under verb focus.

Nee/cee may also occur after the indirect object in double object constructions and before the direct object, cf. (17). On a prosodic account, this is expected given that “there is typically a phrase boundary between the two objects of double object constructions” (Inkelas & Leben 1990:19).

- (17) Q: Wàacee cèe Ìbrahìm ya bai wà kud’ii?
whom.fem prt I. 3sg.rel.perf give to money
‘To whom did Ibrahim give the money?’
A: Ìbrahìm yaa bai wà **tsoohuwersà** nee kud’ii.
I. 3sg.abs.perf give to mother PRT money
‘Ibrahim gave the money to his MOTHER.’

We conclude this section with a further observation. A clause-final particle is incompatible with *ex situ* focus. Such examples are consistently judged ungrammatical. This is shown for *ex situ* subject and object focus:

- (18) Q: Wàanee nèe ya zoo?
who PRT 3sg.rel.perf come
‘Who came?’
A: ***Audù** ya zoo **nè**.
A. 3sg.rel.perf come PRT
‘AUDU came.’
- (19) Q: Mèenee nèe Harúuna ya kaawoodàgà Jamùs?
what PRT H. 3sg.rel.perf bring from Germany
‘What did Haruna bring from Germany?’
A: ***Reediyò** Harúuna ya kaawoo (dàgà J.) **ne**.
radio H. 3sg.rel.perf bring from G. PRT
‘Haruna brought a RADIO from Germany.’

Our language consultants unanimously agreed that (18A) and (19A) are only grammatical as yes-no questions where the final particle functions as a question tag.¹⁰ A declarative reading of these sentences is not available. At present, the source of this additional restriction is mysterious to us. The data in (18) and (19) appear to fall neatly under the syntactic account proposed by Green (1997) in (5): As *nee/cee* heads the FP, it must be right-adjacent to the fronted focus constituent in Spec,FP. On the other hand, Green's analysis does not easily account for the sentence-internal occurrences of *nee* with *in situ* focus in (13) and (15). We will leave this matter open for further research.

To summarise, Hausa has a particle *nee/cee* which optionally appears after the focus constituent, whether *in situ* or *ex situ*. The properties of the particle described in the present section lead us to assume that it does not behave like a typical focus marker. Typical focus markers, as employed in many other African languages, are obligatory. They consistently mark the focus in a sentence. The particle *nee/cee*, on the other hand, is optional even if focus is not marked by any other means. Moreover, it can associate with the focus at a distance. This property is typical of focus-sensitive particles, but not of grammatical focus markers. We conclude that focus in Hausa does not imply the presence of *nee/cee*. Rather, the reverse holds: if *nee/cee* occurs, a focus must occur to its left. Since such a dependency on focus is typical of focus-sensitive particles, we conclude that *nee/cee* is a focus-sensitive particle, rather than a focus marker.

4. *Nee/Cee* as a Focus-Sensitive Exhaustivity Marker

As we concluded in the last section, the distribution of *nee/cee* is not primarily determined by structural factors. Instead, we will argue that its occurrence is motivated by semantic considerations alone. More precisely, we show that the presence of *nee/cee* introduces a conventional implicature triggering an exhaustive focus interpretation.

4.1 Green's (1997) Observation

In her dissertation, Green (1997) observes a semantic distinction between cases of focus fronting where *nee/cee* is present and cases where it is ab-

sent. Usually, a sentence containing a focus may be followed by an after-clause that introduces an alternative to the focus constituent. This is shown for Hausa in (20) (from Green 1997:29). The fronted focus *à kân teebùr* ‘on the table’ is extended in the afterclause by another PP. Such an extension is illicit if the fronted focus is followed by *nee*. If *nee* is present, the focus receives an exhaustive interpretation: A focus constituent is interpreted exhaustively if the property denoted by the backgrounded part of the clause holds of the entity denoted by the focus constituent, and only of this entity. With respect to (20), this means that the books are put on the table *and nowhere else*.

- (20) **À kân teebùr** (*nee) su-kà sâ littàttàfai,
 upon table PRT 3pl-rel.perf put books
 dà kuma **cikin àkwàati**.
 and also inside box
 ‘They put the books on the table, and also inside the box.’

Green (1997) accounts for this observation by treating *nee/cee* as an exhaustive focus marker. In the following sections, we provide new data that corroborate Green’s claim that *nee/cee* adds exhaustivity to the semantic interpretation. As pointed out above, though, we analyse *nee/cee* as a focus sensitive exhaustivity marker, rather than as a focus marker proper. In what follows, we therefore gloss the particle as EXH for *exhaustivity marker*.

4.2 *Nee/cee in Non-Exhaustive Contexts

The data discussed in this section have in common that the focused entity is not the only one satisfying the property denoted by the background, to the effect that an exhaustive interpretation of the focus becomes impossible. This is achieved by adding an afterclause in which the same backgrounded property is predicated of an alternative value. In all such contexts, the particle *nee/cee* is illicit.

Notice first that we were able to reproduce the facts discussed in (20). If the focus in the main clause is followed by *nee/cee*, extension by an *also*-phrase is excluded. The presence of *nee/cee* excludes all focus alternatives except the focused entity itself. In (21A), *nee* forces the interpretation that nobody else apart from Musa returned from Kano. Similarly in (22), no

additional individuals may be added to the denotation of the predicate satisfying the focused object, if this is followed by *cee*.

- (21) Q: Wàa ya daawoo dàgà Kano?
 who 3sg.rel.perf return from Kano
 ‘Who returned from Kano?’
 A: #Musa nèe ya daawoo dàgà Kano
 M. EXH 3sg.rel.perf return from Kano
 dà kuma Haliimà cee ya daawoo dàgà Kano.
 and also H. EXH 3sg.rel.perf return from Kano
 ‘MUSA returned from K. and HALIMA, too, returned from K.’
- (22) Hàwwa (#cèe) mu-kà ganii.
 H. EXH 1pl-rel.perf see
 Kuma mu-n ga Haliimà dà Dèelu.
 also 1pl-perf see H. and D.
 ‘We saw HAWWA, also we saw Halima and Deelu.’

The examples in (20) to (22) show that the meaning component introduced by *nee/cee* cannot be cancelled. This suggests that *nee/cee* introduces a conventional implicature in the sense of Karttunen & Peters (1979).

Second, *nee/cee* is illicit when the focus denotes in a domain that is explicitly introduced as containing more than the focused entity, as illustrated in the following examples. If, as in (23a), a pluralic group is introduced (*mutàanee dà yawàa* ‘many people’), a focus with *nee* cannot pick a unique individual from this group (23b). In the absence of *nee*, the focused entity can be one among others in the denotation of the predicate. This is emphasised by the possibility of the additive particle *maa* ‘also’.

- (23) a. Naa san mutàanee dà yawàa
 1sg.perf know people many
 dà su-kà sayar dà àyàbà à kàasuwaa.
 that 3pl-rel-perf sell banana at market
 ‘I know many people that sold bananas at the market.’
 b. Maalàm Shehù #née / (maa) ya sayar dà àyàbà.
 Mr. S. EXH also 3sg.rel.perf sell bananas
 ‘MR. SHEHU *nee* / (also) sold bananas.’

Assuming that *nee/cee* is an exhaustivity marker, the infelicity of (23b) with *nee* follows directly: The presence of *nee* in this sentence indicates that the property under discussion, i.e. the selling of bananas, only holds of a unique individual. This is in contradiction with the plural group introduced in (23a).

Thirdly, *nee/cee* is also illicit in mention-some environments. Consider the following context and the subsequent question-answer pair.

- (24) Context: Musa knows that many students have passed last year's exam. In order to prepare for this year's exam, Musa wants to talk to one of them beforehand. (He has no time to talk to all of them). Unfortunately, Musa does not know who passed the exam, but he does know that his friend Amadu knows everybody who passed. Therefore Musa addresses Amadu in the following way:

M: Kaa san wad'andà su-kà ci jaĩr̀àb̀awaa?
 you know who.pl 3pl-rel.perf eat exam
 'Do you know who passed the exam?'
 A: Ìi, d̀ag̀a ciki Ùmarù #nee/maa ya ci jaĩr̀àb̀awaa.
 yes from among U. EXH also 3sg.rel.perf eat exam
 'Yes, among them UMARU passed the exam.'

Amadu mentions to Musa one of the students that passed the exam last year. In the answer, he cannot use the exhaustivity particle *nee* after the focused subject since this would entail that only *Umaru* and nobody else passed. This would contradict the contextual condition that both, Musa and Amadu, know that many students were successful in the exam.

The infelicity of *nee/cee* in mention-some contexts can be mended by means of accommodation: the property under discussion is specified in such a way that it will apply to a unique individual, in congruence with the exhaustivity requirement. Reconsidering Amadu's answer again, the per se infelicitous presence of *nee* can trigger an accommodation such that the property under discussion is not only that of passing the exam, but that of passing it in a special way, e.g. with the highest or lowest score etc. This property can now apply to the unique individual Umaru, as shown in (24') (context as in (24)):

(24') M: Kà fàɗaa minì: Wàa ya ci jār̀ràbâwaa?
 2sg.subj tell me who 3sg.rel.perf eat exam
 'Tell me: Who passed the exam?'

A: Ûmarù nee ya ci jār̀ràbâwaa.
 Umar EXH 3sg.rel.perf eat exam
 'UMAR passed the exam (with the highest/lowest score etc.)'

A similar observation holds with respect to example (23). Below is a slightly extended context, which is followed by a question-answer pair.

(25) Context: Maalam Haruna wants to buy bananas at the market. He knows that there are many people selling bananas, but not who exactly. He does not have much time and only wants to get the name of one of them. Therefore he asks his friend Maalam Shehu:

H: Kaa san waɗàndà su-kèe sayar dà àyàbà?
 2sg.masc know who.pl 3pl-rel.cont sell bananas
 'Do you know who sells bananas?'

S: Ìi, dàgà ciki **Hamiidù nee** ya-kèe sayar-waa.
 yes from among Hamidu EXH 3sg-rel.cont sell-NMLZ
 'Yes, among them HAMIDU *always/certainly* sells bananas.'

Again, *nee* may follow the focused subject in Mr. Shehu's answer, even though an exhaustive focus interpretation contradicts the mutual knowledge of Haruna and Shehu that many people sell bananas at the market. And again, the presence of *nee* can be licensed by accommodation, leading to an inherent quantification over times. It is understood that among all the banana-sellers at the market, Hamidu *always* sells bananas. Thus, we are faced with a methodological problem to be reckoned with: Due to the possibility of accommodation, native speakers will often judge *nee/cee* in mention-some contexts as acceptable.

4.3 Inferences Based on (Strong) Exhaustivity

The following example is a variation of (24). Recall that the context given required a non-exhaustive interpretation of the focus. Accordingly, *nee/cee* was illicit (without accommodation).

- (26) Context: A student *D'* (as in *d̄aalibii* 'student') who is anxious that he might have failed a test approaches teacher *M* (as in *maalàamii* 'teacher') and asks: 'Can you tell me whether I have passed or not?' Unfortunately, teachers are by law forbidden to tell a student directly about *his* or *her* result. However, there is no law forbidding them to talk about other students' performances.

D': (Koo) naa ci jaĩr̀r̀àb̀àwaa?
 Q 1sg.perf eat exam
 'Have I passed the exam?'
 M: Bà z̄â-n gaỳà mak̀à ba
 NEG FUT-1sg tell you NEG
 àmmaa **Mus̀à (nee)** bà-i ci jaĩr̀r̀àb̀àwaa ba.
 but M. PRT NEG-3sg eat exam NEG
 'I will not tell you, but MUSA (nee) has not passed the test.'
 → with *nee*: D' can *assume* that he has passed.
 → without *nee*: D' cannot find out anything about himself.

The context in (26) allows for *nee* in the answer in principle. However, the amount of information differs depending on whether or not the teacher decides to use the particle. If the particle is absent after the focus constituent *Musa*, the student learns about Musa's result, but he cannot draw any conclusions concerning his own score. If the particle is present, the student can deduce that he passed the exam in the following way: Since the particle marks the focus as exhaustive, Musa must be the only student who did not pass. The student *D'* can therefore infer that he must have passed the test, although this is not explicitly asserted. If *nee/cee* was an optional focus marker, there should be no asymmetry in interpretation between the two variations. More precisely, the presence of *nee/cee* should not allow an inference which is based on exhaustivity.

4.4 *Nee/cee* and Other Exhaustivity Markers

With adverbial exhaustivity markers, such as *kaẁài* 'just, only, merely, simply', *kađ̀ài* 'only, alone', or *sai* 'only, just, except', *nee/cee* is typically or often (Newmann 2000:190, Jaggar 2001:511) omitted.

- (27) a. Sai **Gãba** mu-kà ganii.
 only Garba 1pl-rel.perf see
 ‘It’s only Garba we saw.’
 b. **Hakà** kawài zaa-kà yi.
 thus only fut-2sg do
 ‘That is just what you have to do.’

The analysis of *nee/cee* as an exhaustivity marker predicts the typical omission of *nee/cee* with adverbial exhaustivity markers on grounds of redundancy. When present, *nee/cee* can serve to reinforce *kawài* or *kadài* (Jaggar 2001:511). In contrast, an analysis of *nee/cee* as a plain focus marker leaves the highly restricted occurrence of *nee/cee* with other exhaustivity markers unexplained.

Even though the adverbial exhaustivity markers *kawài* or *kadài* ‘only’ and *nee/cee* have similar semantic effects, the two kinds of expressions are not identical in meaning. It shows that *nee/cee* is semantically weaker than the adverbial exhaustivity markers. Compare (26-M) above, with *nee* present, with (28-M), with *nee* replaced by *kawài*. According to our consultant’s judgments, the difference between the two answers is the following: (28-M) *asserts* that only Musa has not passed the exam, so that the student knows for sure that he has passed, while (26-M) (with *nee*) makes the student only *assume* that he must have passed.

- (28) D’: (Koo) naa ci jaĩr̀àb̀awaa?
 Q 1sg.perf eat exam
 ‘Have I passed the exam?’
 M: Bà zâ-n gayà makà ba àmmaa
 NEG FUT-1sg tell you.m NEG but
 Musà kawài bà-i ci jaĩr̀àb̀awaa ba.
 M. only NEG-3sg.m eat exam NEG
 ‘I will not tell you, but only MUSA has not passed the test.’
 → Student *knows for sure* that he has passed.

The difference in interpretation between the minimal pair (26-M) and (28-M) shows that the adverbials *kawài* and *kadài* introduce exhaustivity into the assertion as part of their truth conditions. The exhaustivity marker *nee/cee*, on the other hand, is weaker in that it does not add exhaustivity to the assertion. *Nee/cee* only adds a conventional implicature to this effect. It

therefore does not translate as ‘only’. (Often, it does not translate at all, which might also have led to the erroneous impression that it is a grammatical focus marker.) The presence or absence of *nee/cee* does not change the truth-conditions of clauses. However, if *nee/cee* is dropped, the exhaustivity effect disappears. This shows that the semantic effect is detachable. That the semantic import of a lexical item is not cancelable but detachable is a typical property of conventional implicatures. We therefore conclude that *nee/cee* triggers a conventional implicature.

Putting the results of this section together, we assume the following meaning of *nee/cee* (where S stands for the clause containing *nee/cee*):

- (29) $[[\textit{nee/cee S}] = [[S]] = p$ defined iff
- i. $[[S]]^f \neq \{ [[S]]^0 \}$ (\rightarrow focus-sensitivity)
 - ii. $\forall p' \in [[S]]^f : \neg p' \rightarrow p = [[S]]^0$ (\rightarrow exhaustivity)

Nee/cee is a propositional operator that denotes a partially defined identity function: When applied to an arbitrary clause denoting the proposition p, it gives back the value p iff (i.) S has a non-trivial focus value (i.e. contains a focus) and (ii.) the only focus alternative that is true is p. The first clause accounts for the focus-sensitivity of *nee/cee*, the second for the exhaustivity effect.

Finally, by comparing the paradigms of focus-sensitive particles in Hausa and English (or German) we observe that the Hausa paradigm is more complete. While English only has a truth-conditional focus particle with universal force (*only*), Hausa has both truth-conditional particles (*kawàì, kadàì*) as well as a non-truth-conditional particle (*nee/cee*) with universal force.

4.5 Summary

In this section, we have presented ample evidence in support of the claim, originally hinted at by Green (1997), that *nee/cee* is an exhaustivity marker. The presence or absence of *nee/cee* in a clause has semantic effects beyond the introduction of those presuppositions that are usually associated with focus: *Nee/cee* exhibits typical exhaustivity effects. First, it is infelicitous or highly marked when the context suggests non-exhaustivity of the focus domain. Second, it is typically left out in the presence of other exhaustivity

markers, such as *kawàì* or *kaɗàì* ‘only’. *Nee/cee* triggers an exhaustivity effect by means of a conventional implicature, and, unlike *only*, not as part of its truth-conditions. Finally, like exhaustivity markers in other languages, *nee/cee* is focus-sensitive, which accounts for its dependence on focus. Being focus-sensitive, *nee/cee* can associate with focus constituents at a distance, accounting for the non-adjacency with *in situ* foci (see also section 3.2). Altogether, these properties make an analysis of *nee/cee* as a purely grammatical focus marker highly implausible.¹¹

Finally, the optionality of the exhaustivity marker *nee/cee* with *ex situ* foci and in *wh*-questions, may have repercussions for the theory of focus and questions in general. First, the dependency of an exhaustive interpretation with *ex situ* foci on the presence of *nee/cee* shows that exhaustivity is not structurally encoded in Hausa. In this respect, Hausa differs from Hungarian, where, following Kiss (1998), exhaustive focus is always fronted. Second, the optionality of the exhaustivity marker *nee/cee* in *wh*-questions (see n.4 in section 3.1) suggests that *wh*-questions are not inherently exhaustive in Hausa. This is in contradiction to what has been claimed for questions in other languages by Groenendijk & Stokhof 1984, but in accordance with claims in Heim 1994 and Beck & Rullmann 1999.

5. Conclusion

In this paper, we have argued that - despite first appearances - the Hausa particle *nee/cee* is not a grammatical focus marker, but a focus-sensitive exhaustivity marker. The particle *nee/cee* does not exhibit typical properties of grammatical focus markers. Rather, its presence or absence is governed solely by semantic factors, while its syntactic distribution seems to depend on prosodic factors. However, since *nee/cee* is focus-sensitive its presence can serve as an indirect indicator for focus because focus-sensitive elements need a focus in order to be licensed. The lesson to be learnt is that not every grammatical formative that frequently co-occurs with focus constituents is best analyzed as a grammatical focus marker. From a cross-linguistic perspective, Hausa seems to differ from many other West African languages in that it does not have a grammatical focus marker. At the same time, our findings for Hausa should be tested against other instances of apparently optional focus markers in other African languages, in order to find out whether these elements are genuine grammatical focus markers, or not just focus-sensitive exhaustivity markers.

Notes

- * We would like to thank our Hausa consultants Dan Asabe, Balarabe Zulyadaini, Rabiu Shehu, Umar Ibrahim, Sa'adatu Garba, Aisha Mahmud, and Mu'awiya Jibir for their help and cooperation. Many thanks to Daniel Buring for his helpful comments and suggestions. This article was written within project B2 "Focussing in Chadic Languages" as part of the SFB 632 "Information Structure", funded by the German Science Association (DFG). We thank the participants of the international workshop "Topic and Focus: Information Structure and Grammar in African Languages", held in Amsterdam in December 2004, for comments on a preliminary version of this paper, as well as Lutz Marten and Florian Schwarz for comments on the present version.
- 1 Hausa is a Chadic language spoken primarily in northern Nigeria. The Chadic languages belong to the Afro-Asiatic family. With more than 35 million speakers, Hausa is the biggest representative of the Chadic group.
 - 2 We use the following abbreviations: 1,2,3 = person number markers, sg = singular, pl = plural, perf = perfective, cont = continuous, rel = relative, abs = absolute, fut = future, subj, = subjunctive, fem = feminine, masc = masculine, NEG = negation, NMLZ = nominalizer, PRT = particle, EXH = exhaustivity marker, DEF = definite
 - 3 Notice that subject focus in the aspects under discussion is marked prosodically by local High-tone raising, as is the case with all other instances of *ex situ* focus (cf. Leben, Inkelas and Cobler (1989). Given this, it could be argued that *nee/cee* is absent in (7A) because focus is marked prosodically after all.
 - 4 The question-pronouns for 'who' and 'what' can be either morphologically simple (*wàa, mène*), or they can be complex (*wàanee nèe, mèneene nèe*). In the latter case, they contain the particle *nee/cee*. If the particle occurs in the question, its presence in the answer seems to be obligatory.
 - 5 Note that the vowel of the particle is often shortened in clause-final position.
 - 6 The judgements of our language consultants, all L1 speakers living mostly outside of the Hausa heartland, varied considerably concerning the gender of the particle with *in situ* focus. Since *kàazaa* 'chicken' is feminine, some speaker preferred *cee* here. While *cee* is always obligatory with feminine singular *ex situ* focus, the picture is not so clear with *in situ* focus. We cannot offer an account for the gender variation other than contributing it to dialectal differences, cf. e.g. Abubakar (2001).

⁷ The prosodic unit that Leben, Inkelas and Cobler (1989) call an intonational phrase is referred to as *phonological phrase* in other approaches (cf. e.g. Nespor and Vogel 1986). The term *accent phrase* is also used sometimes, primarily for accent languages (e.g. Uhmann 1991).

⁸ The location of prosodic phrase boundaries can be tested by a number of prosodic processes the application or blocking of which is sensitive to their presence, cf. Leben, Inkelas and Cobler (1989:47-49).

⁹ A similar observation has been made with respect to the Hausa discourse particle *fa*. As Zec and Inkelas (1990:369ff) show, *fa* can only appear at intonational phrase boundaries and is also excluded after verbs.

¹⁰ Note that double occurrences of *nee/cee* in declarative sentences are equally ruled out. This is surprising given the possibility of multiple *wh*-questions in Hausa (i-Q), see also Green (1997:116), as well as the possibility to combine an *ex situ* with an *in situ* focus in the corresponding answer (i-A).

- (i) Q: Suwàa sukà ganii à ìnaa?
 who.pl 3pl.rel.perf see at where
 ‘Whom did they see where?’
 A: Muusaa (nèè) na ganii à kàasuwaa.
 M. PRT 1sg.rel.perf see at market
 ‘I saw MUSA at the MARKET.’

Double occurrences of *nee/cee* are expected to be grammatical as long as one particle follows the *in situ* focus. However, the only possible reading of such sentences is that of a yes/no question where the “*in situ* particle” is interpreted as a question tag, indicating a certain degree of uncertainty or suspicion:

- (ii) Muusaa **nèè** ya sha ruwaa **nèè**?
 M. PRT 3sg.rel.perf drink water Q
 ‘Musa drank water, (didn’t he)?’

not: ‘MUSA drank WATER.’ (as an answer to ‘Who drank what?’)

A tentative solution for the impossibility of double occurrences of *nee/cee* in declaratives would go as follows: Sentences with two instances of focus are marked and require strong contextual licensing, e.g. in form of multiple *wh*-questions (cf. i-Q). According to our consultants, the corresponding *wh*-question for (ii) *Who drank what?* has the strong presupposition that there are various people drinking various beverages. In section 4, though, we will argue that *nee/cee* triggers an exhaustivity implicature. As a result, the implicature of (ii), when interpreted as a declarative, would be that only Musa drank only water (and nobody else drank anything else). This implicature incompatible with the presupposition of the licensing question, ruling out (ii) as an answer.

¹¹ Note that *nee/cee* is always obligatory in predicative constructions where the particle is usually described as a copula verb (cf. McConvell 1973, Green 1997,

2004, Newman 2000, Jaggar 2001). (i) and (ii) illustrate for adjectival and nominal predicates:

- | | | | | | | | |
|-----|-----------------------|----------|------------------|------|--------------------|--------------|------------------|
| (i) | Teebūr | kanfanèe | *(nee). | (ii) | Nii | Bàtuurìyaa | *(cee). |
| | table | small | COP | | I | European.fem | COP |
| | 'The table is small.' | | | | 'I am a European.' | | |

The obligatory occurrence of *nee/cee* in predicative constructions can be derived from the fact that predicatives necessarily involve focus: In the standard case, a (new) property is predicated of a (given) entity (see Green 2004). The proposed analysis of *nee/cee* as an exhaustivity marker predicts that the property denoted by the predicate is the only property (under discussion) that holds of the subject. Further research has to show whether this prediction for predicative constructions holds in general.

References

- Abubakar, A. (2001). Isoglosses In Hausa Dialectology. In M. Kida Awak (ed.), *Maiduguri Journal of Linguistic and Literary Studies (MAJOLLS)* 3. 60-83.
- Bearth, T. (1999). The contribution of African linguistics towards a general theory of focus: Update and critical review. *Journal of African Languages and Linguistics* 20. 121-156.
- Beck, S. & H. Rullmann (1999). A Flexible Approach to Exhaustivity in Questions. *Natural Language Semantics* 7. 249-297.
- Green, M. (1997). *Focus and Copular Constructions in Hausa*. Ph.D. dissertation, SOAS, London.
- Green, M. (2004). *Predication, Equation and Information Structure: Evidence from Hausa Copular Sentences* Ms. University of Sussex.
- Green, M. & Jaggar, P. (2003). Ex-situ and in-situ focus in Hausa: syntax, semantics and discourse. J. Lecarme (ed.), *Research in Afroasiatic Grammar 2 (Current Issues in Linguistic Theory)*, Amsterdam: Benjamins. 187-213.
- Groenendijk, J. & Stokhof, M. (1984). *Studies on the Semantics of Questions and the Pragmatics of Answers*. Ph.D. dissertation, Universiteit van Amsterdam.
- Hartmann, K. & Zimmermann, M. (to appear). In Place - Out of Place: Focus in Hausa. To appear in K. Schwabe & S. Winkler (eds.) *On Information Structure, Meaning and Form*. Amsterdam: Benjamins.
- Heim, I. (1994). 'Interrogative Semantics and Karttunen's Semantics for Know', in R. Buchalla & A. Mittwoch (eds.), *IATL 1*. Jerusalem: Akademon. 128-144.
- Inkelas, S. & W.R. Leben (1990). Where phonology and phonetics intersect: the case of Hausa intonation. In J. Kingston & M. Beckman (eds.), *Papers in Laboratory Phonology I. Between the grammar and physics of speech*. Cambridge: Cambridge University Press. 17-34.
- Jaggar, P. (2001). *Hausa*. Amsterdam: John Benjamins.
- Jaggar, P. (2004). More on In Situ Wh- And Focus Constructions in Hausa. Ms., SOAS, London. To appear in: D. Ibriszimow, H. Tourneux & E. Wolff (eds) *Chadic Linguistics/Linguistique Tchadique/Tschadistik*, vol. 3. Cologne: Rüdiger Köppe.
- Kanerva, J. M. (1990). *Focus and Phrasing in Chichewa Phonology*. New York: Garland.

- Karttunen, L. & S. Peters (1979). Conventional Implicature. In C.-K. Oh & D.A. Dinneen (eds.), *Syntax and Semantics* 11. New York: Academic Press. 1-56.
- Kiss, K.E. (1998). Identificational Focus Versus Information Focus. *Language* 74. 245-273.
- Leben, W., S. Inkelas & M. Cobler (1989). Phrases and Phrase Tones in Hausa. In P. Newman & R. Botne (eds.), *Current Approaches to African Linguistics*. Dordrecht: Foris.
- McConvell, P. (1973). *Cleft Sentences in Hausa? A Syntactic Study of Focus*. Ph.D. dissertation. SOAS, London.
- Nespor, M. & I. Vogel (1986) *Prosodic Phonology*. Dordrecht: Foris.
- Newman, P. (2000). *The Hausa Language*. New Haven & London: Yale University Press.
- Parsons, F. W. (1963) The Operation of Gender in Hausa: Stabilizer, Dependent Nominals and Qualifiers. *African Language Studies IV*. SOAS, University of London. 166-207.
- Schachter, P. (1966). A Generative Account of Hausa *Ne/Ce*. *Journal of African Languages* 5. 34-53.
- Tuller, L. (1986). *Bijection Relations in Universal Grammar and the Syntax of Hausa*. Ph.D. dissertation. UCLA.
- Uhmann, S. (1991). *Fokusphonologie*. Tübingen : Niemeyer.
- Zec, D. & S. Inkelas (1990). Prosodically Constrained Syntax. In S. Inkelas & D. Zec (eds.) *The Phonology-Syntax Connection*. Chicago: CSLI. 365-378.