Gebregziabher, Keffyalew. 2013. Projecting possesors: A morphosyntactic investigation of nominal possession in Tigrinya. Doctoral Dissertation, University of Calgary.

Lecture 11

October 6, 2023

1 Introduction

Recall that Tigrinya has various means by which possession can be expressed in the nominal domain:
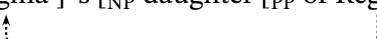
(1) *Prepositional Possessor Construction*

    a. naj təsfaj məts'ħaf
        of Tesfay book
        'book of Tesfay'

    b. naj joni gəza
        of John house
        'house of John'

(2) *Post-Nominal Possessor Construction*

    a. wəddi-t-i məmhir
        son-that-MS teacher
        'the teacher's son'

    b. ʕarki joni
        friend John
        'John's friend'

(3) *"Possessive Pronoun" Construction*

    a. nat-u   məts'ħaf
        POSS-3MS book
        'his book'

    b. ʔit-i   nat-a   məts'ħaf
        that-MS POSS-3FS book
        'the book of hers'

(4) *Suffixal Possessor Construction*

    a. məts'ħaf-u
        book-POSS.3MS
        'his book'

    b. məts'ħaf-əj
        book-POSS.1S
        'my book'

Gebregziabher (2012, 2013) is interested in demonstrating that the possessive strategies in (1) and (2) are derived via two independent syntactic structures.

The proposal presented in Gebregziabher 2012, which is refined and further articulated in Gebregziabher 2013, is as follows:

(3)   a. [$_{DP}$ ʔit-i   [$_{NP}$ nəj-t-i   məmhir [$_{NP}$ məts'ħaf]]]
            that-MS   NAJ-that-MS teacher   book
            'the book of the teacher'   (*Prepositional; Alienable*)

    b. [$_{DP}$ ʔit-a   [$_{NP}$ ħafti [$_{DP}$ ʔit-i   məmhir]]]
            that-FS   sister   that-MS teacher
            'the teacher's sister'   (*Post-Nominal; Inalienable*)

1

This is as opposed to a possible derivational approach to nominal possessive constructions in English:

(4) a. [$_{DP}$ the [$_{NP}$ daughter [$_{PP}$ of Regina]]]

     b. [$_{DP}$ [$_{DP}$ Regina] 's [$_{NP}$ daughter [$_{PP}$ ~~of Regina~~]]]

Our interest today is in the proposal made by Gebregziabher (2013:ch.4) regarding the syntax of the Post-Nominal Possessor frame in Tigrinya, which he refers to as the *Bare Possessive Nominal* (BPN).

Empirical Contribution. The empirical contribution of this chapter is a comparison of Tigrinya with the Construct State Nominal (CSN) in Hebrew and Arabic.

It is found that BPNs in Tigrinya share a number of properties with CSNs:

- **Head-Initialness :** The head noun precedes the genitive phrase.
- **Asyndeticity :** The relation between the head noun and genitive is not signaled by adpositions.
- **Strict Adjacency :** The head noun and genitive phrase are necessarily adjacent.
- **Obligation of Genitive Phrase :** The genitive phrase is obligatory in the Construct State syntax.
- **Word Formation :** There are structural and morphological similarities with compounding.

However, there are also certain properties that CSNs display that distinguish them from Tigrinya BPNs:

- **(In)alienability :** There is no (in)alienabiltiy restriction on the possessive relation.
- **(In)definiteness Spreading :** The (in)definiteness of the genitive phrase "spreads" to the entire nominal complex.
- **Bound Forms :** The head noun has a particular morphophonological form.

Theoretical Contribution. The theoretical contribution of Gebregziabher 2013:ch.4 is a theory of Tigrinya BPNs as CSNs that accounts for these properties.

The picture we are ultimately provided is one that can be sketched roughly as in (5):

(5) a.   b.
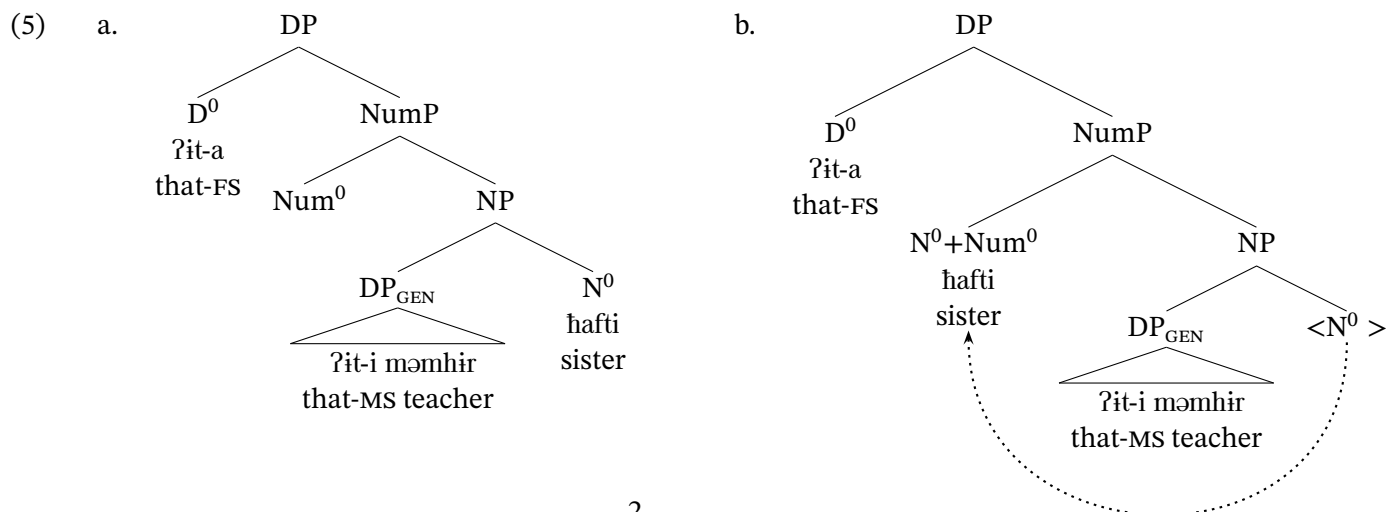
2 Similarities between Semitic CSNs and Tigrinya BPNs

This section introduces some of the characteristic properties of CSNs in Hebrew and demonstates that these properties hold equally in Tigrinya BPNs.

Head Initialness.   The head noun precedes the genitive phrase (Gebregziabher 2013:182-183, 190).

(6)   a. dodat ha-balʃan
         aunt the-linguist
         'the linguist's aunt'   (*Hebrew*)

(6)   b. bejt ha-mora
         house the-teacher
         'the teacher's house   (*Hebrew*)

(7)   a. hafti jəwhanɨs
         sister John
         'John's sister'   (*Tigrinya*)

(7)   b. dəkkʼi ʔɨt-om harəstot
         son.P that-MP farmer.P
         'the sons of farmers'   (*Tigrinya*)

Asyndeticity.   The relation between the head noun and genitive is not signaled by adpositions (Gebregziabher 2013:183, 190–191).

(8)   a. bejt ha-mora
         house the-teacher
         'the teacher's house   (*Hebrew*)

(8)   b. *bejt ʃel ha-mora
         house of the-teacher
         'the house teacher's house' (*Hebrew*)

(9)   ha-dira   ʃel ha-sar
      the-apartment of the-minister
      'the apartment of the minister'   (*Hebrew*)

(10) (*naj) wəddi (*naj) jəwhanɨs
      NAJ son   NAJ John
      'John's sister'   (*Tigrinya*)

(11) naj jəwhanɨs mətsʼhaf
      NAJ John   book
      'John's book'   (*Tigrinya*)

Strict Adjacency.   The head noun and genitive phrase are necessarily adjacent (Gebregziabher 2013:184, 191–193).

(12) a. bejt ha-mora   ha-gadol
         house the-teacher the-big
         'the teacher's big house' (*Hebrew*)

(12) b. *bejt ha-gadol ha-mora
         house the-big the-teacher
         'the teacher's big house' (*Hebrew*)

(13) a. [nəwahati [dəkkʼi harəstot]]
         tall.P   son.P farmer.P
         'tall sons of farmers'   (*Tigrinya*)

(13) b. *[dəkkʼi nəwahati] harəstot
         son.P tall.P   farmer.P
         'tall sons of farmers' (*Tigrinya*)

Obligation of Genitive Phrase. The genitive phrase is obligatory in the Construct State syntax (Gebregziabher 2013:184, 193).

(14) jaldej   *(ha-mora)
      children.CS   the-teacher
      'the teacher's children'   (*Hebrew*)

(15) [dəkk'i *(ħarəstot)] s'aʕramat ʔijj-om
        son.P   farmer.P   diligent.P be-S3MP
      'Sons of farmers are hardworking.'   (*Tigrinya*)

(16) [ħafti *(jəwħanis)] timali məts'iʔ-a
      sister   John   yesterday come-S3FS
      'John's sister came yesterday.'   (*Tigrinya*)

Word Formation. There are structural and morphological similarities with compounding (Gebregziabher 2013:186-187, 194).

(17) *Hebrew*
      a. beit   sefer   b. beit   xolim   c. beit   malxa
          house book   house sick.PL   house work
          'school'   'hospital'   'workshop'

(18) *Tigrinya*
      a. ħafti ʕinno   b. bet   timhirti   c. bet   mixri
          sister mother   house education   house advice
          'aunt'   'school'   'parliament'

3   Differences between Semitic CSNs and Tigrinya BPNs

(In)alienability. There is no (in)alienabiltiy restriction on the possessive relation (Gebregziabher 2013:188).

(19) a. dodat ha-balʃan   b. bejt   ha-mora
          aunt the-linguist   house the-teacher
          'the linguist's aunt'   (*Hebrew*)   'the teacher's house   (*Hebrew*)

Tigrinya BPNs express inalienable possessive relations.

(20) a. wəddi-t-i   məmhir   b. *məts'ħaf-t-i   məmhir
          son-that-MS teacher   book-that-MS teacher
          'the teacher's son'   (*Tigrinya*)   'the teacher's book'   (*Tigrinya*)

(In)definiteness Spreading.   The semantic (in)definiteness of the genitive phrase (generally) "spreads" to the entire complex (Gebregziabher 2013:184, 196–198).

(21) a. (*ha-)bejt   ha-mora
         (the-)house the-teacher
         '*a/the house of the teacher'
                          (*Hebrew*)

    b. (*ha-)bejt   mora
         (the-)house teacher
         'a/*the house of a teacher'
                          (*Hebrew*)

In Tigrinya the definiteness of the entire complex is determined independent of the (in)definiteness of the genitive phrase.

(22) a. ʔansti ħarəstot
         wife.P farmer.P
         'wives of farmers'
                          (*Tigrinya*)

    c. ʔit-ən ʔansti ħarəstot
         that-FP wife.P farmer.P
         'the wives of (*the) farmers'
                          (*Tigrinya*)

    b. ʔansti ʔit-om ħarəstot
         wife.P that-MP farmer.P
         '(*the) wives of the farmers'
                          (*Tigrinya*)

    d. ʔit-ən ʔansti ʔit-om ħarəstot
         that-FP wife.P that-MP farmer.P
         'the wives of the farmers'
                          (*Tigrinya*)

Bound Forms.   The head noun of CSNs has a particular morphophonological form (Gebregziabher 2013:185,).

(23)

	Free	**Bound**	**Gloss**	(*Hebrew*)
a.	bajit	bejt	'house'	
b.	doda	dodat	'aunt'	
c.	jeladim	jaldej	'children'	

Tigrinya does not have dedicated morphological forms for BPNs.

On the basis of the substantial overlap between the properties of CSNs in Semitic generally and BPNs in Tigrinya, Gebregziabher (2013) proposes that BPNs are in fact a particular flavor of CSN.

The challenge is to provide an analysis that accounts for both the similarities and differences between Hebrew/Arabic and Tigrinya.

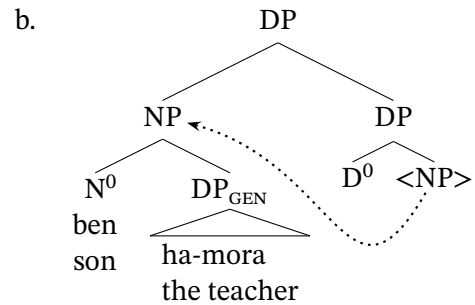## 4   Previous Analyses of Construct State Nominals

This section introduces previous analyses of CSNs in Hebrew and argues that they should be dispreferred as they are conceptually and are empirically unsuited for Tigrinya.

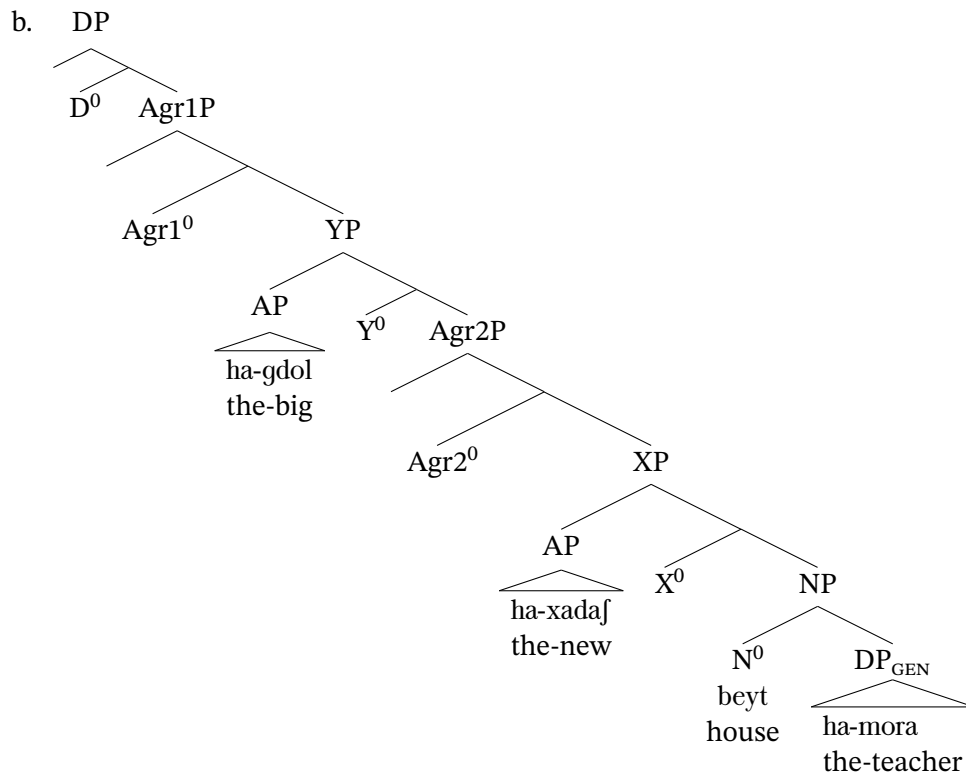## 4.1 Snowballing Phrasal Movement: Shlonsky 2004

The Proposal. This analysis is embedded within a more general proposal for nominal constituents in Hebrew whereby successive applications of phrasal movements place the noun in an initial position.

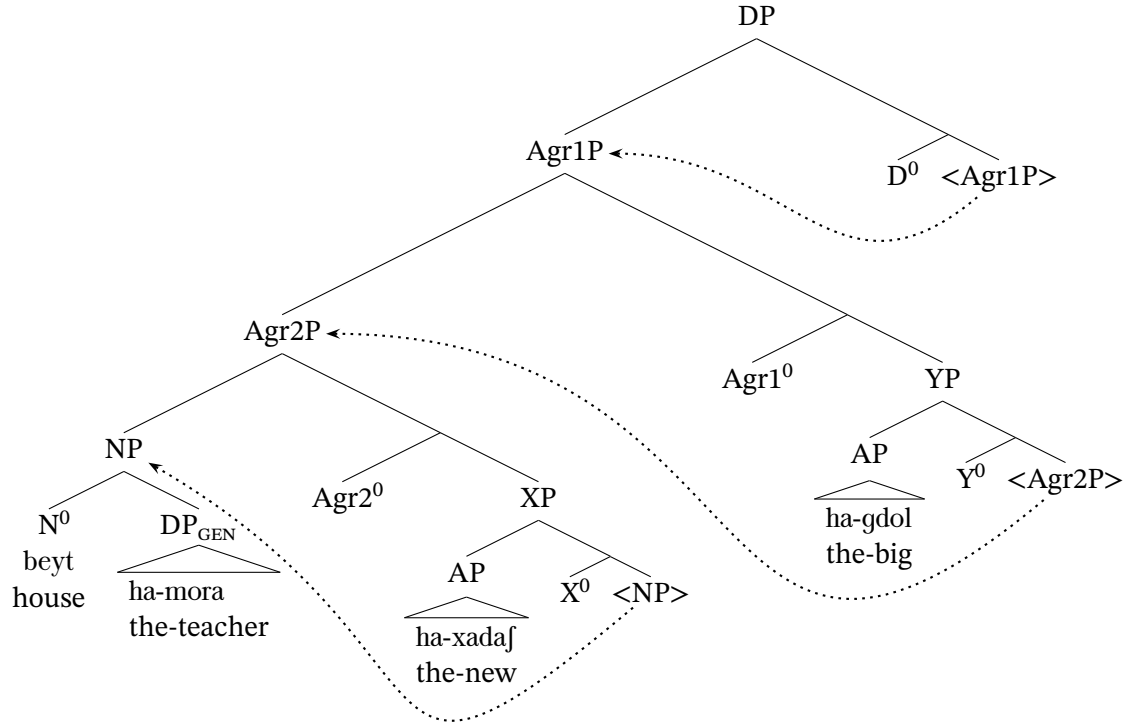In CSNs, NP movement moves the head and the genitive phrase to the specifier of DP.

(24) a. ben ha-mora
son the-teacher
'the teacher's son' (*Hebrew*)

b.

```
              DP
         ____/    \____
       NP              DP
     __/  \__        __/  \__
   N⁰    DP_GEN    D⁰    <NP>
   ben    /\
   son  ha-mora
        the teacher
```

(25) a. beyt   ha-mora   ha-xadaʃ   ha-gdol
house.M the-teacher.F the-new.M the-big.M
'the big new house of the teacher' (*Hebrew*)

b.

```
DP
__/  \__
D⁰    Agr1P
    ___/   \___
  Agr1⁰      YP
          __/  \__
        AP        Y⁰    Agr2P
        /\           __/   \__
     ha-gdol       Agr2⁰      XP
     the-big              __/   \__
                        AP        X⁰    NP
                        /\           __/  \__
                    ha-xadaʃ       N⁰    DP_GEN
                    the-new        beyt    /\
                                   house  ha-mora
                                          the-teacher
```

c.

```
                                              DP
                                         ╱         ╲
                              Agr1P ◄┄┄┄┄┄       ╲
                            ╱        ╲          D⁰   <Agr1P>
                  Agr2P ◄┄┄┄         ╲
                 ╱      ╲            ╲
              NP         ╲        Agr1⁰      YP
            ╱    ╲        ╲               ╱     ╲
          N⁰   DP_GEN   Agr2⁰    XP    AP        Y⁰  <Agr2P>
         beyt                  ╱   ╲  ha-gdol
        house   ha-mora      AP    X⁰  <NP>  the-big
             the-teacher   ha-xadaʃ
                            the-new
```

The tree (schematized): DP dominates Agr1P and a right branch containing D⁰ and <Agr1P>. Agr1P dominates Agr2P and a branch with Agr1⁰ and YP. Agr2P dominates NP and a branch with Agr2⁰ and XP. NP: N⁰ "beyt / house" and DP_GEN "ha-mora / the-teacher". XP: AP "ha-xadaʃ / the-new" and X⁰ <NP>. YP: AP "ha-gdol / the-big" and Y⁰ <Agr2P>.

Benefits. Shlonsky's (2004) analysis purportedly has several of the benefits we should expect:

- *Head-Initialness:* Roll-up movement terminates at Spec,DP.

- *Obligation of Genitive Phrase:* The head noun subcategorizes for the genitive phrase.

- *Strict Adjacency:* Case assignment freezes the genitive phrase in the NP.

Conceptual Issues. Gebregziabher (2013) appeals to conceptual arguments against the cartographic (Cinque 1999) and antisymmetric (Kayne 1994) views of syntax more generally.

- *Unmotivated Movement:* Most if not all of the movements invoked are not independently motivated.

- *Unmotivated Categories:* Most if not all of the categories invoked are not independently motivated.

Empirical Issues. Gebregziabher (2013) argues that this analysis is not well-suited for Tigrinya, and potentially other languages, on empirical grounds.

- *Too-Strong Ordering Rules:* Adjectives (in Tigrinya) are not as strictly ordered as the analysis implies.

- *Pre-nominal Modifiers:* This analysis derives post-nominal modifiers by design, contrary to the facts about Tigrinya.

- *Complements Only:* This analysis assumes the genitive phrase is always an internal argument of the noun, contrary to facts in other languages.

Summary. Given the conceptual issues of a roll-up movement derivations and the inability to extrapolate to Tigrinya and other languages, an alternative should be pursued.

4.2 Standard Head-Movement: Ritter 1991

The Proposal. This analysis is embedded within a more general proposal in which lexical heads undergo syntactic movement to adjoin with higher functional heads (N^0-to-D^0 movement).

In CSNs head-movement moves the head N^0 into a higher functional head and movement of the genitive phrase ensures adjacency.

(26) a. beyt ha-mora
house the-teacher
'the teacher's house'

b.
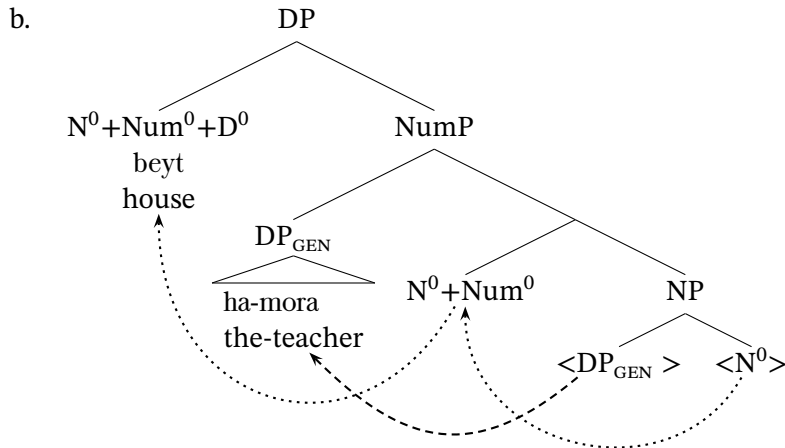
(27) a. beyt ha-mora ha-gadol
house the-teacher the-big
'the teacher's big house'

b.
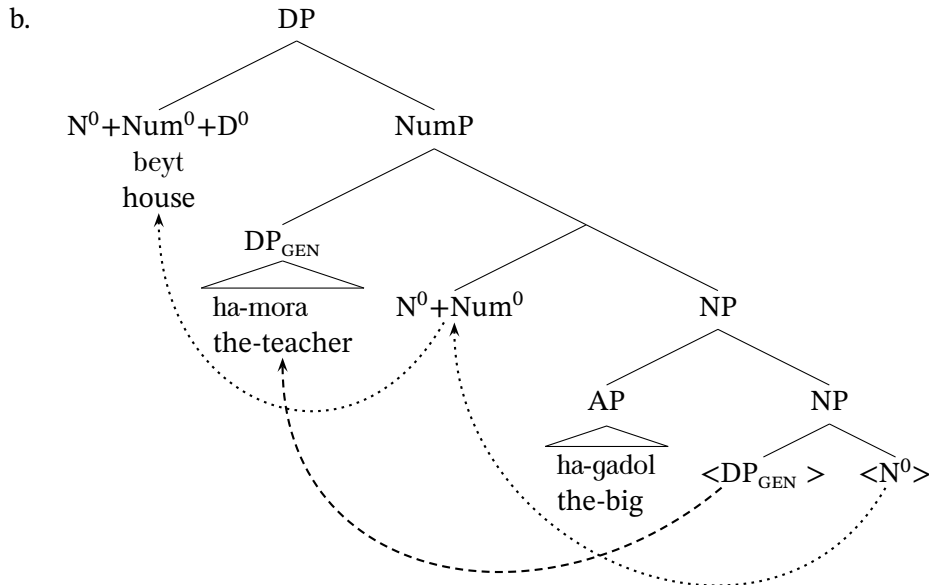
Benefits. Ritter's (1991) analysis purportedly has several of the benefits we should expect:

- *Head-Initialness:* Head-movement terminates at D^0 and genitive movement at Spec,NumP.
- *Asydeticity:* The attracting D^0 assigns genitive Case.
- *Obligation of Genitive Phrase:* Complementation implies selection.
- *Strict Adjacency:* Raising of the genitive phrase places it before any modifiers.
- *Complementarity of D^0:* Head-movement precludes other elements in D^0.

Conceptual Issues. Gebregziabher (2013) applies the Minimalist critique to the standard head-movement analysis.

- *Extension Condition:* Standard head-movement is a conceptual oddity as it does not extend the phrase-marker.
- *Unmotivated Movement:* Head-movement as an operation distinct from other types of displacement is not a conceptual necessity.

Empirical Issues. Gebregziabher (2013) cites empirical arguments raised by Shlonsky (2004) against the standard head-movement analysis.

- *Too-Weak Ordering Rules:* There are no mechanisms that ensure the correct order of adjectives.
- *Pre-nominal Modifiers:* This analysis derives post-nominal modifiers by design, contrary to the facts about Tigrinya.
- *Complements Only:* This analysis assumes the genitive phrase is always and internal argument of the noun, contrary to facts in other languages.

Summary. Given the conceptual issues of standard head-movement derivations and the ancillary assumptions required to extrapolate to other languages, an alternative should be pursued.

5 A Minimalist Account of Tigrinya Construct State Nominals

Gebregziabher (2013) provides an analysis of Tigrinya CSNs that overcomes the shortcomings of the analyses discussed above. The primary idea is that head-movement terminates lower in the structure.

(28)   a.
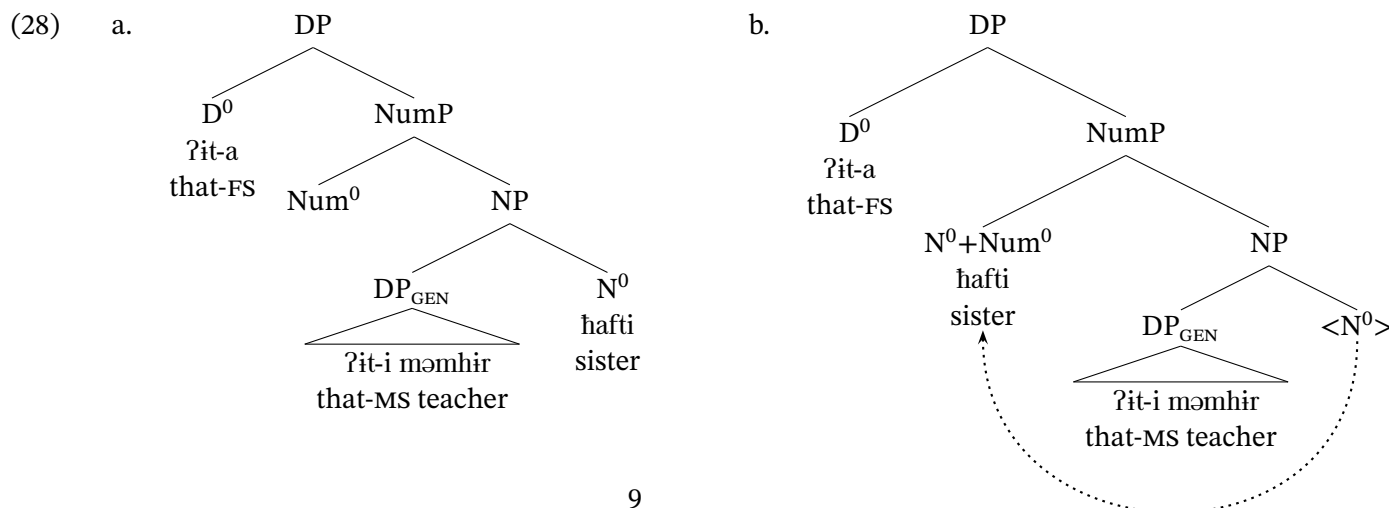
Head-to-Spec Movement (Matushansky 2006). The analysis aims to overcome the conceptual and theoretical issues by adopting an alternative conception of head-movement.

Head movement involves syntactic movement of a head to the Specifier of phrase. Heads that are adjacent in the syntax, via selection or movement, can be morphologically merged post-syntactically.

(29) a. *Syntactic Head-to-Spec Movement*

b. *M-Merger*
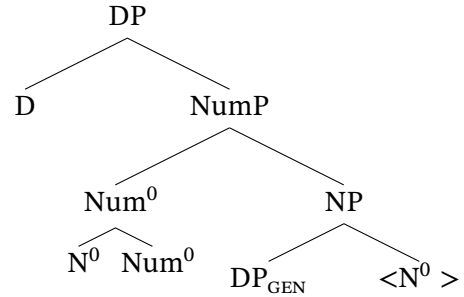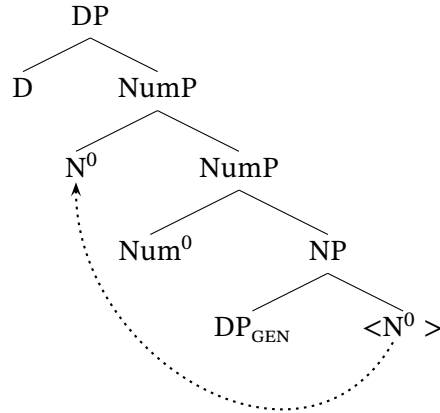
Agree (Chomsky 2001). Heads carry features that may gain their value through an operation AGREE, which in turn may require movement.

(30) AGREE
A head X^0 with an unvalued feature [F:] probes its c-command domain for a goal Y^0/YP with a valued feature [F: *val*] and values any unvalued features F of both X^0 and Y^0/YP.

(31) *Weak Feature-Valuing Constraint*
A weak feature [F:] on some X^0/XP can AGREE with some Y^0 if X^0/XP is c-commanded by Y^0.

(32) *Strong Feature-Valuing Constraint*
A strong feature [∗F:] on some X^0/XP can AGREE with some Y^0 only if X^0/XP is within the phrase projected by Y^0.

5.1 The Common Properties

Gebregziabher (2013) demonstrates how the proposed analysis accounts for the shared properties of Hebrew and Tigrinya Construct State Nnominals.

(33) beyt   ha-mora
house the-teacher
'the teacher's house'   (*Hebrew*)

(34) ħafti ʔit-i   məmhir
sister that-MS teacher
'the teacher's sister'   (*Tigrinya*)

Head-Initialness.   The head noun precedes the genitive.

Head-movement terminates at (Spec,)NumP and the genitive phrase is in-situ.

Obligation of Genitive Phrase.   The genitive phrase is obligatory in the construct state.

The head is subcategorized with a c-selectional requirement for the genitive phrase.

Asyndeticity.   The relation between the head noun and genitive is not signaled by adpositions.

Tigrinya [naj] and Hebrew [ʃel] serve roles (predication, Case-assignment) that are not needed in the Construct State.

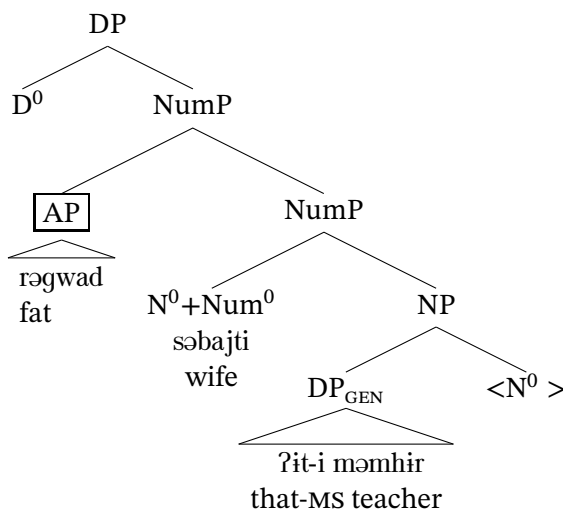**Strict Adjacency.**   The head noun and genitive phrase are necessarily adjacent.

Hebrew. The post-nominal modifiers of Hebrew are right-adjoined on the nominal spine (cf. Kayne 1994, Cinque 1999, Shlonsky 2004):

(35)   *Hebrew*
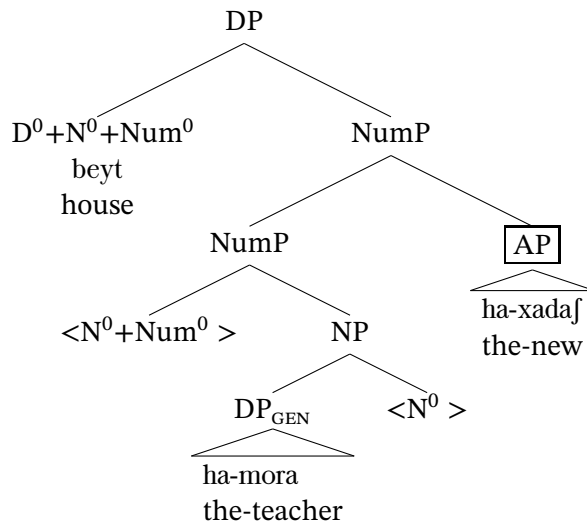
Tigrinya. The pre-nominal modifiers of Tigrinya are left-adjoined (at NumP or higher):

(36)   *Tigrinya*

Given these alignments, movement of the head noun will preserve adjacency with the genitive phrase and deliver the order of modifiers.

5.2 Definiteness Spreading

One of the differences between Hebrew and Tigrinya is the phenomenon of Definiteness Spreading that is found only in Hebrew.

(37) beyt   ha-mora
    house the-teacher
    a. 'the house of the teacher'
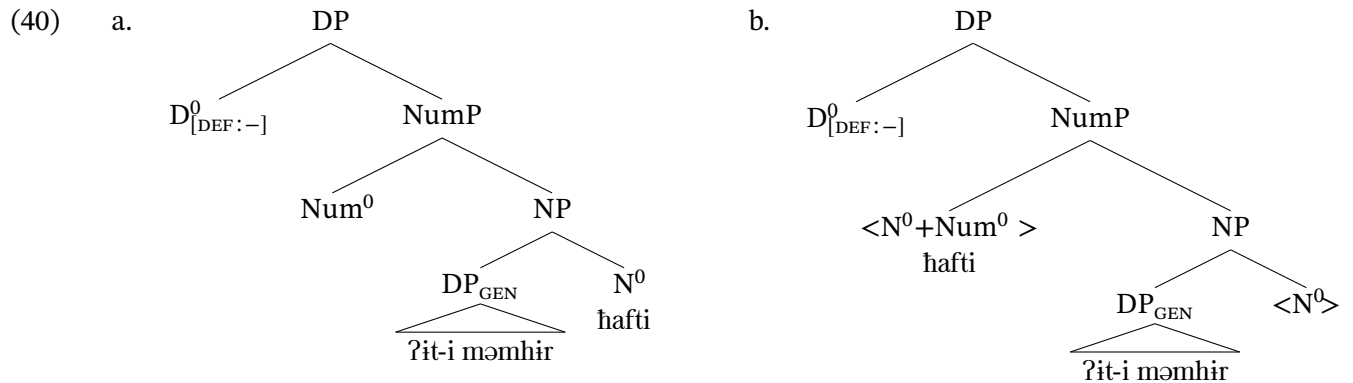   b. *'a house of the teacher'   (*Hebrew*)

(38) ħafti ʔit-i   məmhir
    sister that-MS teacher
    a. 'a sister of the teacher'
    b. *'the sister of the teacher'   (*Tigrinya*)

Gebregziabher (2013:5.3.2.1) proposes that the difference can be reduced to the content of D in each language and, consequently, different derivations.

Hebrew Definiteness Spreading. In Hebrew definiteness spreading CSNs, there is an unvalued feature [∗ DEF :] on D^0. This feature is valued indirectly by the genitive phrase via the obligatory movement of N^0.

(39) a.

    b.
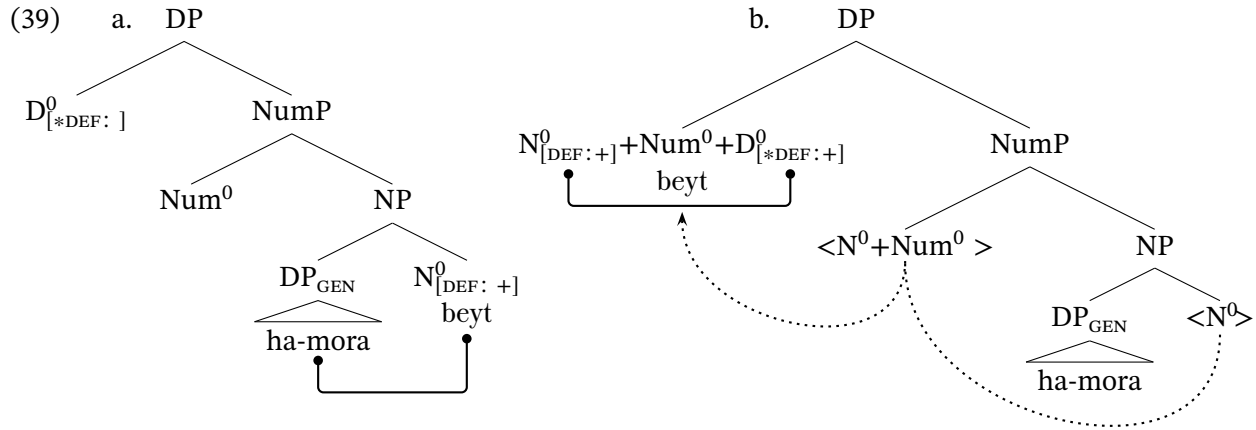
Tigrinya Definiteness Containment. Tigrinya lacks a D^0 with an unvalued definteness feature, meaning D^0 in Tigrinya CSNs must have the feature [DEF : ±], which is exponed with free morphemes.

(40) a.

    b.

5.3 (In)alienabilitiy

Another differences between Hebrew and Tigrinya is the inalienabiltiy restriction found on Tigrinya CSNs, but not on Hebrew CSNs.

(41) beyt/bat   ha-mora
house/daughter the-teacher
'the house/daughter of the teacher'
(*Hebrew*)

(42) ħafti ʔit-i məmhir
sister that-MS teacher
'a sister of the teacher'
(*Tigrinya*)

Gebregziabher (2013:5.4) proposes that the difference can be reduced to the content of a Θ-role assigning n^0 in each language and, consequently, different derivations.

Tigrinya Inalienability.   Tigrinya has a single argument introducing n^0 for nominalizations that essentially assigns an IA-Pssr Θ-Role. Alienable possession is achieved with [naj].

(43)
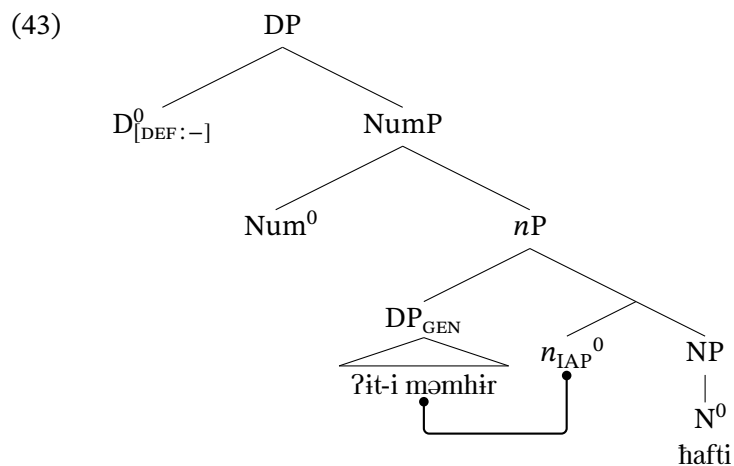
Hebrew (In)alienability.   Hebrew has separate n^0s for nominalizations: one that assigns an IA-Pssr role and one that assigns an AL-Pssr role.

(44)

(45)

13
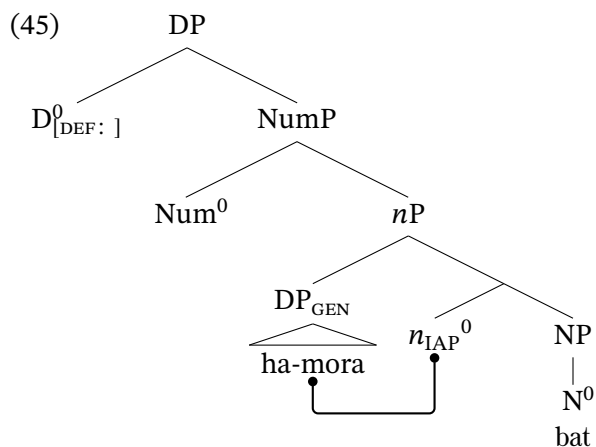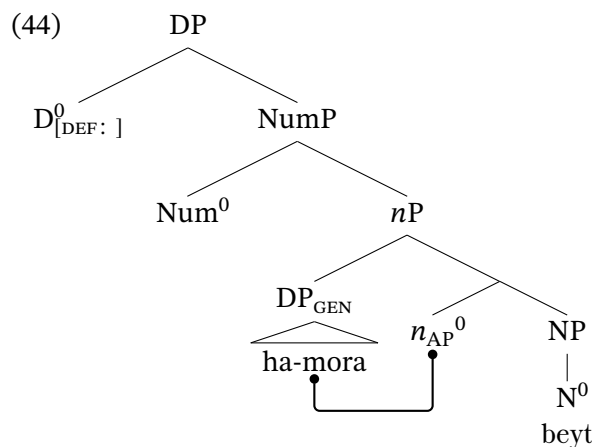
References

Chomsky, Noam. 2001. Derivation by Phase. In *Ken Hale: A life in language*, ed. Michael Kenstowicz. Cambridge, MA: MIT Press.

Cinque, G. 1999. *Adverbs and functional heads: A crosslinguistic perspective*. New York: Oxford University Press.

Gebregziabher, Keffyalew. 2012. The alienable-inalienable asymmetry: Evidence from Tigrinya. In *Selected Proceedings of the 42nd Annual Conference on African Linguistics*, ed. Michael R. Marlo, 161–182. Somerville, MA: Cascadilla Proceedings Project.

Gebregziabher, Keffyalew. 2013. Projecting possessors: A morphosyntactic investigation of nominal possession in Tigrinya. Doctoral Dissertation, University of Calgary, Calgary, Canada.

Kayne, Richard. 1994. *The antisymmetry of syntax*. Cambridge, MA: The MIT Press.

Matushansky, Ora. 2006. Head-movement in linguistic theory. *Linguistic Inquiry* 37:69–109.

Ritter, Elizabeth. 1991. Two functional categories in noun phrases: Evidence from Modern Hebrew. In *Perspectives on Phrase Structure: Heads and Licensing*, ed. Susan D. Rothstein, Syntax and Semantics 25, 37–62. San Diego, CA: Academic Press.

Shlonsky, Ur. 2004. The form of Semitic noun phrases. *Lingua* 12:1465–1526.