Structural Definiteness

Introduction: Splitting definiteness

Recent typological work on definite noun phrases (Schwarz 2009, 2013) has shown that there might be two distinct types of definiteness, linked to distinct syntactic projections: a higher, *anaphoric* definiteness, and a lower, *uniqueness*-based one, with some languages (e.g. Ferting, Hausa) marking these two cases in different ways. This approach has been applied by Jenks (2016) to a contrast between Mandarin—which uses bare nouns for uniqueness, DEM(onstrative)-CL(assifier)-N(noun) sequences for anaphoricity—and Cantonese, which uses CL-N for both cases (Cheng and Sybesma 1999). Jenks locates this contrast in a difference in the way Mandarin and Cantonise realize the morphology of definiteness, which seems a restatement of the facts.

We offer an alternative analysis of the way (CL)-N acquires definiteness, capitalizing on the idea that this feature may be triggered *structurally*, but that a +DEF value is not sufficient to license empty functional projections. We argue that ClP/NP raising within the DP structure in (1) (as in Simpson 2005, but with two potential 'definite' layers, sDP and wDP) best explains the data, and that the difference between Mandarin and Cantonese depends on whether or not a language can only raise N, or both Cl+N and N. Finally, we show that Chinese definites have surprising similarities with the 'Bare Noun Conjunction' (BNC) construction which is found in many languages, both related and unrelated. Specifically, BNC definiteness (in this case, the *anaphoric* variety) may be triggered Chinese-style, i.e. without any article or demonstrative, by the movement of a conjunction of bare nouns to [Spec,sDP] (Heycock and Zamparelli 2003).

(1) $[_{\text{s(trong)DP}}\ \text{sD}^{i}\ [_{\text{w(eak)DP}}\ \text{wD}\ [_{\text{NumP/PredP}}\ \text{Num}\ [_{\text{ClP}}\ \text{CL NP}\ ]\ ]\ ]\ ]$

The case of vanishing Chinese definiteness

In Cantonese, nominals of the form CL-N can be interpreted as either definites or indefinites in object position but only as definites in subject position (2a) (unless the existential particle *you* 'have' precedes it, see Cheng and Sybesma 1999). The definite reading becomes impossible, and thus the subject position is excluded altogether, if a numeral precedes (2b). A crucial new observation is that in predicative position (2c) only the indefinite reading is possible, as shown in (3).

(2) a. $[_{+\text{DEF}}\ \text{Cl N}\ ]\ \text{V}\ [_{\pm\text{DEF}}\ \text{CL N}\ ]$ *Cantonese*
b. [(*NUM) Cl N] V $[_{-\text{DEF}}$ NUM CL N]
c. SUBJECT BE $[_{-\text{DEF}}$ CL N]

(3) Context: exactly two pupils are chosen to meet the prime minister: one boy and one girl.
#Kim hai^{6} go^{3} nam^{4} zai^{2} ; Leslie hai^{6} go^{3} neoi^{5} zai^{2}
Kim COP CL boy Leslie COP CL girl
'Kim is a/*the boy and Leslie is a/*the girl.'

The same data obtains in Mandarin, with a bare N in place of the Cantonese Cl-N. Both languages can of course have definite predicates (as in *John is* {*that man over there / the winner of this hand / the wealthiest man here*}) using a demonstrative before CL N. Jenks's morphological 'spanning' account does not predict this distribution.

Analysis: Chinese

We take the DP structure in (1) to be common to all languages under discussion. s(trong)DP is of type <e>, weakDP is a (singleton/maximal) property, NumP any property, ClP a classifier phrase. Following Schwarz and Jenks, we assume the sD head bears an index i, which can be linked to a discourse/situation object (as in deictics), or, we propose, to a quantifier with non-null restriction.

Syntactically, we assume that a null SD (sD^0) must be licensed by a C-commanding V—*you* 'have/there is' is a subcase of this configuration—in which case sD is bound by a default existential (cf. Longobardi 1994, a.o.). Empty functional layers may also be missing, but since arguments must be <e>-type, they cannot be wDP, NumP or ClP, unless their property types are converted into <e>. Definiteness can do this: both sD and wD may host a +DEF feature, denoting MAX, a function from a maximal <et> to its supremum. We propose that this feature, if assigned to a null head D^0 (sD or wD), requires an YP in [Spec,DP]. If the complement of $\text{D}^0_{+\text{DEF}}$ is empty, YP provides input to MAX (4) (this does not happen if YP is a possessor). In turn, if endowed with the proper features, YP licenses D^0 in any syntactic position.

(4) $[_{\text{sDP}}\ [_{\text{YP}}\ \ldots\ ]\ \text{sD}^0_{+DEF}\ \ldots\ ] = \textsc{Max}(\text{YP})$.

Consider now Cantonese. sD may remain empty only in object position, receiving an existential reading. In both positions, sD^0 may have the feature +DEF, which attracts ClP to [Spec,sDP], triggering anaphoric definiteness. The same happens in wDP, the only difference being that the resulting entity is not coindexed. Numerals block the raising of ClP, so the indefiniteness of the object in (2b) follows.

What happens in predicative position? Our proposal is that here language selects the *smallest* projection with the correct semantic type (here, ClP or even NP, type <et>), unless the numeration contains a lexical head (e.g. an article, a demonstrative), which forces projecting a larger structure. But if null sD and wD heads are never generated in predicative position, there is no place to insert +DEF feature, and MAX is never triggered.

COORDINATED BARE NOUN DEFINITES IN ENGLISH

Heycock and Zamparelli (2003) point out that the BNC [*cat and dog*] in (5a) must be understood as a referring to a previous antecedent (possibly via bridging (5b)). Numbers block definiteness (6), exactly as in Cantonese (2b).

(5) a. [A black cat and a brown dog]$_i$ were fighting in the street. [Cat and dog]$_i$ / [black cat and brown dog]$_i$ were both filthy.
b. The novel (or so I hope) signals a separation between [author and narrator] with its very first sentence. *from UKWAC*

(6) The pair of forks$_i$ goes on the right and the pair of spoons$_j$, on the left. [(*Two) forks and (*two) spoons]$_{i+j}$ must match.

Cases where the definiteness comes from a restriction are impossible (7), a fact which is the hallmark of 'anaphoric' definiteness. Following H&Z, we propose the analysis in (8): attracting N pied-pipes the whole &P, and the operator "and" is sufficient to license sD^0.

(7) a. I didn't see much of the film: *(the) man and woman in front of me were very tall.
b. To even out the couples, *(the) shortest man and tallest woman should dance together.

(8) $[_{\text{sDP}}\ [_{\text{ClP/NP}}\ \text{man and woman}\ ]_i\ \text{sD}^0_{+\text{DEF}}\ [_{\text{wDP}}\ \ldots\ t_i\ ]\ ]$

What happens in predicative position? We find that anaphoric reference of BNCs is harder from predicates (9a) than from arguments (9b), again in parallel with the Cantonese data in (3).

(9) My neighbours might be a family with a boy$_i$, a girl$_j$ two women$_k$ and three dogs$_h$.
a. ?*The dark shapes to the left and right are{women$_k$ and dogs$_h$ / boy$_i$ and girl$_j$}, respectively
b. I see{women$_k$ and dogs$_h$ / boy$_i$ and girl$_j$} on the porch right now.

Being independently linked to discourse elements, BNC at sDP cannot be collapsed onto a single individual (10b), while this is possible if they are (definite) appositions (10a) (in wDP, we suggest).

(10) a. Yesterday John Smith$_i$, [president and treasurer]$_i$ of the party, gave five speeches.
b. *At the end of the day, [president and treasurer]$_i$ was exausted.

Additional predictions of (1)/(4) concern the (lack of) definiteness with possessives within predicates.

Cheng, L. L.-S. and R. Sybesma (1999). Bare and not-so-bare nouns and the structure of NP. *Linguistic Inquiry 30*(4), 509–542.

Heycock, C. and R. Zamparelli (2003). Coordinated bare definites. *Linguistic Inquiry 34*(3), 443–469.

Jenks, P. (2016). Articulated definiteness in Mandarin and Cantonese. Ms.

Longobardi, G. (1994). Reference and proper names: a theory of N-movement in syntax and logical form. *Linguistic Inquiry 25*, 609–665.

Schwarz, F. (2009). *Two Types of Definites in Natural Language*. Ph. D. thesis, UMass Amherst.

Simpson, A. (2005). Classifiers and DP structure in Southeast Asia. In G. Cinque and R. Kayne (Eds.), *Handbook of Comparative Syntax*, pp. 806–838. Oxford University Press.