

Structural Blocking and the Nature of Derivations

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One of the core principles of Distributed Morphology (DM; Halle & Marantz 1993) is *late insertion*, whereby vocabulary is inserted after all terminal node manipulations in the syntactic and morphological components. My principle claim in this paper is that the vocabulary must in some cases determine the selection of a constituent structure, which means that the late insertion principle is too severe: it prevents the vocabulary from having any effect on constituent structure.

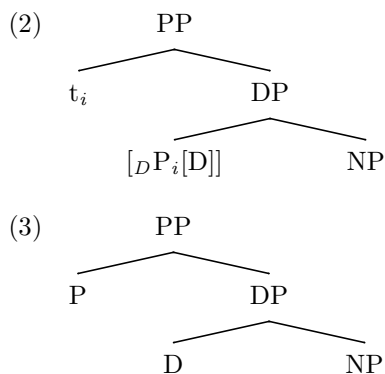
In DM, blocking is attributed to ordering of insertion rules, itself attributed to the Paninian Principle: more specific rules apply first. The rule inserting *ate*, specified for the features of the root $\sqrt{\text{eat}}$, and [+past], applies before the rules inserting *eat* and $/-d/$, which have less specific insertion requirements. In cases where forms compete for insertion into the same structure, DM has some explanatory power, since a more specific form always does the blocking.

However, DM cannot account for cases in which morphological forms corresponding to *different syntactic structures* compete. The existence of a single word can block a more complex *phrase* from being constructed in some cases (Poser 1992; Hankamer and Mikkelsen 2005). I call this **structural blocking**.

I focus on French data like that in (1) (ultimately from Miller 1992). When the preposition *à* ‘to’ c-commands a DP headed by *le* ‘the (ms)’, the PP is ungrammatical, blocked by *au*. This is true whether the *le* conjunct is leftmost in the maximal DP or not ((1d)). Similar blocking effects occur with portmanteaux like *aux* ‘to the (pl)’, *du* ‘of the (m.s.)’, and *des* ‘of the (pl)’.

- (1) a. *au* père et *à* la mère
to.the father and to the mother
b. **à* le père et la mère
to the father and the mother
c. **au* père et la mère
to.the father and the mother
d. **à* la mère et le père
to the mother and the father

I posit two surface constituent structures for PPs: (2), in which P lowers onto and adjoins to D, and one in which there is no lowering (3). Which structure is selected depends upon the specific vocabulary to be inserted. Ungrammatical **à le* sequences are blocked by *au*, which selects the lowering structure. When no fused form is available, the non-lowering structure is selected.



Embick and Noyer (2001) argue that lowering operations such as that in (2) are sensitive only to features and syntactic structures, not to vocabulary; that is, lowering applies before Vocabulary Insertion. Because of this, DM cannot explain structural blocking. It can only account for competition between vocabulary for insertion into a single pre-determined structure.

I adopt an analysis of structural blocking in OT (Prince and Smolensky 1993/2004, *inter alia*), which *can* compare pairings of syntactic structures with morphological forms. I adopt a version of OT in which a single hierarchy of constraints governs all levels of linguistic representation, and evaluates candidates which map structures from each of the levels onto one another. In this way, the syntactic and morphological representations are evaluated in parallel, along with the semantic and phonological representations.