

Restitutive Readings, Quantificational Objects, and the Structure of VPs

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Background: Restitutive readings of *again* have often been used as a probe into the internal structure of VPs (Von Stechow 1996; Beck & Johnson 2004). In particular, restitutive readings have been used to illustrate that classes of verbs may have complex event structures consisting of an eventive and stative component. This is observed with verbs that show the causative-inchoative alternation as well as complex causatives like resultatives.

- (1) CONTEXT: A door in the house was previously open. Mary closed the door to keep the house warm. John thought the house was too warm so...
John opened the door again. / John kicked the door open again.

Interactions with Quantificational Objects: Less discussed in the literature is the interaction of *again* with quantificational objects (Tomioka 2006; Nissenbaum 2006; Dobler 2008). The observation is that quantifiers can scope below or above *again*'s presupposition, generating what we call a bound or quantificational reading. We illustrate with causative verbs and resultative constructions with an indefinite object; note however that this also applies to other quantifiers like numerals and *most*.

- (2) CONTEXT: There were 5 doors in the house and one of them was open. Mary closed the open door to keep the house warm. John thought the house was too warm so...
- a. John opened a door again. Different door (quant.) or same door (bound)
b. John kicked a door open again. Different door (quant.) or same door (bound)

Although some authors argue that quantificational noun phrases should scope above all event quantifications (Champollion 2015, a.o.), evidence that quantificational noun phrases may remain low in resultative and causative structures comes from the interaction of *again* with another scopal expression, such as negation. When the indefinite is interpreted as taking wide scope with respect to negation, only the bound restitutive reading is present. However, when the indefinite takes narrow scope, only the quantificational restitutive reading is possible.

- (3) John didn't kick a door open again
- a. Wide scope reading: There is a door that John didn't kick open again.
(✓bound; #quantificational)
- b. Narrow scope reading: It is not the case that John kicked a door open again.
(#bound; ✓quantificational)

This fact demonstrates that the particular restitutive reading available with *again* in these cases is closely tied to the scope of the quantificational noun phrase: the quantificational reading arises when the indefinite remains low in the structure, and the bound reading is available only when the indefinite is in a higher position at LF.

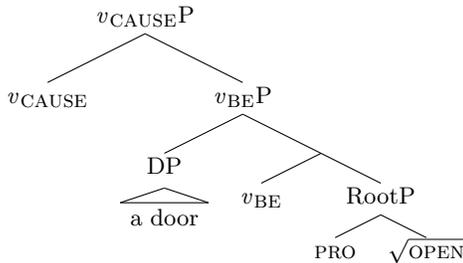
Inchoatives: Surprisingly, unlike the causative constructions, in the inchoative only a bound restitutive reading is available and the quantificational restitutive reading is infelicitous.

- (4) CONTEXT: There were 5 doors in the house and one of them was open. Mary closed the open door to keep the house warm. A strong gust of wind blew through the house and...
A door opened again. #Different door (quant.) ✓Same door (bound)

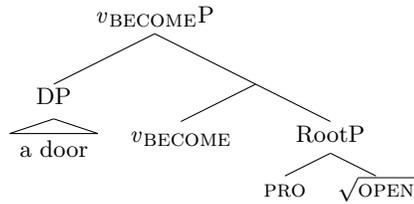
In analyses where the causative-inchoative alternation is due simply to a different 'flavor' of *v* (v_{CAUSE} or v_{BECOME}), the contrast with respect to the lack of a quantificational reading becomes mysterious (e.g. Folli & Harley 2004; Harley 2012).

Decomposing the Result State: To capture the contrast above, we propose that what has been analyzed as a small clause result state (e.g. Harley 2012) in the causative-inchoative alternation actually differ in the amount of structure they contain. The causative variant has a more complex result state, introduced by another stative verbalizing head v_{BE} (Cuervo 2015), which is then selected for by v_{CAUSE} . In the inchoative, the bare root is verbalized by only the eventive v_{BECOME} . In both cases, the *v* heads introduce the internal argument of the result predicate, with a PRO being the complement of the root interpreted as a variable. Resultatives simply have another root adjoined to the v_{CAUSE} in (5) (Harley 2005).

(5) Causative



(6) Inchoative



In the above structures, *again* can adjoin to two different sites: RootP or the $v_{BECOME}P$ and $v_{BE}P$. If PRO is interpreted as a variable bound by the DP object introduced by the v heads, then adjoining to RootP will produce the bound reading of the indefinite. The crucial difference lies in the second adjunction site. In the causative, *again* can adjoin to the stative $v_{BE}P$ above the quantificational object, producing a quantificational restitutive reading of its presupposition. In contrast, with the inchoative, $v_{BECOME}P$ is eventive rather than stative and thus even though *again* scopes over the quantificational object, only the **repetitive** quantificational reading is available and not the restitutive one. This can be shown with the following contexts.

- (7) a. CONTEXT: The wind blows a door open. John comes over and shuts it. Much to his chagrin, another gust blows through the room and blows another door open.
 ✓ A door opened again.
- b. CONTEXT: A door was built open, it had never opened before. The wind blows it shut. Then, another gust comes in and blows another door open.
 # A door opened again.

The proposed analysis also explains the connection between the scope of the indefinite with respect to negation and the particular restitutive presupposition derived. When the indefinite remains in its base position in the specifier of $v_{BE}P$, below negation, and *again* adjoins to $v_{BE}P$, the quantificational restitutive reading arises. When the indefinite undergoes QR to take scope above negation, a trace (or copy) is left behind and interpreted as a bound variable, giving rise to the bound restitutive presupposition. While technically *again* may also attach to the RootP, in which case one might expect a bound reading to be available, the unavailability of this reading will actually fall out on an approach like that of Sudo (2014), which treats bound variable readings of presuppositions associated with quantificational expressions in the assertion as a type of cross-dimensional dynamic anaphora. Because negation is externally static (Groenendijk & Stokhof 1990), binding of the variable in the presupposition is not possible if the quantifier binding it is inside the scope of negation. As such, the indefinite can only bind the variable in the presupposition if it takes scope above negation.

Implications: The observations concerning the interaction of *again* with quantificational noun phrases motivate a novel approach to the decomposition of the VP. While causatives and resultatives pattern together in permitting a quantificational restitutive reading, inchoatives do not. This difference goes unexplained on analyses that treat the difference between causatives (and, by extension, resultatives) and inchoatives as solely due to a difference in the flavor of v present in the structure. Our analysis explains the difference by positing a larger amount of structure in the result state component of a causative/resultative’s meaning and introducing arguments in the specifier of the relevant vP .

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