ON (NON)-RESULTATIVE V-V COMPOUNDS IN CHINESE·

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1. Introduction

Since Simpson (1983), it has been widely accepted that the resultative construction abides by the *Direct Object Restriction* (a.k.a. *Simpson's Law*).

(1) *Direct Object Restriction (DOR)*
    In the resultative construction, the result phrase can be predicated only of the (underlying) direct object.

For example, in an English resultative sentence with a transitive predicate, the result phrase can be predicated of the object, but not of the subject, as the contrast in (2) shows.

(2) a. John wiped the table clean.

     b. *John wiped the table tired.

There are slight complications with resultatives with intransitive predicates. That is, unergative resultatives require a dummy 'direct object', which is often referred to as a *fake reflexive* (Simpson 1983), as shown in (3a) below. Also, unaccusative resultatives such as (3b) might at first sight seem to be a counterexample to the DOR, since the result phrase *solid* is predicated of the subject *the river*. However, under the Unaccusative Hypothesis (Perlmutter 1978; Burzio 1986), according to which the surface subject of an unaccusative predicate is the underlying direct object, the result phrase in (3b) is analyzed as predicated of the underlying object, thereby complying with the DOR.

(3) a. He talked *(himself) hoarse.

     b. The river froze solid.

However, several researchers have claimed that the DOR does not hold for Mandarin Chinese resultative V-V compounds (Cheng and Huang 1994, Tang 1997, Huang 2006,

Zhang 2001, 2007).[1] There are two types of counterexamples in Chinese reported in the literature. First, Chinese sometimes allows the subject of a transitive resultative V-V compound to receive a theta role from the result-denoting verb of the compound. In (4), for instance, the resultant state *lèi* 'tired' may be predicated of either the object *Yōuyou* or of the subject *Táotao*, and hence the sentence is ambiguous.[2]

(4) Táotao zhuī-lèi-le   Yōuyou   le.
     Taotao chase-tired-PERF   Youyou   LE

     'Taotao chased Youyou and as a result Taotao/Youyou got tired.'   (Y. Li 1993: 480)

Throughout this paper, we call the reading under which the second verb is predicated of the surface subject *subject-oriented reading*, and the reading under which it is predicated of the object *object-oriented reading*. As we will see below, there are also V-V compounds that only exhibit subject-oriented readings, which are also considered to be counterexamples to the DOR.

The second type of counterexamples to the DOR involves intransitive verbs. In Chinese, result phrases can be predicated of the subjects of unergatives without fake reflexives, as shown in (5).

(5) a. Lǐsì   xiào-fēng-le.
         Lisi   laugh-crazy-PERF

         'Lisi laughed himself crazy.'   (Huang 2006: 5)

     b. Zhāngsān   zuì-dǎo-le.
         Zhangsan   get.drunk-fall-PERF

         'Zhangsan got drunk, and as a result he fell down.'

These counterexamples thus cast doubt on the validity of the DOR as a universal generalization, and also raise the question of why the DOR is violable in Chinese unlike in many other languages. In fact, there are several attempts in theoretical linguistics to account for this peculiarity of Chinese (Cheng and Huang 1994, Tang 1997, Huang 2006, Zhang 2001, 2007).

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[1] For purported DOR violations in English, see Wechsler (1997) and Rappaport Hovav and Levin (2001).

[2] Besides the two readings shown in the English translation, there is a third interpretation, in which the subject *Táotao* is the chasee as well as the causer and the object *Yōuyou* is the chaser, i.e. 'Taotao caused Youyou to chase him and as a result Youyou got tired.' We ignore this reading in this paper, but note that the DOR is not violated here.

Contrary to these authors, however, the present paper will question the fundamental premise common to their arguments that the alleged counterexamples in Chinese are resultative constructions and hence are expected to obey the DOR. Focusing on the first type of purported counterexamples to the DOR (viz. transitive resultatives), we will present empirical evidence that subject-oriented 'resultatives' are in fact not resultatives in the sense that V2, which is assumed to be a result predicate, does not implement secondary predication or describe a result state. Because those instances of V-V compounds are not resultatives, the DOR is just irrelevant, and hence they do not constitute counterexamples to it. It should be clarified at this point that it is not our purpose to defend the DOR per se (see Hoekstra 1988, Rothstein 2004 for attempts to derive the DOR), but rather our main objective is to question the validity of the arguments made in the previous studies. Also, in the present paper, we will not examine the second type of potential counterexamples mentioned above (viz. unergative resultatives).

The organization of this paper is as follows. In Section 2, we delve into the subject-oriented readings of V-V compounds with transitive V1 that have been raised as counterexamples to the DOR, and show that they are in fact not resultatives. It is shown in Section 3 that the so-called 'referentiality' restriction on the subject-oriented V-V compounds is given a pragmatic explanation under our account. In Section 4, we discuss a set of V-V compounds with transitive V1 that at first blush may not seem to be amenable to our analysis, but we show that they are just idiomatic expressions and involve no secondary predication. Section 5 concludes the discussion.

2. (So-called) Subject-Oriented Resultative V-V Compounds in Chinese

In this section, we investigate those instances of Chinese V-V compounds with transitive V1 which are purported to be counterexamples to the DOR. It is worth emphasizing here that typical counterexamples of this type found in the literature involve one of the following four kinds of V-V compounds: V-*guàn* (V-accustomed), V-*nì* (V-bored), V-*lèi* (V-tired), and V-*fán* (V-bored). Of these, V-*guàn* and V-*nì* only permit subject-oriented readings (Huang 2006), while the other two, V-*lèi* and V-*fán*, allow subject-oriented and object-oriented readings and hence may be ambiguous (Sybesma 1999, among others). This is illustrated by the following examples.[3]

(6) a. Zhāngsān   xiào-guàn-le   Lǐsì.
       Zhangsan   laugh-accustomed-PERF   Lisi

     'Zhangsan got accustomed to laughing at Lisi.'
     '*Zhangsan laughed and as a result Lisi got accustomed.'

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[3] The translations for the subject-oriented readings in (7) are only approximate, as it will be shown that they are not resultatives.

b. Zhāngsān   zhuī-nì-le   Lǐsì.
   Zhangsan   chase-bored-PERF   Lisi

'Zhangsan got bored with chasing Lisi.'
'*Zhangsan chased Lisi and as a result Lisi got bored.'

(7) a. Táotao   zhuī-lèi-le   Yōuyou   le.
       Taotao   chase-tired-PERF   Youyou   LE

   'Taotao chased Youyou and as a result Taotao/ Youyou got tired.' (Y. Li 1993: 480)

   b. Zhāngsān   zhuī-fán-le   Lǐsì   le.
      Zhangsan   chase-bored-PERF   Lisi   LE

   'Zhangsan chased Lisi and as a result Zhangsan/ Lisi got bored.'

Contrary to what has been claimed in the literature, we submit that so-called subject-oriented resultatives of the above kind are not actually resultatives but rather have a complementation structure where V2 is a transitive psych verb sitting in the matrix verb position, whereas object-oriented resultatives have ordinary resultative structures where V2 is a secondary predicate describing a resultant state. The complementation structure and the resultative structure are underlyingly distinct, as schematically represented in (8a) and (8b).

(8)   a. [DP1   [$_{AspP}$ Asp   [$_{VP}$ V2 [$_{VP}$ V1   DP2]]]] (*Complementation: Subject-Oriented*)

      b. [DP1   [$_{AspP}$ Asp   [$_{VP}$ V1 [$_{FP}$ F   [$_{XP}$ DP2 V2]]]]] (*Resultative: Object-Oriented*)

The structural difference between (8a) and (8b) is obscured by the fact that the surface strings resulting from these two structures are identical, but as we will see below, a closer scrutiny reveals that it is reflected in the difference in meaning.

Let us first look at how the derivations of (8a) and (8b) give rise to the surface order V1-V2. We claim that subject-oriented resultatives are derived through syntactic incorporation and Lowering in the phonological component.[4] As shown in (9a-b) below, in the complementation structure, V1, which is generated lower than V2, undergoes incorporation

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[4] Lowering is a post-syntactic operation that relates a head to the head of its complement. In the configuration shown in (i), X^0 is lowered onto the head of its complement, namely, Y^0.
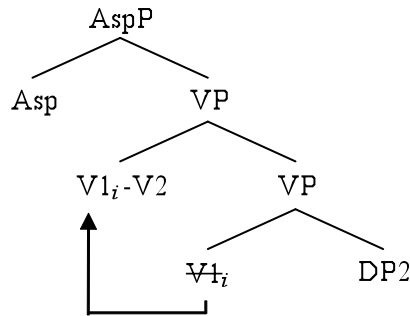
(i)   *Lowering of X^0 to Y^0*
         [$_{XP}$ X^0 … [$_{YP}$ … Y^0 …]] → [$_{XP}$ … [$_{YP}$ … [$_{Y0}$ Y^0 + X^0] …]] (Embick and Noyer 2001: 561)

Embick and Noyer (2001: section 7.2.) suggests a possible amendment to this definition of Lowering, but the above definition suffices for our present purposes.
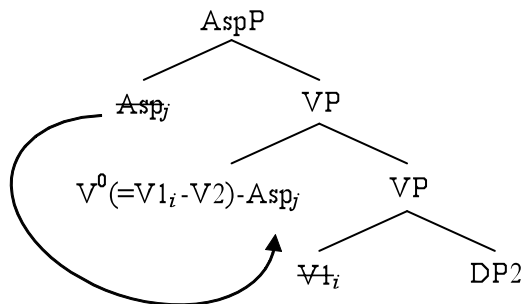
and gets left-adjoined to V2 in the syntax[5], and Asp (often instantiated by the suffix *le*) is lowered onto the complex head V^0 (=V1+V2) in the phonological component to form the V1-V2-Asp sequence.

(9) *Subject-Oriented Resultatives*
      a. *Incorporation of V1 into V2 in the syntax*

```
            AspP
           /    \
         Asp     VP
               /    \
          V1_i-V2    VP
             ↑      /    \
            V1_i   V1_i   DP2
             |_____|
```

      b. *Lowering of Asp onto V^0 in the phonological component*

```
              AspP
             /    \
         Asp_j     VP
                 /    \
    V^0(=V1_i-V2)-Asp_j   VP
                        /    \
                      V1_i    DP2
```

On the other hand, object-oriented resultatives are derived via head movement in the syntax followed by a combination of Lowering and another PF operation named Local Dislocation[6]. As shown in (10a-c), in the resultative structure, V2 moves to the head of FP, which serves to delimit an event, and after all applications of syntactic movement, Asp is

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[5] We assume that only left-adjunction is permitted in the syntax. See Kayne (1994).

[6] Local Dislocation is a type of merger that operates on string-adjacent elements, as illustrated in (i), where the symbol " " indicates linear precedence and adjacency (see Harley and Noyer 1999, Embick and Noyer 2001, cf. Marantz 1988).

(i)   [X [Y Z]] → [[Y + X] Z]

Through this operation, "a zero-level element trades its relation of adjacency to a following constituent with a relation of affixation to the linear head (peripheral zero-element) of that constituent" (Harley and Noyer 1999: 6).
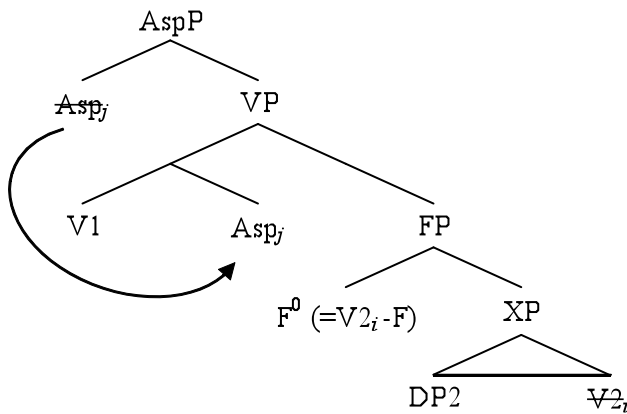
lowered onto V1, followed by local dislocation of Asp and the complex head F^0 under adjacency[7].

(10) *Object-Oriented Resultatives*
    a. *Head Movement of V2 to F in the syntax*

           AspP
       Asp   VP
            V1   FP
               $V2_i$-F   XP
                  DP2   ~~VP2~~$_i$
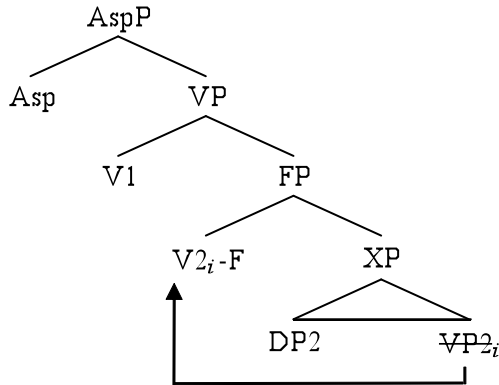
    b. *Lowering of Asp onto V1 in the phonological component*

           AspP
    ~~Asp~~$_j$ VP
      V1 Asp_j FP
          F^0 $(=V2_i$-F$)$ XP
              DP2   ~~V2~~$_i$

    c. *Local Dislocation under adjacency*
      [… [V1   Asp]   [F …]] → [… V1   [F + Asp] …]

Of particular relevance to our discussion here is that in (8a) above, V2 is a transitive psych verb embedding complementation, and assigns the theta role 'Target of Emotion' in the sense of Pesetsky (1995) to the embedded structure [V1 DP2]. This in turn means that no secondary predication is involved in this structure, and thus, so-called subject-oriented resultatives are in fact not resultatives. On the other hand, in the bona fide resultative structure in (8b), V2 is a secondary predicate denoting a resultant state and is structurally lower than V1, which denotes a causing eventuality.

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[7] Here we assume that unlike a terminal node within a complex X^0 created via syntactic movement, a "lowered" terminal node can further undergo displacement via Local Dislocation under adjacency. For a similar approach to the post-verbal PP construction in Chinese, see Feng (2003).

In the remainder of this section, we present empirical data supporting our claim that V-*guàn* (V-accustomed) and V-*nì* (V-bored), which only have subject-oriented readings, involve the structure in (8a), whereas V-*lèi* (V-tired) and V-*fán* (V-bored) are structurally ambiguous between (8a) and (8b) and hence yield both subject-oriented and object-oriented readings.

2.1. V-V Compounds with Only Subject-Oriented Readings: V-*guàn* and V-*nì*

We begin with the unambiguous cases: V-*guàn* (V-accustomed) and V-*nì* (V-bored). To repeat, we claim that V-*guàn* and V-*nì* involve a complementation structure where V2 (i.e. *guàn* or *nì*), rather than V1, occupies the matrix verb position in the underlying structure, as shown in (11).

(11)　　[DP1　[$_{AspP}$ Asp　　[$_{VP}$ *guàn/nì* [$_{VP}$ V1　DP2]]]]

Our evidence in support of this analysis comes from (i) idiom chunks and (ii) bare NP interpretations.

First, V-*guàn* and V-*nì* allow V1 and DP2 to form an idiomatic VP. We show this with two VP idioms[8], *kāi yèchē* 'stay up all night (lit. drive a night car)' and *chī dòufu* 'flirt (lit. eat tofu)'. The following examples retain their idiomatic meanings despite the fact that the VP idioms are discontinuous on the surface.

(12) a. Tā　　**kāi**-guàn-le　　　　　**yèchē**.
　　　　3sg　　drive-accustomed-PERF　　night.car

　　　'He got accustomed to staying up all night.'

　　b. Nèi　　ge　yīshēng **chī**-nì-le　　　　hùshi-de　　**dòufu**,
　　　　that　　CL　doctor　eat-bored-PERF　　nurse-GEN tofu
　　　　yòu　　kāishǐ　**chī** bìngrén-de　　**dòufu** le.
　　　　again　start　　eat　patient-GEN　　tofu　　LE

　　　'Since that doctor got bored with flirting with nurses, he started to flirt with patients.'

Given the widely held assumption that all parts of an idiom must form a single contiguous constituent underlyingly, the grammaticality of the data above strongly suggests that these V-V compounds have a structure in which V1 and DP2 underlyingly form a constituent. Crucially, the examples in (12) argue for our complementation account, in which V1 and DP2 are analyzed as a constituent, and at the same time against the standard resultative analysis, in which V1 and DP2 do not form a syntactic constituent at any point of the derivation.

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[8] Here the term "idiom" is used in the conventional sense.

Second, in Chinese, bare NP objects are susceptible of three kinds of interpretation in episodic non-stative sentences: generic, definite and indefinite readings (see Cheng and Sybesma 1999, Shen 2005 for details). However, when a verb (or verbal complex) describes a bounded event, its bare NP object is always interpreted as definite (Sybesma 1999, cf. J. Li 1997).

(13) a. wǒ   hē-guāng-le   tāng
       I   drink-up-PERF   soup

    'I finished the/*some soup'

   b. wǒ   mǎi-zháo-le   shū
       I   buy-gotten-PERF   book

    'I managed to buy the/*some books'

   c. tā   chī-liǎo-le   bǐnggān
       he   eat-finished-PERF cookie

    'he finished the/*some cookies'   (Sybesma 1999: 174)

With this in mind, let us explore the interpretive possibilities of bare NP objects that appear with V-*guàn* (V-accustomed) and V-*nì* (V-bored). It is generally agreed that the resultative construction describes a bounded event, since by its very nature the result predicate serves to delimit an event. Thus, it is expected that the bare NP object in the resultative construction should always be interpreted as definite. However, V-*guàn* and V-*nì* do not meet this expectation. For example, in the following sentences, the bare NP objects of V-*guàn* and V-*nì* are allowed to receive generic interpretations.

(14) a. Rìběnrén   chī-guàn-le   Zhōngguócài.
       Japanese   eat-accustomed-PERF   Chinese.dishes

    'Japanese people got accustomed to eating Chinese dishes.'

   b. Rìběnrén   chī-nì-le   Zhōngguócài.
       Japanese   eat-bored-PERF   Chinese.dishes

    'Japanese people got bored with eating Chinese dishes.'

This clearly renders dubious the idea that *guàn* and *nì* denote resultant states. Note that bare NP objects appearing within a complementation structure can be interpreted as generic, as illustrated by the following example, in which the bare NP *bǐnggān* 'cookies' receives a generic reading.

(15)   Wǒ   xíguàn-le   chī   Zhōngguócài.
        I   be.used.to-PERF   eat   Chinese.dishes

       'I have got used to eating Chinese dishes.'

All things considered, it is fair to say that the resultative analysis of V-*guàn* and V-*nì* is untenable. Under our complementation analysis, however, the otherwise unexpected behavior of these compounds can be readily accounted for, as we have witnessed.

2.2. Ambiguous V-V Compounds: V-*lèi* and V-*fán*

In this subsection, we demonstrate that the derivations of V-*lèi* (V-tired) and V-*fán* (V-bored) under subject-oriented readings and those of V-*guàn* (V-accustomed) and V-*nì* (V-bored) follow the same paths. More specifically, V-*lèi* and V-*fán* under the subject-oriented readings have a complementation structure that looks like (16a), while under the object-oriented construal, they have the resultative structure in (16b).

(16) a. [DP1   [$_{AspP}$ Asp   [$_{VP}$ *lèi*/*fán* [$_{VP}$ V1   DP2]]]]

      b. [DP1   [$_{AspP}$ Asp   [$_{VP}$ V1 [$_{FP}$ F   [$_{XP}$ DP2 *lèi*/*fán*]]]]]

Furthermore, we claim that the V2 (i.e. *lèi* or *fán*) bears different meanings depending on which structure it occurs in. In the complementation structure, *lèi* and *fán* are interpreted as transitive psychological predicates, rather than one-place predicates taking an experiencer argument. More specifically, in the transitive use, V-*lèi* means something akin to English *be tired of* V-*ing*, and likewise V-*fán* means something akin to *be fed up with* V-*ing*. This semantic difference figures prominently in the case of *lèi*, since in the transitive use, it is always a psych predicate denoting mental fatigue, while in the intransitive use, it may describe the state of being physically exhausted, although the mental reading seems to be available in the latter case, too.

Indeed, it is a cross-linguistically robust fact that one-place predicates meaning 'be tired' and 'be bored' are also used as transitive psychological predicates, as demonstrated by the examples from French below.

(17) a. Jean   est   fatigué.
        Jean   be   tired

        'Jean is tired.'

      b. Jean   est fatigué de regarder   la   télévision.
         Jean   be tired   of   watch   Det   TV

        'Jean is tired of watching TV.'

(18) a. Jean   est   las.
       Jean   be   bored

     'Jean is bored.'

   b. Jean   est las   de regarder   la   télévision.
       Jean   be bored   of watch   Det   TV

     'Jean is bored with watching TV.'

Sybesma (1999) makes a similar observation to the effect that *lèi* 'tired' has a mental fatigue reading (at least to some speakers) in addition to a physical fatigue interpretation. Interestingly, he reports that those speakers who accept the mental reading of *lèi* also accept the following sentence, which pragmatically precludes the physical reading.[9]

(19) [%]Wǒ   qǐ-lèi-le   zhèi   pǐ   mǎ,   xiànzài yào   qǐ   nèi   pǐ.
      1sg   ride-tired-PERF   this   CL   horse   now   want   ride   that   CL

     'I got tired of riding this horse, so now I want to ride that one.' (Sybesma 1999: 56)

Building on Hoekstra's (1988) account of resultatives, Sybesma analyzes *lèi* as a two-place psych adjective (which approximately corresponds to *tired of* in English), and proposes that subject-oriented V-*lèi* is derived from the following structure.

(20)   [$_{VP}$ V1 [$_{AP}$ DP1   *lèi*   DP2]]

In this structure, V1 embeds an AP headed by a two-place psych adjective *lèi* 'tired of', so the whole sentence means that the event denoted by V1 causes the event in which the referent of DP1 is 'tired of' the referent of DP2.

Sybesma's proposal is similar to our account in the sense that *lèi* is treated as a two-place psych predicate. However, what makes our analysis significantly different from Sybesma's is that we analyze *lèi* as the matrix verb, whereas Sybesma assigns a resultative structure to V-*lèi*. In what follows, we present two arguments for our analysis, using the same tests we used in Section 2.1.

Firstly, as with V-*guàn* and V-*nì*, subject-oriented V-*lèi* and V-*fán* allow idiom chunks to appear as V1 and DP2, which indicates that V1 and DP2 underlyingly form a syntactic constituent as explained above. This is demonstrated by the following examples, where the relevant VP idioms are *pāi mǎ-pì* 'flatter (lit. to slap the horse's ass)' and *kāi yèchē* 'stay up all night (lit. drive a night car)', respectively.

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[9] The symbol "%" indicates variability in acceptance.

(21) a. Wǒ   yǐjing   **pāi**-lèi-le   shàngsi-de **mǎ-pì**.
　　　 1sg   already   slap-tired-PERF   boss-GEN horse-ass

　　　 'I'm already tired of flattering my boss.'

　　 b. Wǒ   yǐjing   **kāi**-fán-le   **yèchē**,   zài   yě   bù   xiǎng
　　　 1sg   already drive-bored-PERF night.car   again   also   NEG   want
　　　 áoyè   xiě   lùnwén.
　　　 stay.up.all.night   write   paper

　　　 'I got bored with staying up all night, so I no longer want to stay up all night writing a paper.'

Notice that this is not expected under Sybesma's account or the standard resultative analysis, both of which assume that V1 does not form a constituent with DP2 anywhere in the derivation.

　　　 Secondly, subject-oriented V-*lèi* and V-*fán* allow bare NP objects to be interpreted as generic, as demonstrated by the sentences in (22), which rule out object-oriented readings due to pragmatic reasons.

(22) a. Niánqīngrén   tīng-lèi-le   Zhōngguógē.
　　　 young.person   listen-tired-PERF   Chinese .song

　　　 'Young people got tired of listening to Chinese songs.'

　　 b. Niánqīngrén   tīng-fán-le   Zhōngguógē.
　　　 young.person   listen -bored-PERF Chinese .song

　　　 'Young people got bored with listening to Chinese songs.'

　　　 To conclude this section, we have shown that V-*guàn* and V-*nì* as well as subject-oriented V-*lèi* and V-*fán* are not resultative V-V compounds, and claimed that they actually involve complementation structures. In the following section, we discuss a semantic restriction on these subject-oriented V-V compounds known as the 'referentiality' restriction, and show that it is given a pragmatic explanation under our new account.

3. The 'Referentiality' Restriction

　　　 An interesting consequence of our complementation analysis is that it naturally accounts for a semantic constraint on subject-oriented V-V compounds known as the 'referentiality (or specificity) restriction'. It has been observed that the four kinds of V-V compounds we looked at in the previous section are sensitive to the referentiality of the object when they are subject-

oriented (see Cheng and Huang 1994, Huang 2006, Zhang 2001, 2007). Some of the judgments here are arguably gradient, as indicated by "?" below.[10]

(23) *Subject predication*

    a. Zhāngsān   zhuī-lèi-le   [OK]Lǐsì/ ?shéi/ ?nà ge rén / ?tā/ *sān ge rén/
       Zhangsan   chase-tired-PERF   Lisi / who / that person/ 3sg/ three persons/
       *jǐ ge rén.
       how many persons

       'Zhangsan chased [OK]Lisi/ ?who/ ?that person/ ?him/ *3 persons/ *how many persons got tired (?).'   (Hung 2006: 7)

    b. Zhāngsān   chī-nì-le   ?nà wǎn miàn   / ?zhè wǎn miàn /
       Zhangsan   eat-bored-PERF   that bowl of noodles / this bowl of noodles /
       ??jǐ wǎn miàn   / ??sān wǎn miàn.
       some bowls of noodles / three bowls of noodles

       'Zhangsan got bored with eating ?that bowl of noodles/ ?this bowl of noodles / ??some bowls of noodles / ??three bowls of noodles.'

    c. Zhāngsān   tīng-guàn-le   [OK]nà shǒu gē/ [OK]tā de huǎnghuà/ ?zhè ge gùshi/
       Zhangsan   listen-accustomed-PERF   that song /   his lie   / this tale/
       ?jǐ shǒu gē/ ??sān shǒu gē.
       some songs/ three songs

       'Zhangsan got accustomed to listening to [OK]that song/ [OK]his lie/ ?this tale/ ?some songs/ ??three songs.'

    d. Zhāngsān   tīng-fán-le   [OK]nà shǒu gē/ [OK]tā de huǎnghuà / ?zhè ge gùshi/
       Zhangsan   listen-bored-PERF   that song   / his lie   / this tale/
       ?jǐ shǒu gē / ??sān shǒu gē.
       some songs/ three songs

       'Zhangsan got bored with listening to [OK]that song/ [OK]his lie/ ?this tale/ ?some songs/ ??three songs.'

Based on our new account of those V-V compounds, we claim that it is not the referentiality of the object but the pragmatic (im)plausibility of complementation readings that is responsible for the (un)acceptability of these sentences. One advantage of this explanation is that by resorting to pragmatic considerations, it provides a rationale for the gradient judgments mentioned above.

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[10] The English translation given in (23a) is Huang's (2006).

As an illustration of our claim, consider the following example, which is infelicitous in an out-of-the-blue context.

(24)   ??Zhāngsān   chī-nì-le   sān wǎn miàn.
        Zhangsan   eat-bored-PERF   three bowl noodle

        'Zhangsan got bored with eating three bowls of noodles.'

We explain the infelicity of this example as follows. Assuming that subject-oriented compounds have complementation readings and that the use of a numeral quantifier induces a scalar implicature, (24) implies "Zhangsan got bored with eating exactly three bowls of noodles." However, this requires a pragmatically marked situation in which Zhangsan is bored with eating three bowls of noodles, while at the same time not being bored with eating more than or less than three bowls of noodles. Indeed, the judgment above considerably ameliorates through contextual manipulations as shown in (25), which supports our claim that the so-called referentiality restriction is a pragmatic epiphenomenon.

(25)   *Context: Zhangsan decided to eat exactly three bowls of noodles every day and has practiced this habit for one year, but finally:*
        Zhāngsān   chī-nì-le   sān   wǎn   miàn.
        Zhangsan   eat-bored-PERF   three   CL   noodle

        'Zhangsan got bored with eating three bowls of noodles.'

Furthermore, to the extent that the referentiality restriction is a pragmatic phenomenon, similar effects are expected in other languages, too. This expectation is warranted as shown by the following Japanese examples (see also Y. Li 1993: fn.3).

(26) a. John-ga   [OK]hon-o   / [OK]sono-hon-o   /??san-satu-no-hon-o
        John-NOM   book-ACC/ that-book-ACC   / three-CL-GEN-book-ACC
        sagasi-tukare-ta.
        look.for-tired-PERF

        'John got tired of looking for [OK]books/ [OK]that book/ ??three books.'

     b. John-ga   [OK]uta-o   / ?sono-uta-o   / ??san-kyoku-no-uta-o
        John-NOM   song-ACC / that-song-ACC / three-CL-GEN-song-ACC
        utai-aki-ta.
        sing-bored-PERF

        'John got bored with singing [OK]songs/ ?that song/ ??three songs.'

4. Idiomatic Subject-Oriented V-V Compounds

Thus far, we have successfully accounted for a number of exceptional properties of so-called subject-oriented 'resultative' compounds by showing that they are derived from 'non-resultative' structures. Before closing the paper, we would like to mention a class of DOR violations in Chinese V-V resultatives with transitive V1 that are not amenable to our analysis. That is, the examples in (27) are subject-oriented, but it is quite implausible that V2 of these V-V compounds is a transitive (psychological) predicate.

(27) a. Zhāngsān   chī-bǎo-le   fàn.
        Zhangsan   eat-full-PERF   rice

        'Zhangsan ate rice (and became) full.'

    b. Zhāngsān   hē-zuì-le   jiǔ.
        Zhangsan   drink-drunk-PERF   alcohol

        'Zhangsan drank alcohol and got drunk.'

As noted by Guo (1995), however, *chī-bǎo-fàn* and *hē-zuì-jiǔ* are idiomatic in nature. In other words, these expressions are, to a large extent, fixed and therefore unproductive. Thus, neither V2 nor the object can be replaced with other expressions, as demonstrated below.[11]

(28) a. ?*Zhāngsān chī-bǎo-le   miàn/ miànbāo/ jiǎozi.
        Zhangsan   eat-full-PERF   noodle/ bread/ dumpling

        'Zhangsan ate noodles/ bread/ dumplings and got full.'

    b. *Zhāngsān hē-zuì-le   wēishìjì/ píjiǔ.
        Zhangsan   drink-drunk-PERF   whiskey/ beer

        'Zhangsan drank whisky/ beer and got drunk.'

(29) a. *Zhāngsān chī-{kùn/ sǐ/ fēng/ bìng}-le   fàn.
        Zhangsan   eat-{sleepy/ dead/ crazy/ sick}-PERF   rice.

        'Zhangsan ate rice (and became) sleepy/ dead/ crazy/ sick.'

    b. *Zhāngsān hē-{dǎo/ bìng}-le   jiǔ.
        Zhangsan   drink-{fall/ sick}-PERF   alcohol.

        'Zhangsan drank alcohol and fell/ became sick.'

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[11] Of the eleven native speakers of Mandarin Chinese who contributed to the judgments of (28) and (29), there were two speakers who accepted the examples in (28a). It should be noted, however, that even those speakers who find such examples acceptable nevertheless rejected all the examples in (30).

A more compelling piece of evidence demonstrating the idiomaticity of these expressions comes from the fact that they fail to undergo pseudo-clefting and internal modification.

(30) a. *Zhāngsān chī-bǎo   de   shì   fàn.
        Zhangsan eat-full   GEN   COP   rice

      (Lit.) 'What Zhangsan ate full is rice.'

    b. *Zhāngsān chī-bǎo-le   nà-wǎn/dùn-fàn.
       Zhangsan   eat-full-PERF   that-CL-rice

      (Lit.) 'Zhangsan ate that bowl of rice/ that meal full.'

(31) a. *Zhāngsān hē-zuì   de   shì   jiǔ.
        Zhangsan drink-drunk   GEN   COP   alcohol

      (Lit.) 'What Zhangsan drank and got drunk is alcohol.'

    b. *Zhāngsān hē-zuì -le   nà-píng/bēi- jiǔ.
       Zhangsan   drink-drunk -PERF that-CL- alcohol

      (Lit.) 'Zhangsan drank that bottle of alcohol/ that cup of alcohol and got drunk.'

Hence there is good reason to believe that *chī-bǎo-fàn* and *hē-zuì-jiǔ* are idiomatic VPs, and as such, they are not complex predicates but behave as single predicates. In other words, these VPs do not involve secondary predication, and to that extent, the DOR is again irrelevant to them.

5. Conclusion

    In this paper, we have shown that subject-oriented V-V compounds with transitive V1 are not counterexamples to the DOR, contrary to the assumptions made in a number of previous studies. Instead, we have presented an analysis in which V-*guàn* (V-accustomed), V-*nì* (V-bored), V-*lèi* (V-tired), and V-*fán* (V-bored) are derived from complementation structures where V2 is interpreted as a two-place psych predicate embedding VP complementation. We have also demonstrated that a few instances that cannot be dealt with in the same manner are actually idioms and involve no secondary predication. Therefore, neither of these types of subject-oriented V-V compounds can be taken as counterexamples to the DOR.

    Admittedly, however, we have only given an explanation to one half of the present issue. That is, as mentioned in Section 1, there is another set of counterexamples to the DOR in Chinese V-V compounds, namely those resultative V-V compounds which involve unergative predicates as V1. Evidently, they require a separate explanation, which we leave for future research.

References

Burzio, L. (1986) *Italian Syntax: A Government-Binding Approach*, Reidel, Dordrecht.

Cheng, L. and C.-T. J. Huang. (1994) "On the Argument Structure of Resultative Compounds," In M. Chen and O. Tzeng, eds., *In Honor of William S.-Y. Wang: Interdisciplinary Studies on Language and Language Change*, Pyramid, Taipei, 187-221.

Cheng, L. and R. Sybesma. (1999) "Bare and Not-So-Bare Nouns and the Structure of NP," *Linguistic Inquiry* 30, 509–542.

Embick, D. and R. Noyer. (2001) "Movement Operations after Syntax," *Linguistic Inquiry* 32, 555-595.

Feng, S. (2003) "Prosodically Constrained Postverbal PPs in Mandarin Chinese," *Linguistics* 41, 1085-1122.

Guo, R. (1995) "Shujieshi de Peijia Jiegou he Chengfen de Zhenghe [Valence Structure of Verb-Resultative Complement and Integration of Constituents]," In Y. Shen and D. Zheng, eds., *Xiandai Hanyu Peijia Yufa Yanjiu*, Pekin University Press, Beijing, 168-191.

Harley, H. and R. Noyer. (1999) "Distributed Morphology," *Glot International* 4: 3-9.

Hoekstra, T. (1988) "Small Clause Results," *Lingua* 74, 101–139.

Huang, C.-T. J. (2006) "Resultatives and Unaccusatives: A Parametric View," *Chyuugokugogaku* 253, 1-43.

Kayne, R. (1994) *The Antisymmetry of Syntax*, MIT Press, Cambridge, MA.

Li, J. (1997) "Predicate Type and the Semantics of Bare Nouns in Chinese," In L.-J. Xu, ed., *The Referential Properties of Chinese Noun Phrases*, Centre de Recherches Linguistiques sur L'Asie Orientale, Paris, 61-84.

Li, Y. (1993) "Structural Head and Aspectuality," *Language* 69, 480-504.

Marantz, A. (1988) "Clitics, Morphological Merger, and the Mapping to Phonological Structure." In M. Hammond and M. Noonan, eds., *Theoretical Morphology: Approaches in Modern Linguistics*, Academic Press, San Diego, 253-270.

Perlmutter, D. M. (1978) "Impersonal Passives and the Unaccusativity Hypothesis," *Proceedings of the Fourth Annual Meeting of the Berkeley Linguistic Society*, Berkeley Linguistic Society, University of California, Berkeley, 157-189.

Pesetsky, D. (1995) *Zero Syntax: Experiencers and Cascades,* MIT Press, Cambridge, MA.

Rappaport H. M. and B. Levin. (2001) "An Event Structure Account of English Resultatives," *Language* 77, 766-797.

Rothstein, S. (2004) *Structuring Events: A Study in the Semantics of Lexical Aspect*, Blackwell, Oxford.

Shen, Y. (2005) *The Semantics and Pragmatics of Bare Noun Phrases in Chinese*, Fudan University Press, Shanghai.

Simpson, J. (1983) "Resultatives," In L. Levin et al., eds., *Papers in Lexical-Functional Grammar*, Indiana University Linguistics Club, Bloomington, Indiana, 143-157.

Sybesma, R. (1999) *The Mandarin VP: Studies in Natural Language and Linguistic Theory* 44, Kluwer, Dordrecht.

Tang, S.-W. (1997) "The Parametric Approach to the Resultative Construction in Chinese and English," *UCI Working Papers in Linguistics* 3, 203-226.

Wechsler, S. (1997) "Resultative Predicates and Control," *Texas Linguistics Forum* 38, 307-321.

Zhang, N. (2001) "The Structures of Depictive and Resultative Constructions in Chinese," *ZAS papers in Linguistics* 22, 191-221.

Zhang, N. (2007) "A Syntactic Account of the Direct Object Restriction in Chinese," *Language Research* 43, 53-75.