Chapter 10 Word order in the clause II: Position of the finite verb (verb-first/second)

Introduction

10.1. Placement of the finite verb

10.2. Verbal (X+V) collocations and verb-first/second

10.3. Verb-first/second: special cases

10.3.1. No Verb-first/second in main clauses?

10.3.2. Verb-first/second in embedded clauses?
Chapter 10 Word order in the clause II: Position of the finite verb (verb-first/second)

Introduction

This chapter takes as its point of departure the discussion in 9.2, which has shown that finite verbs can be found in basically two positions: the clause-final position in embedded clauses and the verb-first/second position in main clauses; the latter position is normally occupied by a complementizer in embedded clauses.

(1)  a. Marie zegt [dat Jan het boek leest].
    Marie says that Jan the book reads
    ‘Marie says that Jan is reading the book.’
  
    at this moment reads Jan the book
    ‘At this moment, Jan is reading the book.’

On the basis of these two positions, the clause can be divided into various “topological” fields: the clause-initial position, the middle field and the postverbal field. This is illustrated in Figure (2), repeated from Section 9.2. This chapter will focus on the placement of the verbs; the core observation is that complementizers and finite verbs compete for the C-position; because embedded clauses are obligatorily introduced by a complementizer normally, verb second is restricted to main clauses.

Section 10.1 starts by introducing the rule of verb-first/second which places finite verbs in the C-position in main clauses. Section 10.2 continues with a complicating issue, namely that verbal collocations may exhibit different behavior under verb-second: there are verbal, compound-like collocations that undergo verb-second as a whole, collocations that are split under verb-second, and collocations that resist verb-second altogether. In (3), we illustrate this for N+V collocations, but copious similar examples can be found with, e.g., particle verbs. We will discuss a number of properties that distinguish the three types of collocation.

(3)  a. dat Jan haar als verrader brandmerkt.                     [inseparable]
    that Jan her as traitor brands
    ‘that Jan stigmatizes her as a traitor.’

  a’. Jan brandmerkt haar als verrader.
    Jan brands her as a traitor
  
    b. dat Jan elke dag paardrijdt.                      [separable]
    that Jan every day rides.horseback
    ‘that Jan goes for a ride every day.’

  b’. Jan rijdt elke dag paard.
    Jan rides every day horseback
Section 10.3 concludes with a discussion of verb-first/second in a limited set of supposedly embedded adverbial clauses. Prototypical cases are conditional adverbial clauses such as (4b), which alternates with the regular embedded clause introduced by the complementizer-like element als ‘if’ in (4a).

(4) a. Als hij te laat komt, dan help ik hem niet meer.
   ‘If he arrives too late, then I won’t help him anymore.’

b. Komt hij te laat, dan help ik hem niet meer.
   ‘If he arrives too late, then I won’t help him anymore.’

c. Marie <*v>*stijl danst in het weekend <v>*stijl.
   Marie ballroom.dances in the weekend

10.1. Placement of the finite verb

Example (5a) shows that in embedded clauses verbs are situated in what is normally referred to as the clause-final position. Since the use of this notion may give rise to various misunderstandings, Subsection I starts by briefly discussing some potential problems with this notion. After this, Subsection II continues with a discussion of verb-first/second (often simply referred to as verb-second), that is, the movement operation that places the finite verb in the first or second position of main clauses. Verb-second is generally found in declarative clauses, in which the finite verb is preceded by the subject or some other phrase; wh-questions such as (5b) are prototypical instantiations of the latter case. Verb-first is found if the first position of the sentence remains (phonetically) empty; yes/no-questions such as (5c) are prototypical instantiations of this.

(5) a. dat Jan dat boek wil lezen
   that Jan that book wants read
   ‘that Jan wants to read that book.’

b. Wat wil finite Jan lezen?
   what wants Jan read
   ‘What does Jan want to read?’

c. Wil finite Jan dat boek lezen?
   wants Jan that book read
   ‘Does Jan want to read that book?’

Subsection III concludes the discussion of the placement of the finite verb by considering the verb-first/second rule from a cross-linguistic perspective.

I. Clause-final verbs

Verbs are normally in clause-final position; Subsection II will show that the only exception is the finite verb, which is moved into first/second position in main clauses. The use of the notion CLAUSE-FINAL POSITION is inadequate in various
respects. First, it suggests that the clause-final verbs demarcate the right boundary of the clause, whereas examples like (6a&b) show that they may in fact be followed by various other constituents, such as PP-complements and embedded clauses; see Chapter 12 for more discussion. The notion “clause-final” should therefore be defined more loosely as “in the right periphery of the clause”.

(6)  a.  dat Jan al de hele dag wacht op antwoord. 
     ‘that Jan has been waiting for an answer all day.’
     b.  dat Jan aan Peter vertelt dat hij naar Groningen gaat.
     ‘that Jan tells Peter that he’ll go to Groningen.’

Second, the use of the notion CLAUSE-FINAL POSITION may suggest that the clause-final verbs are base-generated as part of a verbal complex in a specific position of the clause. An example of such a verbal complex is given in (7), in which the finite verb moet ‘must’ is in clause-final position in the embedded clause in (7a), but moved into the second position in the main clause in (7b).

(7)  a.  dat hij dat boek morgen moet hebben gelezen. 
     ‘that he must have read that book by tomorrow.’
     b.  Hij moet dat boek morgen t_moo met hebben gelezen.
     ‘He must have read that book by tomorrow.’

Postulating a base-generated verbal complex is, however, not what is generally assumed in generative grammar: there are reasons for assuming that the verbs which enter the verbal complex are all base-generated as heads of independent verbal projections in a hierarchical structure. This structure is insightfully shown in the English translation of (7a) in (8). The structural representation in (8) formally expresses the intuition that the perfect auxiliary have selects a phrase headed by a participle and that the modal verb must selects a phrase headed by an infinitive; see Section 5.2 and Chapter 6 for extensive discussion.

(8)  that he must [have [read that book tomorrow]].

The fact that the verbs in the Dutch examples in (7) tend to cluster in clause-final position must therefore be epiphenomenal (which is clearly the case for the adjacent sequence of the verbs in English examples such as (8), which can easily be interrupted by adverbs) or the result of some movement operation. The latter is the option traditionally chosen for Germanic OV-languages like Dutch and German, and this has motivated the postulation of verb-clustering operations like Evers’ (1975) verb raising. We confine ourselves here to noting this issue, and refer the reader to Chapter 7 for an extensive discussion of verb clustering.

It should also be emphasized that the term clause-final position is a technical term which refers to a more deeply embedded position in the phrase structure, that is, a position at least internal to XP in Figure (2). Despite the fact that the finite verbs are “clause-final” in a pre-theoretical sense in the two primeless examples in
we will maintain that the finite verb is in clause-final position in the technical sense in (9a) only; in (9b) the finite verb is in second position (T or C). The difference between the two positions will become evident immediately if we add additional constituents, like the adverbial phrases graag ‘gladly’ and in het park ‘in the park’ in the primed examples.

(9) a. dat Jan *wandeld.  a’. dat Jan graag in het park *wandeld.
that Jan walked  that Jan gladly in the park walked
‘that Jan was walking.’  ‘that Jan liked to walk in the park.’
Jan walked  Jan walked gladly in the park
‘Jan was walking.’  ‘Jan liked to walk in the park.’

For the primed examples in (9), we will maintain that the adverbial phrases occupy not only the middle field in (9a’) but also in (9b’). This is, however, difficult to demonstrate in the latter case as the clause-final verb position is empty. In some cases, however, the presence of the clause-final position can be established indirectly with the help of some other element in the clause. This can be illustrated in a simple way by means of separable particle verbs like doorgeven ‘to pass on’ in (10). The primeless examples clearly show that nominal and clausal direct objects differ in that the former occupy a position in the middle field, whereas the latter occupy a position in the postverbal field of the clause. But the same can be indirectly established from the position of the particle door in the corresponding main clauses in the primed examples, given that particles are normally placed left-adjacent to the verb in clause-final position.

(10) a. dat Jan *<het zout> doorgaf <*het zout>.
that Jan the salt prt.-gave
‘that Jan passed the salt.’
a’. Jan gaf <het zout> door <*het zout>
Jan gave the salt prt.
‘Jan passed the salt.’
b. dat Jan *<dat Peter ziek was> doorgaf <dat Peter ziek was>.
that Jan that Peter ill was prt.-gave
‘that Jan passed the message on that Peter was ill.’
b’. Jan gaf <*dat Peter ziek was> door <dat Peter ziek was>.
Jan gave that Peter ill was prt.
‘Jan passed the message on that Peter was ill.’

There is a whole series of elements that are normally left-adjacent to the verb(s) in clause-final position, including *complementives and *stranded prepositions; we refer the reader to Chapter 13 for discussion and examples.

II. Verb-first/second

In main clauses, finite verbs are normally situated in the first or second position. We will adopt the generally accepted assumption from generative grammar that all verbs are base-generated in some lower position in the clause—they all head some projection of their own—and that finite verbs are special in that they can be moved
into the verb-first/second (C or T) position in main clauses. The special status of finite verbs is normally accounted for by assuming that the verb-first/second position contains temporal (T) and/or illocutionary force features (C) associated with the finite verb.

The contrast between embedded and main clauses with respect to the position of finite verbs is illustrated again in (11); note that gisteren ‘yesterday’ is in first position in (11a’) as a result of topicalization; in yes/no-questions such as (11b’), this position remains (phonetically) empty and the verb ends up in first position as a result. For this reason verb-first and verb-second are often considered special instantiations of a single rule, and verb-second is normally used as a cover term for the two cases, a practice that we will follow here.

(11) a. Marie zegt [dat Jan gisteren dat boek heeft gekocht]. [declarative]
    Marie says that Jan yesterday that book has bought
  ‘Marie says that Jan bought that book yesterday.’

  a’. Gisteren heeft Jan dat boek gekocht.
    yesterday has Jan that book bought
  ‘Jan bought that book yesterday.’

  b. Marie vraagt [of Jan gisteren dat boek heeft gekocht]. [interrogative]
    Marie asks if Jan yesterday that book has bought
  ‘Marie asks whether Jan bought that book yesterday.’

  b’. Heeft Jan gisteren dat boek gekocht?
    has Jan yesterday that book bought
  ‘Did Jan buy that book yesterday?’

The restriction of verb-second to main clauses suggests that complementizer insertion and verb-second are in complementary distribution. Under the traditional analysis, based on Paardekooper (1961) and Den Besten (1983), this follows from the claim that complementizers and finite verbs both target the C-position, as indicated in (12a). For completeness’ sake, we show in (12b) that a verb-second construction such as (11b’) is derived by means of an additional movement of some phrase into the specifier of CP, that is, the position immediately preceding the C-position. In yes/no-questions such as (11b’) the finite verbs ends up in first position because no phonetically realized material can be moved to the sentence-initial position (perhaps due to the presence of some empty question operator in the specifier of CP).

(12) a. \[
\text{[CP } \ldots \text{[C } \ldots \text{][TP Subject T [XP } \ldots \text{X [VP } \ldots \text{V } \ldots \text{]]]]]
\quad \uparrow \quad \downarrow \quad \text{Complementizer insertion}
\quad \text{Verb Second}
\]

b. \[
\text{[CP } \ldots \text{C [TP Subject T [XP } \ldots \text{X [VP } \ldots \text{V } \ldots \text{]]]]}
\quad \uparrow \quad \downarrow \quad \text{Verb Second}
\quad \text{Topicalization}
\quad \text{Question formation}
\]
The traditional analysis of verb-second in (12) maintains that in main clauses the finite verb always targets the C-position; consequently, any phrase preceding the verb in second position must have been placed there by means of topicalization (or wh-movement). Section 9.3 has shown, however, that subject-initial sentences differ from other verb-second sentences in that the finite verb can be preceded by an unstressed element: example (13a) is acceptable regardless of whether the subject pronoun is stressed or not, while the (b)– and (c)-examples in (13) show that other clause-initial (topicalized) phrases must be stressed.

(13) a. Zij/Ze moet mij helpen. [subject pronoun in initial position]
    she/she must me help
    ‘She must help me.’

    b. Haar/*’r moet ik helpen. [object pronoun in initial position]
    her/her must I help
    ‘I must help her.’

    c. Op haar/*’r wil ik niet wachten. [prepositional object in initial position]
    for her/her want I not wait
    ‘I don’t want to wait for her.’

    c’. Daarop/*Erop wil ik niet wachten. [pronominal PP in initial position]
    for that/for it want I not wait
    ‘I don’t want to wait for that.’

The (b)- and (c)-examples in (13) thus strongly suggest that phonetically reduced subject pronouns like ze ‘she’ in (13a) cannot occupy the specifier position of CP, which in turn suggests that they are located in the regular subject position, that is, the specifier of TP. Given that there is no a priori reason for assuming that non-reduced subject pronouns like zij ‘she’ and non-pronominal subjects must be treated differently, the null hypothesis seems to be that what we posit for phonetically reduced subject pronouns holds for all subjects. So we arrive at the hypothesis that subject-initial sentences normally have the structure in (14); See Travis (1984) and Zwart (1992/1997).

(14) • Subject-initial sentences
    \[\text{Verb Second} \quad [\text{TP} \text{Subject} \text{T} [XP \ldots X [VP \ldots V \ldots]]]\]

The Travis/Zwart-hypothesis, which assigns different structures to subject-initial sentences (TPs) and other verb-second constructions (CPs), may also explain another fact. The subject pronoun je ‘you’ triggers different types of agreement depending on its position relative to the finite verb, as shown in (15). Let us assume that the morphological realization of subject-verb agreement depends on the location of the finite verb in the clause, T or C; see Zwart (1997) and Postma (2011). In (15a) the finite verb occupies the T-position and second person singular agreement is morphologically expressed by -t, whereas in (15b) it occupies the C-position and second person singular agreement is expressed by -Ø.
1175  Syntax of Dutch: Verbs and verb phrases

(15)  a.  
\[ \text{TP Je krijgt} \ [\text{XP morgen een cadeautje } t_V] \].  
\[ \text{you get}_{2p,sg} \text{ tomorrow a present} \]  
‘You’ll get a present tomorrow.’

b.  
\[ \text{CP Morgen krijg-Ø} \ [\text{TP je } t_V \ [\text{XP morgen een cadeautje } t_V]] \].  
\[ \text{tomorrow get}_{2p,sg} \text{ you a present} \]  
‘You’ll get a present tomorrow.’

If we accept the proposals in (12b) and (14), the term verb-second no longer uniquely refers to verb movement into the C-position, and in the more recent formal-linguistic literature it is therefore often replaced by the more precise notions V-to-T and V-to-C. We will, however, stick to the term verb-second as a convenient descriptive term.

Since the Travis/Zwart-hypothesis is highly theory-internal, we will not discuss it in any further detail, but we do want to point out that it has given rise to various hotly debated issues. First, the Travis/Zwart-hypothesis presupposes that the T-position in Dutch is located to the left of the lexical projections of the verb(s), as depicted in (14), and thus diverges from the more traditional claim, motivated by the OV-nature of Dutch, that the T-position is located to the right of these projections; the base structure \([\text{CP .. C [TP .. [VP ..V ..] T]}]\) is not compatible with this hypothesis. Secondly, the Travis/Zwart-hypothesis is incompatible with the traditional claim that the complementary distribution of complementizer insertion and verb-second follows from the fact that the complementizer and the finite verb both target the C-position, given that the finite verb could in principle also be moved into the T-position; this is illustrated in (16b).

(16)  a.  
\[ \text{[c dat] Jan [T — ] dat boek gisteren heeft gekocht.} \]  
\[ \text{that Jan that book yesterday has bought} \]  
‘that Jan bought that book yesterday.’

b.  
\[ *\text{[c dat] Jan [T heeft ] dat boek gisteren } t_{heeft} \text{ gekocht.} \]  

Thirdly, the Travis/Zwart-hypothesis makes it impossible to account for the obligatory nature of verb-second in main clauses by simply stating that the C-position must be lexically filled; instead, we have to assume that the highest head position in the extended projection of the verb be lexically filled: T in subject-initial main clauses and C in other verb-second constructions as well as embedded clauses. Finally, the Travis/Zwart-hypothesis raises the question as to why the T-position cannot be filled in Dutch embedded clauses, that is, why examples such as (16b) are unacceptable. A functional explanation for this might be that a complementizer or a finite verb in first/second position is used in Dutch to signal the beginning of a new clause; see Zwart (2001) and Broekhuis (2008) for a formalization of this intuition; see Zwart (2011) for a more detailed review of theoretical approaches to verb-second.

III. A comparative perspective on the placement of the finite verb

The rules determining the placement of finite verbs in Dutch are relatively simple: finite verbs occur in the verb-second position in main clauses but occupy the so-called clause-final position in embedded clauses (where they cluster with the non-finite verbs). The examples in (17) illustrate this once again.
...V....X....T....C.......

The universal template in (18) can be taken to imply that the situation might very well have been different, in the sense that the Dutch rules are simply a more or less random selection from a wider range of verb movement possibilities. This is in fact confirmed by cross-linguistic evidence. Consider the Icelandic examples in (19), taken from Jónsson (1996:9-10). When we compare the primeless and primed examples, we see that, at least at face value, the finite verbs seem to occupy the same position in main and embedded clauses, and since the finite verb is adjacent to the subject we may assume that the position in question is T. The fact that the main verbs in the (a)- and (b)-examples occupy different positions with respect to the adverb *ekki* ‘not’ shows that non-finite verbs occupy a position lower in the structure than finite verbs (X or V depending on what the position of the direct object is taken to be). This suggests that finite verbs are moved from the V-position into the T-position in Icelandic (or the C-position in constructions with verb-subject inversion).

Jón read  not  this book  that Jón read  not  this book
‘Jón didn’t read this book.’  ‘that Jón didn’t read this book.’
Jón has  not  read  this book  that Jón has  not  read  this book
‘Jón hasn’t read this book.’  ‘that Jón hasn’t read this book.’

The difference between Dutch and Icelandic shows that these languages differ with respect to the question as to whether there is an asymmetry in verb movement between root and embedded clauses; the examples in (18) and (19) show that this is the case in Dutch, which is therefore classified as an asymmetric verb movement language, but not in Icelandic, which is therefore classed as a symmetric verb movement language. The examples in (20) show that English is also a symmetric verb movement language but exhibits an asymmetry between main and non-main verbs. The symmetric verb movement behavior in root and embedded clauses will
be clear from the comparison between the primeless and primed examples. The asymmetry between main and non-main verbs is clear from the contrast between the (a)- and (b)-examples, which shows that while non-main verbs must precede the frequency adverb often, main verbs must follow it.

(20) a. John often read this book.
   a'. that John often read this book.
   b. Jan has often read the book.
   b'. that John has often read this book.

There are also symmetric verb movement languages that do not have verb-second at all: Japanese, for example, consistently has the finite verb in clause-final position, as is illustrated in the examples in (21), cited from Tallerman (2015).

(21) a. Hanakoga susi-o tukurimasita.
   Hanako-NOM sushi-ACC made
   ‘Hanako made sushi.’
   b. Taroo-ga [Hanako-ga oisii susi-o tukutta to] itta.
   Taroo-NOM Hanako-nom delicious sushi-ACC made COMP said
   ‘Taro said that Hanako made delicious sushi.’

From a cross-linguistic perspective on verb movement, Dutch has at least the following distinctive properties: (i) it has V-to-T/C, (ii) V-to-T/C holds for main and non-main verbs, and (iii) V-to-T/C applies in root clauses only. The chart in (22) summarizes the differences with the other languages mentioned.

(22) Finite verb movement

<table>
<thead>
<tr>
<th>Language</th>
<th>V-to-T/C</th>
<th>Main/Non-main Verb</th>
<th>Root/Non-root Clause</th>
</tr>
</thead>
<tbody>
<tr>
<td>Icelandic</td>
<td>+</td>
<td>symmetric</td>
<td>symmetric</td>
</tr>
<tr>
<td>Dutch</td>
<td>+</td>
<td>symmetric</td>
<td>asymmetric</td>
</tr>
<tr>
<td>English</td>
<td>+</td>
<td>asymmetric</td>
<td>symmetric</td>
</tr>
<tr>
<td>Japanese</td>
<td>—</td>
<td>symmetric</td>
<td>symmetric</td>
</tr>
</tbody>
</table>

The properties in Table (22) correctly place Dutch in the same class as German. It should be noted, however, that Dutch and German differ in one important respect: whereas German sometimes allows verb-second in embedded clauses without complementizers, Dutch does not; see Haider (2010:46-8). The examples in (23) first show that German has two forms of embedded declarative clauses: one with the complementizer dass ‘that’ and a clause-final finite verb, and one without a complementizer and a verb in second position. Embedded verb-second especially occurs in cases in which the finite verb is a subjunctive; note that the adverbial phrase nie zuvor ‘never before’ is placed in clause-initial position in (23b) and that the verb precedes the subject, so that we may conclude that the finite verb occupies the C-position.
Position of the finite verb (verb-first/second) 1253

(23) a. Peter sagte [dass er nie zuvor so einen guten Artikel gelesen hättte].
    Peter said that he never before such a good article read had
    ‘Peter said that he’d never read such a good article before.’
       b. Peter sagte [nie zuvor hättte er so einen guten Artikel gelesen].
    Peter said never before had he such a good article read

The Dutch counterparts of (23) in (24) show that Dutch does not allow verb-second in embedded clauses. The number sign in (24b) indicates that this example is acceptable if the bracketed clause within straight brackets is construed as a direct quote, but this is not the intended reading here. For completeness’ sake, it should be noted that embedded verb-second constructions are possible in some non-standard varieties of Dutch; see Barbiers et al (2005: Section 1.3.1.8).

(24) a. Peter zei [dat hij nooit eerder zo’n goed artikel gelezen had].
    Peter said that he never before such a good article read had
    ‘Peter said that he’d never read such a good article before.’
       b. #Peter zei [nooit eerder had hij zo’n goed artikel gelezen].
    Peter said never before had he such a good article read

This section has shown that certain placements of finite verbs that are theoretically possible and in fact occur in other languages are excluded in Dutch. The universally valid template in (18) can be used to provide a descriptively adequate account of the variation in verb placement in the languages discussed in this section by setting the parameters in Table (22). The actual setting is, of course, a language-specific matter.

10.2. Verbal (X+V) collocations and verb-first/second

Verb-first/second is normally obligatory in main clauses, but there are cases in which it seems only marginally possible. A typical example is (25), with the N+V collocation touwtje springen ‘to (rope) skip’.

(25) a. dat Peter op straat touwtje springt.
    that Peter in the.street rope skips
    ‘that Peter is skipping in the street.’
       b. #Peter springt op straat touwtje.
       c. *Peter touwtje springt op straat.

Collocations like touwtje springen denote conventionalized activities and have word-like status, as is clear from the fact illustrated in (26) that this collocation can be placed as a whole in the verbal position of a progressive aan het + V_{infinite} phrase. However, the fact that the nominal part touwtje can also be separated from the verbal part springen suggests that we cannot analyze this collocation as a regular compound. For this reason, we will diverge from the orthographic convention to write such N+V collocations as a single word in order not to bias the discussion below towards a compound analysis for such collocations.

(26) dat Peter <touwtje> aan het <touwtje> springen is.
    that Peter rope AAN HET skip is
    ‘that Peter is skipping.’
Examples such as (25) can be approached in several ways. One possibility is to deny that collocations like *touwtje springen* have finite forms, as is claimed for a large set of such N+V collocations at taaladvies.net/taal/advies/vraag/703, probably on the basis of information provided by the Van Dale Dictionary. For many of these verbs, this cannot be maintained given that their finite forms are easy to find on the internet. A Google search (11/11/2013) on *[touwtje springt]* resulted in more than 300 hits, and a cursory inspection of these results showed that most of them indeed involve embedded clauses such as (25a). Actually, it is not difficult either to find past-tense examples: our Google searches on the strings *[touwtje sproong]* and *[touwtje sprongen]* resulted in more than 200 hits, two of which are given in (27).

(27) a. de buurmeisjes waarmee ik touwtje sprongt van hinkelde
    the girls.next.doør with.who I rope skipped or played.hopscotch
    ‘the girls next door with whom I skipped or played hopscotch’

    b. Er waren [...] een paar meisjes die touwtje sproongen.
    there were a couple [of] girls who rope skipped
    ‘There were a couple of girls who were skipping.’

A second possibility is to deny that the contrast between examples like (25a&b) is real and to assume that both types of examples are equally acceptable. This position can be supported by the fact that verb-second examples such as (25b) can indeed be found on the internet. The number of such examples is relatively small, however: our Google searches on *[springt touwtje]* and *[springt * touwtje]* resulted in, respectively, 136 and 56 hits, many of which were irrelevant or duplicates. Verb-second constructions with *touwtje springen* are especially popular in headlines, headers, captions of pictures and movies, etc. In regular texts, verb-second seems relatively frequent in sentences with a habitual reading and in sentences in which the collocation is used as part of a list (often in brief summaries of certain events); two typical examples are given in (28).

(28) a. Sylvia Goegebuur (sic) [...] springt touwtje als de beste ter wereld.
    Sylvia Goegebuur skips rope like the best in.the world

    b. Hij kruipt over de piano, trekt zijn hemd uit en springt touwtje
    he crawls over the piano takes his shirt off and jumps rope
    met de microfoon.
    with the microphone
    ‘He crawls all over the piano, takes off his shirt and skips with the mike.’

The past tense strings *[sproong touwtje]* and *[sproong * touwtje]* resulted in 95 hits in total, many of which were again irrelevant or duplicates: our estimate is that there were about 20 genuine cases of verb-second. Sentences in which the collocation is used as part of a list, as in *Hij liep, hij rende en sprong touwtje* ‘he walked, (he) ran and skipped’, again seem to be relatively frequent.

The results of our Google searches suggest a third possibility: for most speakers, verb-second of the finite form of the verbal part of N+V collocations like *touwtje springen* is disfavored, and since non-finite forms do not occur in second position, this verb is normally used in clause-final position only. Since these collocations express conventionalized activities, verb-second can easily be avoided
in many cases by employing the progressive *aan het* + V\text{infinitive} construction in (29a) instead of the verb-second construction in (29b).

(29) a. Peter is/was *<touwtje>* aan het *<touwtje>* springen.
   Peter is/was rope AAN HET skip
   ‘Peter is/was skipping.’

   b. ??Peter springt/sprong touwtje.
   Peter skips/skipped rope

A similar conclusion was drawn by Booij (2010:114) for the N+V collocation *stijl dansen*, despite the fact that some speakers seem to be able to treat this collocation as a true (inseparable) compound: examples such as (30b) can again normally be avoided by using the progressive construction *Hij is/was met zijn nichtje aan het stijldansen* ‘He is/was ballroom dancing with his niece’.

(30) a. dat hij met zijn nichtje stijl danst/danste.
   that he with his niece ballroom dances/danced
   ‘that he is/was ballroom dancing with his niece.’

   b. ??Hij stijldanst/stijldanste met zijn nichtje.

   c. *Hij danst/danste met zijn nichtje stijl.

Certain particle verbs have also been reported to disfavor verb-second. Such particle verbs are characterized by the fact that their particles are complex, like *voor-aan* in *voor aanmelden* ‘to preregister’, or preceded by the prefix *her-*, as in *her invoeren* ‘to reintroduce’; see Koopman (1995), Den Dikken (2003), and Vikner (2005), who discusses similar cases for German. In (31), we provide examples with the verb *(her)invoeren*. Bennis (1993) reports that some speakers consider examples like (31b’&c’) marginally acceptable, and taaladvies.net/taal/advies/vraag/377 reports that the split patterns occurs in Belgium.

(31) a. dat hij die regel invoert. a’. dat hij die regel her invoert.
   that he that rule prt.-introduces that he that rule reintroduces
   ‘that he introduces that rule.’ ‘that he reintroduces that rule.’

   b. Hij voert die regel in. b’. ??Hij voert de regel her in.

   c. *Hij invoert die regel. c’. *?Hij her invoert die regel.

The discussion above strongly suggests that there is a set of verbal (X+V) collocations that resist verb-second; following Vikner (2005), we will refer to such collocations as IMMOBILE VERBS. The fact that it is not difficult to find cases such as (29b) and (30b) on the internet suggests, however, that collocations like *touwtje springen* and *stijl dansen* are sometimes also treated as separable or compound verb forms. This raises the question as to whether we are dealing with a syntactic/morphological restriction or whether some other restriction is involved. For example, it might be the case that verb-second is syntactically possible but restricted for some reason to cases in which the speaker cannot resort to the *aan het* + V\text{infinitive} construction, as might be the case in the examples in (28), or that verb-second is restricted to sports jargon, that is, used by individual speakers who are involved with the activity denoted by the collocation in question on a more regular basis.
In order to shed more light on this issue, the following subsections will investigate the properties of verbal collocations in more detail. Our point of departure will be that such collocations can be divided into the three main types in (32): inseparable collocations are compounds that undergo verb-second as a whole, separable collocations are phrase-like constructions that split under verb-second, and immobile collocations tend to resist verb-second.

(32) a. Inseparable verbal collocations (compounds): bek\textsubscript{N} + vechten ‘to squabble’, lief\textsubscript{A} + kozen ‘to fondle’, hoeste\textsubscript{V} + prosten ‘to cough and splutter’

b. Separable verbal collocations: adem\textsubscript{N} + halen ‘to breathe’, pianon\textsubscript{N} + spelen ‘to play the piano’, paard\textsubscript{N} + rijden ‘to ride (on horseback)’

c. Immobile verbal collocations: touwtj\textsubscript{N} + springen ‘to (rope) skip’, stijl\textsubscript{N} + dansen ‘to ballroom dance’, zweef\textsubscript{V} + vliegen ‘to glide (in a sailplane)’

Subsections I-V investigate the properties of inseparable and separable verbal collocations. We will show that the set of verbs that are traditionally assumed to be separable is in fact not a unitary class but falls apart in at least two subgroups, one of which is separable under verb-second and another which is not; the latter group will be shown to be immobile in the sense of Vikner (2005). Subsection V concludes this part of the discussion with an attempt at an analysis. The results of the investigation in Subsection I-V will be applied to various types of immobile verbs: Subsections VI-VIII focus on three different subtypes of immobile N+V collocations while Subsection IX investigates inseparable complex particle verbs; Subsection X concludes with a brief discussion of a type of immobile verb that has received relatively little attention in the literature so far.

I. Separable and inseparable verbal collocations

This subsection discusses verbal collocations with a noun, adjective or a verb as their first member. Generally speaking, we find two syntactically relevant types: inseparable and separable collocations. It seems that this distinction weakly correlates with the semantic/syntactic status of the left-hand member, as Ackema (1999) notes that in separable collocations the left-hand member is normally an argument of the verbal part. This is illustrated in (33). The verb vechten ‘to fight’ in (33a) is intransitive and N-part bek ‘mouth’ is interpreted as having the semantic role of instrument; cf. met de bek vechten ‘to fight with the mouth’. The verb halen ‘to get’ in (33b) is transitive and the N-part adem ‘breath’ is interpreted as a theme argument. The primed examples show that only in the latter case can the N+V collocation be split.

(33) a. dat deze jongens voortdurend bek vechten. [inseparable/compound]
   that these boys continuously mouth fight
   ‘that these boys squabble continuously.’

   a’. Deze jongens <bek> vechten voortdurend <*bek>.
   these boys mouth fight continuously

b. dat de patiënt moeilijk adem haalt. [separable]
   that the patient with.difficulty breath takes
   ‘that the patient is breathing with difficulty.’

b’. De patiënt <*adem> haalt moeilijk <adem>.
   the patient breath takes with.difficulty
In (34), we provide a sample of the two types of N+V collocation, based on De Haas & Trommelen (1993) and Booij (2010). We do not include inseparable verbs such as voetballen ‘to play soccer’ that are (potentially) derived via °conversion from complex nouns (here: voetbal ‘football’) or formations like raadplegen ‘to consult’ with a non-transparent or non-compositional meaning for present-day speakers because these are expected to be inseparable anyway. Recall that we diverge from the orthographic convention to write the N+V collocations in (34b) as a single word in order not to bias the discussion below towards a compound analysis for these collocations.

(34)  
- N+V collocations
  a. Inseparable: beeldhouwen ‘to sculpture’, bekvechten ‘to squabble’, rangschikken ‘to group’, redetwisten ‘to argue’, slaapwandelen ‘to walk in one’s sleep’, zegevieren ‘to triumph’

Note that we used the notion ‘weak correlation’ in order to characterize Ackema’s hypothesis. The reason is that it is not the case that N+V collocations are always separable if the N-part functions as a theme. This can be readily illustrated by means of the collocation stof zuigen ‘to vacuum’, which can be used either as a separable or as an inseparable collocation by many speakers. There is reason, however, for assuming that the N-part has lost its argument status in the inseparable form; see Ackema (1999) and the discussion of the examples in (44) in Subsection II.

(35)  
a. dat Jan elke week stof zuigt.
   that Jan every week dust sucks
   ‘that Jan vacuums every week.’

b. Jan <stof> zuigt elke week <stof>.
   Jan dust sucks every week

We should further raise a warning flag and note that there are a number of cases of separable N+V collocations for which it is less clear that the N-part functions as a (direct) argument of the V-part. This holds for, e.g., piano spelen ‘to play the piano’ and televisie kijken ‘to watch television’, given that spelen and kijken select a PP-complement in examples such as (36). In order to maintain the claim that the N-part is an argument of the V-part, we have to assume that the PP-complement is reduced in the separable N+V collocations piano spelen and televisie kijken; see Ackema (1999) and Booij (2010) for a discussion of these forms.

(36)  
a. Jan speelt *(op) een Steinway.
   Jan plays on a Steinway
   ‘Jan is playing on a Steinway.’
b. Jan kijkt *(naar) de televisie.
   Jan looks at the television
   ‘Jan is looking at the television.’

The examples in (37) illustrate that the two main types can also be found in the case of A+V collocations: (37a) is an example with the inseparable (compound) verb *liefkozen* ‘to fondle’ and (37b) with the separable collocation *bekend maken* ‘to make known’.

(37) a. dat Jan zijn hond vaak liefkoost. [inseparable/compound]
    that Jan his dog often fondles
    ‘that Jan often fondles his dog.’
   a’. Jan <lief>koost zijn hond vaak <*lief>.
    Jan fondles his dog often
   b. dat Jan zijn besluit morgen bekend maakt. [separable]
    that Jan his decision tomorrow known makes
    ‘that Jan will make his decision public tomorrow.’
   b’. Jan <*>bekend maakt zijn beslissing morgen <*>bekend>.
    Jan known makes his decision tomorrow

When we exclude examples such as *blinddoeken* ‘to blindfold’, which is derived from the complex noun *blinddoek* ‘blindfold’, and cases such as *dwarsbomen* ‘to thwart’ with a non-transparent or non-compositional meaning for the present-day speaker, there are very few inseparable A+V collocations; the examples in (38a) are again taken from De Haas & Trommelen (1993). For the separable A+N collocations in (38b), Ackema’s hypothesis that the left-hand member of the collocation is normally an argument of the verbal part of the collocation seems too strict, but we can easily repair this by loosening the statement slightly by requiring that the left-hand member must be a complement of the verbal part, as this will also include complementives. Again, we diverge from the orthographic convention to write separable A+V collocations as separate words in order not to bias the discussion below towards a compound analysis for these collocations.

(38) • A+V collocations
   a. Inseparable: *fijnproeven* ‘to test the taste of something’, *liefkozen* ‘to fondle’
   b. Separable: *dood zwijgen* ‘to hush up/smother’, *droog leggen* ‘to reclaim/impolder’, *dwars liggen* ‘to be contrary’, *fijn malen* ‘to grind’, *goed keuren* ‘to approve’, *groot brengen* ‘to bring up’, *klar komen* ‘to complete one’s work/have an orgasm’, *los breken* ‘to break loose’, *stuk lezen* ‘read to pieces’, *vol gieten* ‘to fill up’, *vreemd gaan* ‘to be unfaithful’, *wit wassen* ‘to launder (black money)’, *zwart maken* ‘to blacken’

The proposed revision of Ackema’s hypothesis, which we will from now on refer to as Ackema’s generalization, also accounts for the fact that particle verbs (P+V collocations) like *opbellen* ‘to call up’ and *overstromen* ‘to run over’ in (39) are normally separable because Section 2.2 has shown that verbal particles also function as complementives. Although there are a number of inseparable P+V collocations, we will not digress on this here, as this would simply repeat the
discussion in Section P1.2.4.4. We will in fact ignore P+V collocations altogether until we return to them in Subsection IX.

(39) a. Jan belde me op.
    Jan called me up

b. De emmer stroomde over.
    the bucket ran over
    ‘The bucket overflowed.’

There are very few inseparable V+V collocations like hoestproesten ‘to cough and splutter’ in (40a); more transparent cases such as zweefvliegen ‘to glide (in a sailplane)’ belong to the set of immobile collocations, which will be discussed in Subsection IV. Separable V+V collocations are also rare and may in fact not exist at all: a potential case is laten vallen ‘to drop’ in (40b), but the fact that the dependent verb vallen ‘to fall’ does not precede but follows the causative verb laten ‘to make/let’ suggests that we are not dealing with a verbal collocation but with a regular causative laten-construction. We therefore will not discuss such cases here but in Section 5.2.3.4.

(40) a. dat Jan voortdurend hoestproest.
    that Jan continuously splutters
    ‘that Jan is continuously coughing and spluttering.’

a’. Jan hoestproest voortdurend.
    Jan splutters continuously

b. dat Jan de theepot liet vallen.
    that Jan the teapot let fall
    ‘that Jan dropped the teapot.’

b’. Jan liet de theepot vallen.
    Jan let the teapot fall

This subsection has shown that separable verbal collocations require their first member to function as a complement of the verbal part: the N-part in N+V collocations has the function of a direct (and sometimes prepositional) object of the V-part, and the A-part in A+N collocations functions as a complementive, that is, a predicative complement of the V-part. Since there are no clear cases of separable V+V collocations and since particle verbs are discussed separately in Subsection IX, the following subsections will be concerned with N+V and A+V collocations.

II. Differences between separable and inseparable verbal collocations

On the assumption that inseparable X+V collocations are true compounds, their syntactic behavior can be accounted for by appealing to the 9 lexical integrity constraint, according to which syntactic operations cannot apply to subparts of words. An inseparable N+V collocation like bekvechten ‘to squabble’ should then be analyzed as [v- bekvechten], in which the label V° stands for a word boundary. By the same logic, separable N+V collocations cannot be analyzed as compounds but should be phrasal in nature: a separable N+V collocation like adem halen should then be analyzed as [v- adem [v- halen]], in which the label V’ stands for some phrasal projection of the verb that contains a direct object.
There is morphological and syntactic evidence in favor of this distinction. First, we would expect inflectional material to attach at the Vº- and not at the V'-level, and thus we predict that the nominal part follows preverbal inflectional material in the case of (inseparable) compound verbs but precedes such material in the case of (separable) phrasal collocations. The examples in (41) shows that this prediction is correct: the preverbal part of the participial °circumfix ge-....-d/t and the infinitival prefix te must precede the nominal part in bekvechten but must follow it in adem halen for most speakers.

(41) a. De jongens hebben de hele dag gebekvechten/bek gevecht.
    the boys have the whole day squabbled
    ‘The boys have squabbled all day.’

a'. De jongens liepen de hele dag te bekvechten/bek te vechten.
    the boys walked the whole day to squabble
    ‘The boys were squabbling all day.’

b. Jan heeft twee keer diep adem geademaald/*geademhaald.
    Jan has two time deep breath taken
    ‘Jan has taken a deep breath twice.’

b’. Jan probeerde diep adem te halen/*te ademhalen.
    Jan tried deep breath to take
    ‘Jan tried to take a deep breath.’

Note in passing that there seems to be some variation among speakers, especially with regard to the infinitival marker te. For example, a Google search (11/5/2013) showed that the form bek te vechten is occasionally used on the internet (perhaps in jest), whereas we did not get any hits for the strings [heb bekgevecht] and [heb * bekgevecht], in which the asterisk functions as a wild card. Similarly, the form te ademhalen is not difficult to find (albeit with a far lower frequency than adem te halen), whereas we found only a handful of genuine cases with the form geademhaald. The judgments in (41) reflect our own acceptability judgments and may thus be an idealization of the actual situation in Standard Dutch.

The form of the past participle gebekvecht in (41a) constitutes an additional argument in favor of a compound analysis, given that the participle of the simplex verb vechten has the irregular form gevochten. De Haas & Trommelen (1993:441) claim that a hallmark of compounds is that they have a regular declension; this is illustrated again in (42), in which glimlachen is an inseparable N+V compound and paard rijden is separable phrasal N+V collocation; only in the former case does the collocation have the regular declension ge-....-d/t.

(42) a. lachen — gelach-en
    laugh    laughed
    [inseparable]

a'. glimlachen — geglimlach-t
    smile    smiled

b. rijden — gered-en
    ride    ridden
    [separable]

b’. paard rijden — paard gered-en
    horseback ride horseback ridden
A rather spectacular illustration of De Haas & Trommelen’s claim is *stof zuigen*. The examples in (35) have shown that this collocation exhibits mixed behavior for many speakers: the N+V collocation can be split under verb-second, but it can also be moved as a whole. The simplex verb *zuigen* ‘to suck’ has an irregular declension: *zuig-zoog-gezogen*. The predictions made by De Haas & Trommelen’s hypothesis are clear. First, we predict that *stof zuigen* ‘to vacuum’ is associated with two past participial forms, depending on the position of the nominal part. The primeless examples in (43) illustrate that this prediction is indeed correct. Second, we predict that the split under verb-second is possible only if the finite verb has the irregular declension; the primed examples show that this predication is also correct.

(43) a. Jan heeft gisteren *stof* gezogen/*gezuigd.
   Jan has yesterday dust sucked
   ‘Jan vacuumed yesterday.’

b. Jan heeft gisteren gestofzuigd/*gestofzogen.
   Jan has yesterday dust.sucked
   ‘Jan vacuumed yesterday.’

Note in passing that we have ignored the fact that the form *stofzoog* is occasionally found in second position on the internet, which is in fact to be expected given that speakers are quite uncertain about the “correct” form of the past tense, as is clear from the fact that it is a recurring topic of discussion on the internet. Note that there is also normative pressure to use the inseparable form, as is clear from the fact that taaladvies.net/taal/advies/vraag/755 and the Van Dale Dictionary only give the regular declension.

The claim that *stof zuigen* allows two different analyses is also confirmed by the examples in (44), adapted from De Haas & Trommelen (1993:442). These examples show that this collocation can be used with the direct object *de kamer* ‘the room’ when it has a regular declension, but not when it has an irregular declension.

(44) a. dat Jan de kamer stofzuigt/*stof zoog.
    that Jan the room dust.sucks/dust sucks
    ‘that Jan is vacuuming the room.’

b. dat Jan de kamer heeft gestofzuigd/*stof gezogen.
    that Jan the room has dust.sucked/dust sucked
    ‘that Jan has vacuumed the room.’

This contrast follows immediately on the analysis proposed above: if *stof zuigen* is phrasal, the bare noun *stof* functions as a direct object, and thus blocks the addition of another direct object such as *de kamer* ‘the room’: if it is a compound, however, it might simply be stored in the lexicon as a transitive verb, and, consequently, the use of a direct object such as *de kamer* is fully licit. Other cases of such transitive, inseparable N + V collocations mentioned by Ackema (1999) are: *beeldhouwen* ‘to sculpture’ (lit: statue + chop) stand *hersenspoelen* ‘to brainwash’.
In (45) we provide similar examples for A+V collocations: liefkozen ‘to fondle’ (lit.: sweet + caress) is a compound and the adjectival part lief must therefore follow the preverbal part of the participial circumfix ge-...-d/t and the infinitival prefix te; bekend maken ‘to make public’, on the other hand, is phrasal and the adjectival part must therefore precede these elements.

(45) a. Jan heeft zijn hond de hele dag geliefkoosd/*liefgekoosd.
    Jan has his dog the whole day fondled
    ‘Jan has fondled his dog all day.’

    a’. Jan zit zijn hond de hele dag te liefkozen/lief te kozen.
    Jan sits his dog the whole day to fondle
    ‘Jan has been fondling his dog all day.’

    b. Jan heeft zijn beslissing bekend gemaakt/*gebekendmaakt.
    Jan has his decision known made
    ‘Jan has made his decision public.’

    b’. Jan weigert zijn beslissing bekend te maken/*te bekend maken.
    Jan refuses his decision known to make
    ‘Jan refuses to make his decision public.’

This subsection has shown that there are reasons for assuming that inseparable verbal collocations are compounds whereas separable verbal collocations are phrasal in nature. The reasons for assuming this are mainly morphological in nature. The first involves the placement of the (preverbal part of) the inflectional affixes ge-...-d/t and te. The second is that the inseparable verbal collocations always have a regular declension, which has been claimed to be a hallmark of compounds; the declension of the verbal part of separable verbal collocations, on the other hand, is fully determined by the verbal part.

Table 1: Differences between inseparable and separable verbal collocations

<table>
<thead>
<tr>
<th></th>
<th>INSEPARABLE</th>
<th>SEPARABLE</th>
</tr>
</thead>
<tbody>
<tr>
<td>PARTICIPIAL AFFIX</td>
<td>ge-X+V-d/t</td>
<td>X ge-V-d/t</td>
</tr>
<tr>
<td>INFINITIVAL PREFIX</td>
<td>te X+V</td>
<td>X te V</td>
</tr>
<tr>
<td>DECISION</td>
<td>always regular</td>
<td>depends on verbal part</td>
</tr>
</tbody>
</table>

III. Similarities between separable and inseparable N+V collocations

Although the discussion in Subsection II strongly suggests that separable N+V collocations are phrasal and that the N-part normally functions as a direct (or, perhaps, a prepositional) object of the V-part, the collocation has a number of properties normally not found with verb phrases consisting of a verb and an object. With regard to these peculiarities, separable N+V collocations rather behave like N+V compounds. We will illustrate this compound-like behavior of separable N+V collocations by comparing the separable collocations adem halen ‘to breathe’ and piano spelen ‘to play the piano’ with the regular verb phrase iets halen ‘to fetch something’ and iets spelen ‘to play something (e.g., a sonata)’.

A first property is that the N-part of a separable N+V collocation is normally bare, that is, not accompanied by a determiner, whereas singular regular direct
objects are normally not bare, that is, they require a determiner. Notice that this difference is not observable if the N-part is plural, as in aardappels schillen ‘to peel potatoes’, given that indefinite plurals take a phonetically empty article.

(46) a. dat Jan (*een) adem haalt.  b. dat Marie (*de) piano speelt.

that Jan a breath gets that Marie the piano plays
‘that Jan is breathing.’  ‘that Marie is playing the piano.’

a’. dat Jan *(een) boek haalt.  b’. dat Marie *(de) sonate speelt.

that Jan a book gets that Marie the sonata plays
‘that Jan is fetching a book.’  ‘that Marie is playing the sonata.’

Related to this difference concerning the determiner is the fact that the nominal part of the N+V collocation is not referential. This can be shown by comparing the examples in (47): example (47a) cannot be uttered out of the blue given that the reference of the deictic pronoun hij cannot be properly determined by the bare noun piano; example (47b) with the regular direct object de sonate ‘the sonata’, on the other hand, is fine since the pronoun can take this object as its antecedent.

(47) a. dat Jan niet graag piano speelt, want hij is vals.

that Jan not gladly piano plays, because he is off-key
‘that Jan doesn’t like to play the piano, because it is off-key.’

b. dat Jan niet graag de sonate speelt, want hij is te moeilijk.

that Jan not gladly the sonata plays because he is too difficult
‘that Jan doesn’t like to play the sonata, because it is too difficult.’

For the same reason it is normally impossible to modify the nominal part of an N+V collocation by an attributively used adjective, whereas this is, of course, possible with regular direct objects, as shown by the examples in (48).

(48) a. dat Jan niet graag (*nieuwe) piano speelt

that Jan not gladly new piano plays
‘that Jan doesn’t like to play the new piano.’

b. dat Jan niet graag de (nieuwe) sonate speelt.

that Jan not gladly the new sonata plays
‘that Jan doesn’t like to play the new sonata.’

In passing, it should be noted that attributive modification of the nominal part of a separable N+A collocation is marginally possible if the modifier-noun combination has a type reading: Booij (2010), for example, provides examples such as dat Jan klassieke piano speelt. However, the fact that Booij translates this example as “that John plays classical piano music” suggests that we may simply be dealing with a regular direct object in the form of a mass noun, comparable to Hij speelt klassieke muziek/jazz ‘He plays classical music/jazz’. We will leave this issue for future research and simply conclude from the examples above that nominal parts of N+V collocations are not referential. In this respect they are similar to the first members of N+V compounds like beeldhouwen ‘to sculpture’, N+A compounds like boterzacht ‘soft as butter’, and N+N compounds like huissleutel ‘latchkey’, but unlike regular direct objects.

A second property of the N-part of separable N+V collocations is that speakers allow them to permeate clause-final *verb clusters. This is, of course, obligatory for
the nominal parts of N+V compounds, but for regular direct objects this is allowed by a subset of Flemish speakers only; see Sections 5.2.3 and 6.2, and Barbiers (2008:ch.2).

(49) a. dat Jan diep <adem> moet <adem> halen. 
that Jan deeply breath must get
‘that Jan must breathe deeply.’

a’. dat Jan <een boek> moet <een boek> halen. 
that Jan a book must get
‘that Jan must fetch a book’

b. dat Marie graag <piano> wil <piano> spelen. 
that Marie gladly piano want play
‘that Marie is eager to play the piano.’

b’. dat Marie graag <de sonate> wil <de sonate> spelen. 
that Marie gladly the sonata want play
‘that Marie is eager to play the sonata.’

A third property of the N-part of a separable N+V collocation is that it can be left-adjacent to the main verb in the progressive aan het + V\textsubscript{infinitive} construction; regular direct objects, on the other hand, must precede the aan het + V\textsubscript{infinitive phrase}.

(50) a. Jan is verkeerd <adem> aan het <adem> halen. 
Jan is wrongly breath AAN HET get
‘Jan is breathing in the wrong way.’

a’. Jan is <een boek> aan het <*>een boek> halen. 
Jan is a book AAN HET get
‘Jan is fetching a book.’

b. Marie is <piano> aan het <piano> spelen. 
Marie is piano AAN HET play
‘Marie is playing the piano.’

b’. Marie is <de sonate> aan het <*>de sonate> spelen. 
Marie is the sonata AAN HET play
‘Marie is playing the sonata.’

A final property in which N-parts of separable N+V collocations differ from regular direct objects is that they cannot easily occur as part of a postnominal van-PP in nominalizations, as is illustrated in (51).

(51) a. [Het halen van een boek/??adem] is gemakkelijk. 
the getting of a book/breath is easy
‘Getting a book is easy.’

b. [Het spelen van een sonate/??piano] is niet gemakkelijk. 
the playing of a sonata/piano is not easy
‘Playing of a sonata isn’t easy.’

The discussion above has shown that the N-part of N+V collocation has various properties that are unexpected for regular direct objects but resemble the properties of the N-part of a N+V compound: (i) it is not referential, (ii) it is allowed to interrupt clause-final verb clusters, and (iii) it can be left-adjacent to the main verb
in the progressive aan het + V\textsubscript{infinitive} construction. The first property is, of course, inapplicable to A+V collocations, but the examples in (52) show for \textit{fijn malen} ‘to grind’ that the latter two properties can also be established for such cases.

(52) a. dat Jan de peper <fijn> moet <fijn> malen.
    that Jan the pepper to.a.powder must grind
    ‘that Jan must grind the pepper.’

b. dat Jan de peper <fijn> aan het <fijn> malen is.
    that Jan the pepper to.a.powder AAN HET grind is
    ‘that Jan is grinding the pepper.’

The findings from our discussion above are summarized in Table 2.

\begin{table}[h]
\centering
\begin{tabular}{|c|c|c|}
\hline
               & INSEPARABLE & SEPARABLE \\
\hline
N IS REFERENTIAL & no          & no          \\
\hline
VERBAL CLUSTERS  & V X V\textsubscript{main} & V X V\textsubscript{main} or X V V\textsubscript{main} \\
\hline
\hline
AAN HET-CONSTRUCTION & aan het X V\textsubscript{main} & aan het X V\textsubscript{main} or X aan het V\textsubscript{main} \\
\hline
\end{tabular}
\caption{Similarities between inseparable and separable verbal collocations}
\end{table}

\textbf{IV. Immobile verbal collocations (1): introduction}

Table 2 shows that separable X+V collocations like (34b) and (38b) exhibit variable behavior with respect to the placement of the X-part vis-à-vis the verbal part in constructions with a clause-final verb cluster or a progressive aan het-phrase. This raises the question as to whether it is justified to consider separable X+V collocations as a single class, or whether we should distinguish two subtypes. This question has been investigated for N+V collocations, and it seems that there is reason for assuming the latter; see Booij (2010: Section 4.3). The argument is based on the morphological expression of sentence negation. In Dutch, sentence negation can be expressed by means of the independent negative adverb \textit{niet} ‘not’, as in (53a), but it is often obligatory merged with some existentially quantified element in the clause, as is illustrated in (53b&c). Here, negation is expressed on, respectively, a frequency adverb (NEG + \textit{ooit} → nooit ‘never’) and an indefinite direct object (NEG + \textit{een auto} → geen auto ‘no car’).

(53) a. Peter kan niet komen.
    Peter is.able not come
    ‘Peter can’t come.’

b. Peter kan nooit/#niet ooit komen.
    Peter is.able never/not some.time come
    ‘Peter is never able to come.’

c. Peter kan geen auto/#niet een auto kopen.
    Peter is.able no car/not a car buy
    ‘Peter can’t buy a car.’

The examples in (54) further show that the merger of sentence negation is optional in the case of N+V collocations like \textit{auto rijden} ‘to drive a car’ and \textit{piano spelen} ‘to play the piano’; it can either be expressed by means of the adverb \textit{niet} ‘not’ or be expressed by the negative article \textit{geen} ‘no’.

(54) a. dat Jan de peper <fijn> moet <fijn> malen.
    that Jan the pepper to.a.powder must grind
    ‘that Jan must grind the pepper.’

b. dat Jan de peper <fijn> aan het <fijn> malen is.
    that Jan the pepper to.a.powder AAN HET grind is
    ‘that Jan is grinding the pepper.’
The examples in (55) show that the choice between the two options depends on the placement of the N-part of the collocation in clauses with a verb cluster: negation seems preferably expressed by means of the negative article geen, but if the N-part remains adjacent to the V-part the negative adverb niet must be used. Although Booij considers the options marked with a number sign acceptable, there may be reasons for rejecting his claim; we postpone the discussion of this to Subsection V.

The same seems to hold for the progressive aan het + V_{infinitive} constructions in (56). Although such negated examples are extremely rare on the internet, they seem to be fully acceptable in contrastive contexts. The options marked with the number sign also occur on the internet in contrastive contexts; this need not surprise us given that the merger of sentence negation is normally not obligatory in contrastive contexts: cf. Ik heb niet een auto, maar een fiets gekocht ‘I have not bought a car, but a bicycle’.
As such, the examples in (55) and (56) do not shed any light on the question as to whether separable verbal collocations form a single class, or whether we should distinguish two subtypes: the merger of sentence negation may simply be subject to some adjacency restriction, which would effectively block the formation of *geen* in the primed examples. However, these examples are quite revealing in combination with the examples in (57), in which the N+V collocations are split by means of verb-second and sentential negation must be expressed by means of the negative article *geen*; the use of the adverb *niet* leads to ungrammaticality.

(57) a.  Peter rijdt geen/niet auto
    Peter drives no/not car
    ‘Peter doesn’t drive a car.’
  b.  Peter speelt geen/niet piano.
    Peter plays no/not piano
    ‘Peter doesn’t play the piano.’

The fact that sentence negation cannot be expressed by means of the adverb *niet* but must be expressed by means of the merged form *geen* suggests that these verb-second examples are more akin to the primeless than to the primed examples in (55) and (56); merger of negation is restricted to those cases in which the N+V collocation can be split by syntactic operations like verb clustering and verb-second. This suggests that separable verbal collocations like (34b) and (38b) actually have two uses: they may be separable in all syntactic and morphological contexts or they may be separable in morphological contexts only. It is the latter set of separable verbs that we have characterized as immobile in the sense that they resist verb-second. This line of reasoning would result in the three groups of X+V collocations in Table 3; we have illustrated the clustering of properties on the basis of N+V collocations only, but it seems reasonable to assume that they also hold for A+V collocations.

<table>
<thead>
<tr>
<th>Table 3: Types of verbal collocations</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>MOBILE</strong></td>
</tr>
<tr>
<td><strong>INSEPARABLE (COMPOUND)</strong></td>
</tr>
<tr>
<td>A PARTICIPIAL AFFIX</td>
</tr>
<tr>
<td>INFINITIVAL PREFIX</td>
</tr>
<tr>
<td>B VERBAL CLUSTERS</td>
</tr>
<tr>
<td>AAN HET-PHRASE</td>
</tr>
<tr>
<td>NEGATION</td>
</tr>
<tr>
<td>C VERB-SECOND</td>
</tr>
</tbody>
</table>

The morphological properties given in the A-rows of Table 3 distinguish the inseparable verbal compounds from the separable verbal collocations; whereas the former require that the X- and the V-part be adjacent in past/passive participles and te-infinitives, the latter do not allow this. The properties in the B-rows are the crucial ones for distinguishing the two types of separable verbal collocations. The C-row indicates the verb-second behavior of the three types of verbal collocations we have distinguished on the basis of the properties in A and B.
The discussion in this subsection involved separable V+X collocations that are ambiguous between a mobile and an immobile form. Subsections VI-IX will discuss cases of verbal collocations that are (normally) of the immobile type: we will successively discuss immobile verbs of the type *touwtje springen* ‘to skip’ (lit.: to rope skip), *stijl dansen* ‘to ballroom dance’ (lit.: to style dance), and *herinvoeren* ‘to reintroduce’. In subsection V, however, we first attempt to sketch a theoretical account of the clustering of the properties in Table 3.

**V. Immobile verbal collocations (2): a theoretical excursion**

The first group of X+V collocations in Table 3 is the class of compounds, which differs from the other two groups in that the X+V collocations form an indissoluble morphological and syntactic unit. In short, they function as complex words of the form \([Vº X V]\): inflectional material is added externally to Vº, which accounts for their properties in the two A-rows in Table 3, and syntactic movements may only affect Vº as a whole, which accounts for their properties in the B- and C-rows.

The original class of separable X+V collocations is now divided into two subgroups which have in common that the X-part can be separated from the verbal part by inflectional morphemes. This strongly suggests that we are dealing with a regular verb phrase, \([V X Vº]\), in which N functions as a direct object and A functions as a complementive: inflectional material is consequently added to Vº, which again accounts for their properties in the A-rows in Table 3.

The claim that separable X+V collocations involve regular verb phrases of the form \([V X Vº]\) also accounts for the properties of the first subgroup of separable verbs in the B- and C-rows in Table 3: (i) the fact that the X-part is syntactically independent from the verbal part of the collocation predicts that these parts need not remain adjacent in syntax but can be split by syntactic operations like movement (especially those involved in the formation of verb clusters and the derivation of verb-second), and (ii) the fact that the N-part is in the regular object position accounts for the fact that the merger of sentence negation and the indefinite article (*geen* ‘no’) is obligatory.

This leaves us with the second group of separable verbs, which do behave as a unit for syntactic purposes. It has been proposed that these involve INCORPORATION, a syntactic operation creating a syntactic unit by means of so-called head \(^c\)adjunction. This changes the phrase structure \([V X V]\) via head movement of the X into the structure \([Vº t_X [V X Vº]]\), in which Vº stands for a syntactically derived complex head. In some languages noun incorporation is much more productive than in Dutch, and Baker (1988) has shown for such languages that incorporation is restricted to complements; this provides a natural cross-linguistic rationale for Ackema’s generalization. The incorporation analysis also derives the properties in the (B)-columns in Table 3: (i) although the collocation can be split by morphological operations, this cannot be done by syntactic operations involved in the creation of verb clusters or *aan het*-phrases, and (ii) the premise that the N-part is no longer in object position after incorporation can now be held responsible for the impossibility of the merger of sentence negation. It remains mysterious, however, why this type of separable X+V collocation cannot undergo verb-second. It has been suggested that the reason for this is that verb-second can only affect...
words, that is, \( V^\circ \)'s: since \( V^o \) cannot be extracted from \( V^* \) and \( V^* \) cannot undergo verb-second itself, the impossibility of verb-second follows. What is, of course, still needed in such an approach is a believable account of the observation that \( V^* \)'s cannot undergo verb-second; this is currently under investigation and we refer the reader to Koopman (1995), Vikner (2005) and Booij (2010) for various attempts to provide an explanation for this.

If the discussion above is on the right track, we can identify the three types of verbal collocation by their different kinds of verbal element: true compounds ([\( V^\circ X V \)], phrasal projections ([\( V^* X V^\circ \)]), and word-like \( V^* \)-units ([\( V^* X V^\circ \)]) derived by incorporation. This makes it possible to replace Table 3 by Table 4.

<table>
<thead>
<tr>
<th>Table 4: Types of verbal collocations</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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<tr>
<td>A</td>
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<tr>
<td></td>
</tr>
<tr>
<td>B</td>
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<td></td>
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<tr>
<td></td>
</tr>
<tr>
<td>C</td>
</tr>
</tbody>
</table>

In order to make the incorporation proposal watertight we should say something about the negation data in the primeless examples in (55), repeated here as (58). Given that the N+V collocation is split, we cannot assume that the N-part is incorporated in the V-part of the collocation. We therefore expect the N-part to be in the regular object position and, consequently, the merger of sentence negation to be obligatory; the use of \( niet \) should thus lead to ungrammaticality.

(58) a. dat Peter geen/\(^\#\) niet auto kan rijden.
   that Peter no/not car be.able drive
   ‘that Peter isn’t able to drive a car.’
   b. dat Peter geen/\(^\#\) niet piano kan spelen.
   that Peter no/not piano be.able play
   ‘that Peter isn’t able to play the piano.’

That the examples with \( niet \) are not (fully) acceptable may find support in the fact that such examples are rare on the internet. Our Google searches (3/12/2015) on the strings \([niet auto kan rijden]\) and \([niet piano kan spelen]\) resulted in 54 hits. Moreover, the results include many cases in which the adverb \( niet \) is coordinated with the affirmative marker \( wel \): given that examples such as (59) show that such coordinations block the merger of negation, these cases should be excluded, and this leaves us with no more than 20 relevant cases.

(59) a. Heb je wel of niet een auto gekocht?
   have you AFF or not a car bought
   ‘Did you or did you not buy a car?’
   b. *Heb je wel of geen auto gekocht?
Given that the corresponding search string [geen auto kan rijden] and [geen piano kan spelen] resulted in 213 hits, we might have to conclude that the uses of niet can be dismissed as writing errors as the relevant cases constitute about 10% of the attested cases. This would be in line with our own judgment that under neutral intonation the use of niet in examples such as (58) is marked compared to the use of geen. Recall that the restriction to neutral intonation is needed because the discussion of (56) has shown that the use of niet is possible in contrastive contexts.

If one considers the 20 attested cases with niet sufficient for maintaining that the use of niet leads to a grammatical result, a coherent incorporation analysis must state that the X-part can not only be incorporated in the verbal part of the collocation but also in larger verb clusters; cf. Booij (2010). This result would be relatively easy to obtain under the traditional verb-raising analysis of verb clustering: verb raising is assumed to create an adjunction structure (similar to that resulting from noun incorporation) as the result of verb movement. If we assume that the base structure of an example such as (58a) is as given in (60a), verb raising may derive a structure such as (60b) with the syntactically derived complex head [V* kan rijden], and subsequent N-incorporation would lead to (60c). Since we have seen that N-incorporation is optional, we can now account for the fact that both geen and niet are possible in (58): in structure (60b) negation must merge with the indefinite N-part in direct object position, whereas in structure (60c) this is blocked by the fact that the N-part is part of an adjunction structure.

(60)  a.  ... NEG [V .... [V auto rijden] kan]  
b.  ... NEG [V .... [V auto t rijden] [V* kan rijden]]  
c.  ... NEG [V .... [V t auto tr ijden] [V* auto [V* kan rijden]]]  

Independent support of the claim that N-incorporation is possible into larger verb clusters may be found in the fact that examples such as (61) are at least marginally acceptable for some (but certainly not all) speakers of Dutch.

(61)  a.  ?dat Peter graag zou auto willen rijden.  
   that Peter gladly would car like drive  
   ‘that Peter would like to drive a car.’  
b.  ?dat Peter graag zou piano willen spelen.  
   that Peter gladly would piano want play  
   ‘that Peter would like to play the piano.’  

Under a verb-raising approach, example (61a) is derived as follows: starting from the structure in (62a) verb raising first creates the verb cluster [V* willen rijden] in (62b); subsequent N-incorporation in this cluster results in the structure [V* auto [V* willen rijden]] in (62c); finally, this complex is incorporated into the finite verb by means of verb raising, resulting in [V* zou [V* auto [V* willen rijden]]] in (62d). We refer the reader to Bennis (1992) for a similar derivation of verb clusters containing a particle verb in the order V finite-prt-V inf-V main.

(62)  a.  ... NEG [V .... [V auto rijden] willen] zou]  
b.  ... NEG [V .... [V auto t rijden] [V* willen rijden]] zou]  
c.  ... NEG [V .... [V t auto tr ijden] [V* auto [V* willen rijden]]] zou]  
d.  ... NEG [V .... [V t auto tr ijden] t auto willen rijden [V* zou [V* auto [V* willen rijden]]]]
There are, however, also a number of potential problems for an approach based on noun incorporation and verb raising. A minor problem is that the rules determining the word order of the complex V* are quite complicated: while incorporation of nouns and adjectives involves left-adjunction, incorporation of verbs would (normally) involve right-adjunction. A more serious problem is related to the account of the primeless examples in (57), one of which is repeated here as (63a).

(63)  a. Peter rijdt geen/*niet auto
     Peter drives no/not     car
     ‘Peter doesn’t drive.’

     b. ... rijdt ... NEG [V* auto t\textsubscript{rijdt}]

     c. *.. rijdt ... NEG [V* t\textsubscript{auto} [V* auto t\textsubscript{rijdt}]]

The fact that negation must be expressed by means of geen in verb-second structures such as (63a) was argued to result from a constraint prohibits extraction of V\textsuperscript{o} from V*-units; since (63c) violates this constraint, (63a) muing have the structure in (63b), which correctly predicts that the merger of negation with the direct object is obligatory. However, the claim that N-incorporation may also target verb clusters, needed to account for the examples in (58) marked by a number sign, presupposes that verb clusters are V*-units ([V* V V]) themselves. This raises the question as to how we can derive verb-second at all, given that this would always involve extraction of V\textsuperscript{o} from a V*-unit (at least under the traditional standard assumption that verb raising is obligatory). We will leave the question as to whether or not the use of the adverb niet gives rise to a grammatical result in examples such as (58) undecided and, consequently, it likewise remains open whether the assumption that noun incorporation into verb clusters is possible is really needed.

VI. Immobile verbal collocations (3): type touwtje springen ‘to skip’

This subsection discusses X+V collocations of the type touwtje springen ‘to skip’. The examples in (64) show that the verb springen ‘to skip’ is normally intransitive; this means that the N-part does not function as a theme of the verbal part (it has an adverbial interpretation instead).

(64)  a. *Jan springt het rode touwtje.
     Jan skips    the red rope
     ‘Jan is skipping with the red rope’

     b. Jan springt met het rode touwtje.
     Jan skips    with the red rope
     ‘Jan is skipping with the red rope’

Ackema’s generalization that separable X+V collocations allow verb-second only if the X-part functions as a complement of the V-part thus predicts that touwtje springen is immobile. Our Google searches discussed in the introduction to this section have revealed that this prediction is not entirely correct. Verb-second can be found with this type of collocation but seems restricted to a number of specific contexts; it frequently occurs in headlines, headers, captions of pictures and movies, etc. Verb-second also occurs in sentences in which the collocation is used as part of a list, often in brief written reports of certain happenings. In other texts, verb-second seems relatively common in sentences with a generic or a habitual reading. In many
cases, the three uses go together. Some typical examples from the internet are given in (65).

(65) a. Auto springt touwtje. [caption of a video]
car skips rope

b. Madonna zit op een troon en toont zich als koningin aan het publiek, de diva
   zingt en dansen. ‘Madonna is sitting on a throne and shows herself as queen to the audience;
   the diva skips, dominates the dance floor in a sexy outfit, and [...]’ [report: Algemeen Dagblad, September 2, 2008; ad.nl/ad/nl/1002/Showbizz/article/detail/2188758/2008/09/02/Visueel-spektakel-Madonna.shtml]

c. Maxwell springt touwtje zoals een rechtshandige met links gooit. [generic]
Maxwell skips rope like a right-handed with left throw
   ‘Maxwell skips like a right-handed person throws with his left hand.’

These cases are somewhat special and may therefore follow somewhat different rules. Captions such as (65a) require a certain brevity, and thus disfavor the more usual but lengthier progressive aan het + V\text{infinitive} construction. The phrase de diva springt touwtje in (65b) is part of a numeration of events, and verb-second may therefore be forced (or at least be favored) by some parallelism constraint on the structure. For cases such as (65a), we can certainly make a case for assuming that it should not be part of Dutch °core grammar (= the automatically acquired part of grammar) but of its periphery (= the consciously learned part of it), and perhaps the same holds for cases such as (65b). If so, the claim that verb-second of collocations like touwtje springen is part of core grammar should rest on generic examples such as (65c), which do not allow the progressive aan het + V\text{infinitive} construction, and some more incidental cases (often from poems, stories and novels).

The discussion above suggests that it would be justified to assign a special status to verb-second structures with N+V collocations like touwtje springen in (65); in fact, this would also follow from the hypothesis proposed in subsection V that the split pattern is only compatible with the phrasal structure \([V\ast X V^0]\), in which N functions as a direct object. But this is not sufficient to exclude verb-second; if touwtje springen were a compound, we would wrongly expect verb-second of the full collocation \([V\ast X V]\). The only remaining option therefore would be to assume that we are dealing with a word-like V\ast-unit \([\{V\ast X V^0\}]\). We should note, however, that these V\ast-units are unlikely to be the result of syntactic incorporation given that X does not function as a complement of the verb, and this again would lead us to the conclusion that N+V collocations like touwtje springen are not part of core syntax. We will assume therefore that these quasi-incorporation structures are simply learned on an item-to-item basis, and listed as V\ast-units in the lexicon; see Booij (2010), who argues that all V\ast-units are lexically specialized and should therefore be listed in the lexicon. Other proposals that are in line with this view can be found in Koopman (1995) and Vikner (2005). If N+V collocations of the type touwtje springen are indeed listed in the lexicon as V\ast-units, we expect them to exhibit the properties indicated in the final column of Table 4.
Let us broaden the empirical scope of our investigation and investigate this phenomenon on the basis of the four N+V collocations in (66). These were more or less randomly chosen from the earlier-mentioned list of (mainly) N+V collocations found at taaladvies.net/taal/advies/vraag/703, although we made sure that they satisfied the following three criteria: (i) the N-part of the collocation normally precedes the past/passive participial form of the verbal part as a whole (X + ge-V-d/t), (ii) the N-part cannot be interpreted as the theme argument of the verbal part, and (iii) the Van Dale dictionary states that the collocations as a whole are used in their infinitival form only. Cases that do not fit these criteria will be discussed in the following subsections.

(66) a. ballon varen          c. stelt lopen
   balloon sail           stilt walk
   ‘to balloon’           ‘to walk on stilts’

   b. parachute springen  d. wad lopen
   parachute jump         mud.flats walk
   ‘to parachute/skydive’ ‘to cross the mud flats’

A. Past/passive participles and te-infinitives

That Van Dale is wrong in claiming that these collocations only occur in their infinitival form is clear from our Google searches (11/13/2013) for past/passive participial forms. For each collocation we looked for two participial forms: X + ge-V-d/t and ge-X-V-d/t. Our search string did not have a space between the two words so as to exclude cases in which X is part of some preverbal constituent; this resulted in a lower number of hits for the form X + ge-V-d/t than if we had also searched for cases with a space. Duplicates or irrelevant cases were not extracted from the results, but we did check whether the desired passive/perfect-tense construction was included. As for the results for ge-X-V-d/t, it is often clear that either the writer was not sure which form to use or that he was joking: writers often provide both options and/or comment on the “correctness” of the form(s)—some of the attestations of gewadloop and geparachutespringd (sometimes misspelled with a t) are found in the writer’s reflections on the use of the two forms.

(67) Past/passive participle forms

<table>
<thead>
<tr>
<th></th>
<th>X + ge-V-d/t</th>
<th>ge-X-V-d/t</th>
</tr>
</thead>
<tbody>
<tr>
<td>ballon varen</td>
<td>ballongevaren: 92</td>
<td>ballongevoerd: 1</td>
</tr>
<tr>
<td>parachute springen</td>
<td>parachutegesprongen: 87</td>
<td>geparachutesprongd: 9</td>
</tr>
<tr>
<td>stelt lopen</td>
<td>steltgelopen: 11</td>
<td>gesteldloopt: 1</td>
</tr>
<tr>
<td>wad gelopen</td>
<td>wadgelopen: 244</td>
<td>gewadloopt: 37</td>
</tr>
</tbody>
</table>

The results in (67) show that the participial form can be used fairly easily provided that the X-part precedes the preverbal part of the participial °circumfix, which is also in line with our own intuitions. We are thus led to the conclusion that we are not dealing with compounds here, which in its turn predicts that the X-part should precede the infinitival marker te. In order to test this prediction, we also searched for the two strings [om X te V] and [om te X V] (in the latter case with and without a space between X and V). We included the infinitival complementizer om in our
search string in order to exclude cases in which X is part of some preverbal constituent.

(68) \( Om + te \) forms

<table>
<thead>
<tr>
<th></th>
<th>( Om X \ te \ V )</th>
<th>( Om \ te X \ V )</th>
</tr>
</thead>
<tbody>
<tr>
<td>ballon varen</td>
<td>om ballon te varen: 67</td>
<td>om te ballonvaren: 85</td>
</tr>
<tr>
<td>parachute springen</td>
<td>om parachute te springen: 113</td>
<td>om te parachute springen: 76</td>
</tr>
<tr>
<td>stelt lopen</td>
<td>om stelt te lopen: 7</td>
<td>om te stelt lopen: 13</td>
</tr>
<tr>
<td>wad lopen</td>
<td>om wad te lopen: 32</td>
<td>om te wad lopen: 85</td>
</tr>
</tbody>
</table>

Interestingly, the results are now far less clear: both orders seem possible and there is sometimes even a preference for the second order. This leads us to the contradictory conclusion that the X+V collocations can be used as compounds after all.

B. Progressive aan het + \( V_{\text{infinitive}} \) constructions and verb clusters

In (69) we provide the results of our Google searches concerning the progressive \( aan \ het + V_{\text{infinitive}} \), which we have checked manually (although the larger numbers are estimates); for the form \( aan \ het X \ V \) we included cases with and without a space between X and V. As is to be expected on the assumption that we are dealing with a word-like \( V^* \)-unit ([\( V^* X V^o \)]), the verbal collocations normally cannot be split.

(69) Progressive \( aan \ het + V_{\text{infinitive}} \) phrases

<table>
<thead>
<tr>
<th></th>
<th>( Aan \ het X \ V )</th>
<th>( X \ aan \ het \ V )</th>
</tr>
</thead>
<tbody>
<tr>
<td>ballon varen</td>
<td>aan het ballonvaren: 14</td>
<td>ballon aan het varen: 1</td>
</tr>
<tr>
<td>parachute springen</td>
<td>aan het parachutespringen: 45</td>
<td>parachute aan het springen: 12</td>
</tr>
<tr>
<td>stelt lopen</td>
<td>aan het steltlopen: 16</td>
<td>stelt aan het lopen: 0</td>
</tr>
<tr>
<td>wad lopen</td>
<td>aan het wadlopen: 40</td>
<td>wad aan het lopen: 4</td>
</tr>
</tbody>
</table>

Note in passing that the manual check was only possible after filtering out several frequently occurring substrings in the results (e.g., by means of the search [[ballon aan het varen] AND [de ballon]], which resulted in potentially relevant cases without the definite noun phrase de ballon; this may of course have led to the improper exclusion of cases such as Jan was ballon aan het varen toen de ballon in brand vloog ‘Jan was making a balloon flight, when the balloon caught fire’). The same holds for some of the other manual searches discussed below.

Testing whether or not the \( X \)-part can precede clause-final verb clusters is not easy. As could be expected, our searches for the string \([X \ MODAL \ V]\) with the singular simple present form of the modals kunnen ‘can’, willen ‘want’, moeten ‘must’ and zullen ‘will’ did not yield any results for the collocations ballon varen and stelt lopen. We found 4 cases of \([wad \ MODAL \ lopen]\), which does not seem sufficient to warrant robust conclusions. There were many hits for the string \([parachute \ MODAL \ springen]\), with about 55 cases of the intended construction. Unfortunately, we cannot compare absolute numbers as the results for strings of the form \([MODAL \ X \ V]\) contain a large number of verb-second constructions.
niet is that the collocations of the type perhaps be held responsible for the fact that verb-second is possible under more nominal part of the type complement of the verbal part in structures like 

<table>
<thead>
<tr>
<th></th>
<th>MODAL X V</th>
<th>X MODAL V</th>
</tr>
</thead>
<tbody>
<tr>
<td>ballon varen</td>
<td>relatively frequent</td>
<td>0 cases</td>
</tr>
<tr>
<td>parachute springen</td>
<td>relatively frequent</td>
<td>relatively frequent</td>
</tr>
<tr>
<td>stelt lopen</td>
<td>relatively frequent</td>
<td>0 cases</td>
</tr>
<tr>
<td>wad lopen</td>
<td>relatively frequent</td>
<td>4 cases</td>
</tr>
</tbody>
</table>

C. Sentence negation

It is not easy to apply the negation test to sentences with an infinitival form because the X+V collocations under discussion can readily be nominalized (cf. *het parachutespringen*, which may refer to parachuting as such or lessons in parachuting) and such nominalizations can be preceded by the negative article *geen* ‘no’: cf. *We hebben vandaag geen parachutespringen* ‘We will not have lessons in parachuting today’. We therefore used the search strings [*niet X + participle*] and [*geen X + participle*] with and without a space between X and the participle; the results are given in Table (71). For completeness’ sake, we note that we found cases of the form [*niet/geen X te V**inf***] for *parachute springen* only: we found 4 cases with *niet* and 2 with *geen*.

<table>
<thead>
<tr>
<th></th>
<th>NIET X PARTICIPLE</th>
<th>GEEN X PARTICIPLE</th>
</tr>
</thead>
<tbody>
<tr>
<td>ballon varen</td>
<td>niet ballon gevaren: 7</td>
<td>geen ballon gevaren: 1</td>
</tr>
<tr>
<td>parachute springen</td>
<td>niet parachute gesprongen: 13</td>
<td>geen parachute gesprongen: 9</td>
</tr>
<tr>
<td>stelt lopen</td>
<td>niet stelt gelopen: 0</td>
<td>geen stelt gelopen: 0</td>
</tr>
<tr>
<td>wad lopen</td>
<td>niet wad gelopen: 7</td>
<td>geen wad gelopen: 5</td>
</tr>
</tbody>
</table>

D. Conclusion

What we have seen in the previous subsections is that the collocations in (66) exhibit a rather mixed behavior. The results in Table (67) clearly show that they do not count as compounds when it comes to participle formation. However, the results in Table (68) concerning the formation of te-infinitivals are more equivocal with regard to compound status. It seems nevertheless safe to conclude that we are not dealing with true compounds and this may explain that the collocations cannot undergo verb-second as a whole. Tables (69)-(71) show that the collocations tend to behave as word-like V*-units ([V* X Vº]), as shown by the second column of these tables; this could be the reason why these collocations tend not to undergo verb-second. However, some of the more frequently used forms like *parachute springen* and (to a lesser extent) *wad lopen* occasionally exhibit a more phrasal structure [V- X Vº] behavior, as evidenced by the third columns in (69) to (71). This may perhaps be held responsible for the fact that verb-second is possible under more restricted circumstances. What remains mysterious from a theoretical point of view is that the collocations of the type *touwtje springen* ‘to skip’ cannot be analyzed as compounds: Subsection V has shown that the X-part normally functions as a complement of the verbal part in structures like [V- X Vº] and [V* X Vº], while the nominal part of the type *touwtje springen* rather receives an adverbal interpretation.
VII. Immobile verbal collocations (4): type stijl dansen ‘to ballroom dance’

This subsection discusses collocations like stijl dansen, which differ from the collocations discussed in the previous sections in that the N-part can remain adjacent to the verbal part in the corresponding past/passive participial form. We will investigate forms that satisfy the following three criteria: (i) the N-part of the collocation normally remains left-adjacent to the verbal part in past/passive participial forms (ge-X-V-d/t), (ii) the N-part cannot be interpreted as the theme argument of the verbal part, and (iii) the Van Dale dictionary states that the collocation occurs in its infinitival form only.

There are in fact not many collocations that satisfy these criteria. Booij (2010: 112) provides eight potential cases (only three of which can also be found in the list found at Taaladvies.net). We omitted steengrijlen ‘stone grilling’ as it does not satisfy criterion (iii). We also omitted buikspreken ‘to ventriloquize’ and mastklommen ‘to pole climb’, because for these verbs we did not find any cases that satisfied criterion (i); gebuisdpreukt was only used in discussions on the correct form of the past participle and gemastklomde did not occur at all. This leaves us with the four forms in (72) besides stijl dansen (although it is certainly possible to find more cases like, e.g., mond schilderen ‘to paint with the mouth’, windsurfen ‘to be windsurfing’ and watertrappelen ‘to tread water’).

(72) a. koord dansen rope dance ‘to walk a tight rope/high wire’
   b. vinger verven finger paint ‘to finger-paint’
   c. zak lopen sack walk ‘to run a sack race’
   d. zee zeilen sea sail ‘to sail the ocean’

Note in passing that it is not clear whether stijl dansen itself satisfies criterion (ii) given that examples such as Kaylah dansst voornamelijk de Egyptische stijl ‘Kaylah mainly dances the Egyptian style’ are quite frequent on the internet. Although we consider this use marked, it might indicate that we are actually dealing with a collocation in which the N-part is a theme argument of the verbal part; see Subsection VIII. We will not elaborate on this issue here.

A. Past/passive participles and te-infinitives

Let us first look at the past/passive participle form of the collocations in (72). For each collocation a search was made for two forms: X + ge-V-d/t and ge-X-V-d/t. We spelled the first form without a space in order to exclude cases in which X is part of some preverbal constituent; this may have resulted in a lower number of hits for the form X + ge-V-d/t than we would have had if we had also searched for cases with a space. Duplicates or irrelevant cases were not weeded out but we did check whether the desired construction was included. The results in Table (73) show us that three of the four collocations tend to be treated like true compounds (especially since many of the hits in the second column must be dismissed as irrelevant for various reasons). It seems likely that zaklopen should be dismissed from this set: if we take into account that many more cases can be found if we include cases with a space between the N-part zak and the V-part gelopen, the collocation seems rather
to belong to the type *touwtje springen* discussed in the previous subsection than to the type under discussion here.

(73) Past/passive participle forms

<table>
<thead>
<tr>
<th></th>
<th>X + GE-V-D/T</th>
<th>GE-X-V-D/T</th>
</tr>
</thead>
<tbody>
<tr>
<td>koord dansen</td>
<td>koord gedanst: 12</td>
<td>gekoorddanst: 37</td>
</tr>
<tr>
<td>vinger verven</td>
<td>vinger geverfd: 18</td>
<td>gevingerverfd: 216</td>
</tr>
<tr>
<td>zaklopen</td>
<td>zak gelopen: 103</td>
<td>gezakloopt: 22</td>
</tr>
<tr>
<td>zeezeilen</td>
<td>zee gezeild: 6</td>
<td>gezezeield: 17</td>
</tr>
</tbody>
</table>

The overall picture that emerges from Table (73) seems to be confirmed by the results of our Google searches on te-infinitival forms in Table (74), although again there are cases in which the collocations are split.

(74) *Om* + *te* forms

<table>
<thead>
<tr>
<th></th>
<th>OM X TE V</th>
<th>OM TE X V</th>
</tr>
</thead>
<tbody>
<tr>
<td>koord dansen</td>
<td>om koord te dansen: 11</td>
<td>om te koord dansen: 29</td>
</tr>
<tr>
<td>vinger verven</td>
<td>om vinger te verven: 0</td>
<td>om te vinger verven: 33</td>
</tr>
<tr>
<td>zaklopen</td>
<td>om zak te lopen: 13</td>
<td>om te zak lopen: 19</td>
</tr>
<tr>
<td>zeezeilen</td>
<td>om zee te zeilen: 0</td>
<td>om te zee zeilen: 27</td>
</tr>
</tbody>
</table>

B. *Progressive* aan het + $V_{\text{infinitive}}$ constructions, verb clusters and negation

The tendency to construe the collocations as compounds makes it very likely for them to exhibit the behavior of a syntactic unit. This is fully confirmed by the results in Table (75). A manual check of the results for the string *[X aan het V]* showed that there is not a single case in which the collocations are split in the progressive *aan het* + $V_{\text{infinitive}}$ constructions. Given this result, we did not bother to apply the verb clustering and the negation test.

(75) Progressive aan het + $V_{\text{infinitive}}$ phrases

<table>
<thead>
<tr>
<th></th>
<th>AAN HET X V</th>
<th>X AAN HET V</th>
</tr>
</thead>
<tbody>
<tr>
<td>koord dansen</td>
<td>aan het koorddansen: 85</td>
<td>koord aan het dansen: 0</td>
</tr>
<tr>
<td>vinger verven</td>
<td>aan het vingerverven: 90</td>
<td>vinger aan het verven: 0</td>
</tr>
<tr>
<td>zaklopen</td>
<td>aan het zaklopen: 69</td>
<td>zak aan het lopen: 0</td>
</tr>
<tr>
<td>zeezeilen</td>
<td>aan het zeezeilen: 23</td>
<td>zee aan het zeilen: 0</td>
</tr>
</tbody>
</table>

C. Conclusion

Given the discussion in the previous subsections, it will not be surprising that in the relatively rare cases of verb-second the collocations in (72) will be treated as true compounds. Whereas it is fairly easy to find verb-second of the full collocation, we did not succeed in finding cases of the split pattern in sentences with third person singular simple present verb forms. This was checked manually after filtering out several frequently occurring substrings in the results, e.g., by means of the Google search [[zeelt * zee] AND [op zee]], which results in potentially split verb-second constructions without the adverbial phrase *op zee* ‘at sea’.
The fact that the collocations in (72) can be treated as regular compounds does raise a question, however: why do these verbs tend to not undergo verb-second at all. The answer to this problem seems to be related to the fact that speakers are somewhat uncertain about the compound analysis of the collocations in question, as is clear from the results in Tables (73) and (74). This may result in a tendency to avoid verb-second in favor of constructions involving the progressive *aan het + V*infinitive* construction. If correct, this suggests that we are dealing with a performance restriction, which unfortunately would imply that no further light can be shed on this issue from a syntactic point of view.

**VIII. Immobile verbal collocations (5): type gedachtelezen ‘to mind-read’**

This subsection discusses collocations like *gedachte lezen* ‘to mind-read’, which differ from the collocations in the previous subsections in that the N-part does function as a theme of the V-part. There need be no *a priori* expectations concerning the question as to whether such collocations are compounds ([V* X V]), syntactically derived V*-units ([V* X V]), or phrasal structures ([V X V°]). We therefore simply selected cases from the earlier-mentioned list of N+V collocations found at taaladvies.net/taal/advies/vraag/703 satisfying the van Dale dictionary criterion that they occur in their infinitival form only. We included one clearly idiomatic case, *lijn trekken* ‘to slack off/to malingering’, and one case in which the N-part corresponds to the nominal part of a PP-complement, *spoor zoeken* ‘to trace’; cf. *zoeken naar sporen* ‘to search for traces’.

(76) a. hand lezen  
hand read 
‘to palm read’  
b. kogel stoten  
ball shoot  
‘to shot-put’

c. lijn trekken  
line draw  
‘to malingering’

d. spoor zoeken  
trace search  
‘to track’

**A. Past/passive participles and te-infinitives**

For each collocation we looked for two participial forms: X + *ge-V-d/t* and *ge-X-V-d/t*. We spelled the forms without a space in order to exclude cases in which X is part of some preverbal constituent; this resulted in a lower number of cases of the form X + *ge-V-d/t* than we would have harvested if we had also searched for cases with a space. The results in (77) were checked manually and the numbers refer to attested cases of the looked-for construction.

(77) Past/passive participle forms

<table>
<thead>
<tr>
<th></th>
<th>X + <em>ge-V-d/t</em></th>
<th><em>ge-X-V-d/t</em></th>
</tr>
</thead>
<tbody>
<tr>
<td>hand lezen</td>
<td>hand gelezen: 9</td>
<td>gehandleesd: 0</td>
</tr>
<tr>
<td>kogel stoten</td>
<td>kogel gestoten: 26</td>
<td>gekogelstoot: 18</td>
</tr>
<tr>
<td>lijn trekken</td>
<td>lijn getrokken: 10</td>
<td>gelijntrek: 0</td>
</tr>
<tr>
<td>spoor zoeken</td>
<td>spoor gezocht: 10</td>
<td>gespoorzoekt: 3</td>
</tr>
</tbody>
</table>
Table (78) shows the results for our Google searches for the strings [om X te V] and [om te X V], the latter with and without a space between X and V. The results were checked manually and the numbers again refer to attested cases of the intended construction.

(78) Om + te forms

<table>
<thead>
<tr>
<th></th>
<th>OM X TE V</th>
<th>OM TE X V</th>
</tr>
</thead>
<tbody>
<tr>
<td>hand lezen</td>
<td>om hand te lezen: 4</td>
<td>om te hand lezen: 5</td>
</tr>
<tr>
<td>kogel stoten</td>
<td>om kogel te stoten: 13</td>
<td>om te kogel stoten: 37</td>
</tr>
<tr>
<td>lijn trekken</td>
<td>om lijn te trekken: 9</td>
<td>om te lijntrekken: 2</td>
</tr>
<tr>
<td>spoor zoeken</td>
<td>om spoor te zoeken: 13</td>
<td>om te spoorzoeken: 15</td>
</tr>
</tbody>
</table>

The results in Tables (77) and (78) are ambivalent: whereas (77) suggests that speakers seem to disfavor a compound analysis for the collocations in (76), we cannot draw such a conclusion from (78).

B. Progressive aan het + V*infinitive constructions, verb clusters and negation

The results in Table (79) suggest that a phrasal analysis is excluded; given the large number of irrelevant hits for the string [aan het X-V], we stopped counting after we found 10 instantiations of the construction we were looking for.

(79) Progressive aan het + V*infinitive phrases

<table>
<thead>
<tr>
<th></th>
<th>AAN HET X V</th>
<th>X AAN HET V</th>
</tr>
</thead>
<tbody>
<tr>
<td>hand lezen</td>
<td>aan het handlezen: 6</td>
<td>hand aan het lezen: 3</td>
</tr>
<tr>
<td>kogel stoten</td>
<td>aan het kogelstoten: &gt; 10</td>
<td>kogel aan het stoten: 1</td>
</tr>
<tr>
<td>lijn trekken</td>
<td>aan het lijntrekken: &gt; 10</td>
<td>lijn aan het trekken: 0</td>
</tr>
<tr>
<td>spoor zoeken</td>
<td>aan het spoorzoeken: &gt; 10</td>
<td>spoor aan het zoeken: 0</td>
</tr>
</tbody>
</table>

That the phrasal analysis is at best marginally available seems to be confirmed by the results of the verb-clustering test. Given the results in (79), we applied this test only to the collocations hand lezen and kogel stoten. The string [hand kan lezen] resulted in 4 instantiations and the string [kogel kan stoten] in just one instantiation of the construction. This contrasts sharply with the strings [kan handlezen] and [kan kogelstoten], which resulted in many relevant hits. The search strings [geen hand * kan lezen] and [geen kogel kan stoten] resulted in just one relevant case for hand lezen.

C. Conclusion

The previous subsections show that the collocations in (76) are preferably analyzed as V*-units and consequently correctly predict that verb-second is strongly disfavored. The results in the third column of Table (79) show first of all that these collocations cannot readily be analyzed as phrasal ([V* X V']), so that the split pattern does not easily appear either. The results in Table (77) show that they cannot readily be analyzed as compounds ([V X V]), so that they cannot undergo verb-second as a whole either. As was also observed for collocations like touwtje springen, discussed in Subsection IV, it seems that the results in Table (78) are
problematical for this account of the immobility of collocations like hand lezen because they suggest that a compound analysis is also possible.

**IX. Immobile verbal collocations (6): particle verbs** (vooraanmelden ‘to preregister’)

This section discusses a type of X+V collocation that has probably received most attention in the linguistic literature, namely particle verbs. Particle verbs are verbs preceded by a preposition-like element, that is, P+V collocations. Such collocations are like other types of X+V collocation in that there are various subtypes when it comes to verb-second: there are collocations that undergo verb-second as a whole, collocations that are split under verb-second, and collocations that resist verb-second in any form.

(80) a. dat Jan de mogelijkheden overweegt. [inseparable P+V collocation]
that Jan the possibilities considers
‘that Jan is considering the possibilities.’

a’. Jan overweegt de mogelijkheden.
Jan considers the possibilities

b. dat Marie zich voor het examen aanmeldt. [separable P+V collocation]
that Marie REFL for the exam prt.-registers
‘that Marie registers for the exam.’

b’. Marie meldt zich voor het examen aan.
Marie registers REFL for the exam prt.

c. dat Marie zich voor het examen voorraanmeldt. [immobile P+V collocation]
that Marie REFL for the exam pre-prt.-registers
‘that Marie preregisters for the exam.’

c’. *Marie voorraanmeldt zich voor het examen.
Marie pre-prt.-registers REFL for the exam

c”. *Marie meldt zich voor het examen vooraan.
Marie registers REFL for the exam prt-prt.

Inseparable and separable P+V collocations differ as to the placement of word stress. Inseparable collocations are normally considered compounds, and are characterized by the fact that they have main stress on the second member: the P+V collocation in (80a) is pronounced as overWegen, not as Overwegen. Separable collocations, on the other hand, exhibit a stress pattern that is typical of verb phrases consisting of a verb and a complementive, that is, they have stress on the preverbal element: the P+V collocation in (80b) is pronounced as AAN melden, not as aan MELDEN. The examples in (81) illustrate this again for the ambiguous verb voorkomen, and we refer to Section P1.2.4.4 for a more detailed comparison of the two types of P+V collocations. In what follows we will follow the general practice of restricting the term particle verb to separable (and immobile) P+V collocations.

(81) a. dat het gebruik van een helm serieuze ongelukken voorkomt. [compound]
that the use of a helmet grave accidents prevents
‘that the use of a helmet will prevent grave accidents.’

a’. Het gebruik van een helm voorkomt serieuze ongelukken.
the use of a helmet prevents grave accidents
b. dat dit soort serieuze ongelukken vaak voorkomt.  
that this type [of] grave accidents often prt.-occurs
‘that this type of grave accidents occurs often.’
b’. Dit soort serieuze ongelukken komt vaak voor.
this type [of] grave accidents occurs often prt.

A typical property of immobile particle verbs like _voor aan melden_ ‘to preregister’ in (80c) is that there are two independent particles involved, that is, that we are dealing with the structure [voor [aan melden]]. That the two particles are independent of each other is crucial in view of the fact that a particle verb like _vooraan plaatsen_ ‘to place in front’, in which _vooraan_ is a complex preposition, counts as a regular, separable particle verb with the structure [[voor+aan] plaatsen]: We _plaatsen de kinderen vooraan_ ‘we place the children in front’. The two cases can again be distinguished by their stress pattern: the complex preposition has stress on the second member (_voorAAN plaatsen_), whereas in the double particle case main stress is on the first particle (_voor aan melden_).

There are in fact not many double particle verbs like _voor aan melden_. This is to be expected as verbal particles generally have the syntactic function of °complementive, and clauses cannot normally have more than one complementive; cf. Section 2.2. The collocation _voor aan melden_ is the example normally used as an illustration in the linguistic literature, but in (82) we provide a number of other cases that can be found in the Van Dale dictionary or on the internet. Note that we have not been able to find any cases in which a verbal particle forms a collocation with a P+V compound; we did find _vooronderstellen_ ‘to presuppose’ but this complex form behaves as a compound itself.

(82) a. _onder aan besteden_ ‘to assign a commission to a subcontractor’
b. _onder aan nemen_ ‘to accept a commission as a subcontractor’
c. _voor aan melden_ ‘to preregister’
d. _voor af beelden/spiegelen_ ‘to foretell in metaphorical form’
e. _voor in schrijven_ ‘to preregister/presubscribe’
f. _voor in tekenen_ ‘to presubscribe’

Immobile particle verbs also arise when a separable particle verb like _aanmelden_ ‘to register’ in (80b) is prefixed with the prefix _her-_ ‘re-’. Prefixation with _her_- of inseparable P+V compounds like _overwegen_ ‘to consider’ in (80a), on the other hand, does not affect the verb-second property; the prefixed form will undergo verb-second as a whole. This is illustrated in (83).

(83) a. dat Jan de mogelijkheden heroverweegt.  
that Jan the possibilities reconsider
‘that Jan is reconsidering the possibilities.’
a’. Jan heroverweegt de mogelijkheden.
Jan reconsidersthе possibilities
b. dat Marie zich voor het examen heraanmeldt. [immobile particle verb]
   ‘that Marie REF. for the exam re-prt.-registers 
   ‘that Marie is reregistering for the exam.’

b’. *Marie heraanmeldt zich voor het examen.
   Marie re-prt.-registers REF. for the exam

b”’. *Marie meldt zich voor het examen heraan.
   Marie registers REF. for the exam re-prt.

In (84), we provide some examples of P+V compounds and particle verbs prefixed with her-, taken from the Van Dale dictionary; as P+V compounds are relatively rare, it need not surprise us that inseparable cases such as (84a) are heavily outnumbered by immobile cases such as (84b).

(84) a. Inseparable: heronderzoeken ‘to reinvestigate’, heroverwegen ‘to reconsider’

The previous subsections have shown that many immobile N+V collocations exhibit properties that we have attributed to syntactically derived or lexically listed V*-units ([V+ X V°]). From a theoretical point of view, a similar analysis seems possible for particle verbs since verbal particles are often analyzed syntactically as predicative complements of the verb (i.e., complementives) and are thus expected to be able to undergo incorporation; we refer the reader to Subsections I and V for further discussion. Recall from our discussion above example (82) that we have not been able to find any cases in which a P+V compound is combined with a verbal particle, which explains the empty cell in this table.

(85) P+V collocations (plus verbal particle or prefix her-)

<table>
<thead>
<tr>
<th>P+V COLLOCATION</th>
<th>COMPOUND</th>
<th>PARTICLE VERB</th>
</tr>
</thead>
<tbody>
<tr>
<td>heroverwegen</td>
<td>overwegen</td>
<td>aanmelden</td>
</tr>
<tr>
<td>heraanmelden</td>
<td>voor</td>
<td>aanmelden</td>
</tr>
<tr>
<td>heraanmelden</td>
<td>heroverwegen</td>
<td>heraanmelden</td>
</tr>
</tbody>
</table>

In the remainder of this subsection we will investigate from this perspective the double particle verb and the prefixed P+V collocation from Table (85). We will follow the list of relevant properties in Table 4; the expression of sentence negation is of course irrelevant given that it applies specifically to N+V collocations.

A. The formation of past/passive participles

P+V compounds like overwegen are somewhat special in that they do not get the regular participial °circumfix ge-...-d/t. The preverbal part ge- is obligatorily truncated, which results in the (irregular) form overwegen in (86a) instead of the expected form *geoverwegen; as is expected for a compound, *overgewogen is also impossible. Example (86b) shows that separable particle verbs like aanmelden do
Position of the finite verb (verb-first/second) 1283

get the preverbal ge- part of the regular circumfix and that, as expected for a separable X+V collocation, the verbal particle must precede it: *geaanmeld.

(86)  a.  Jan heeft de mogelijkheden overwogen.
     Jan has the possibilities considered
     ‘Jan has considered the possibilities.’
     b.  Jan heeft zich aangemeld.
     Jan has REFL prt.-registered
     ‘Jan has registered.’

The examples in (87) show that double particle verbs essentially behave like regular particle verbs: the full circumfix ge-...d/t is used and the ge- part must be adjacent to the verbal part of the collocation, that is, it is obligatory and placing it in front of the first or the second particle results in unacceptability. This is also clear from our Google searches; the past/passive participles vooraangemeld and vooringetekend occur frequently (> 100 hits) on the internet, whereas the forms *gevooraangemeld, *voorgeaanmeld, *gevooringetekend and *voorgeintekend are not found at all. Note in passing that we placed the simplex reflexive in (87b) between parentheses because constructions like these can be found on the internet both with and without it, that is, some but not all speakers make the collocation inherently reflexive.

(87)  a.  Jan heeft zich vooraangemeld.
     Jan has REFL prt.-prt.-registered
     ‘Jan has preregistered.’
     b.  Jan heeft (zich) vooringetekend voor het boek.
     Jan has REFL prt-subscribed to the book
     ‘Jan presubscribed to the book.’

The examples in (88) show that the use of her- leaves the properties of the input unaffected: heroverwegen behaves like overwegen in that it does not allow the preverbal ge- part of the participial circumfix, and heraanmelden behaves like aanmelden in that the ge- part is obligatory and must be adjacent to the verb.

(88)  a.  Jan heeft zijn beslissing heroverwogen.
     Jan has his decision re-considered
     ‘Jan has reconsidered his decision.’
     b.  Jan heeft zich heraanmeld.
     Jan has REFL re-prt.-registered
     ‘Jan has reregistered.’

It should be pointed out that it has been claimed for certain particle verbs that the form prefixed with her- has a certain flexibility in its participial form. One case is heropvoeden. Bennis (1993) notes that his informants accept the first three forms in (89); the only form rejected categorically is the one in (89d). We tested this by means of a Google search on each form; duplicates or irrelevant cases were not filtered out from the results, but we did check whether the intended construction was included. We use the indication <201 in (89a) because the form heropvoed is frequently used as a finite, first person singular form, as a result of which the precise number of participial uses could not be determined. The em-dash in (89d)
indicates that a cursory look immediately revealed that all cases of *hergeopvoed* were of dubious origin. We also searched for the following strings: *[heeft * V]*, *[heeft V]* and *[V heeft]* in order to get an impression of the use of the use of the strings as past participles; as the numbers were generally low, we checked the results manually. We stopped counting the past participle *heropgevoed* after we had found 20 occurrences (which happened after we checked the first 30 of 60 hits in total).

(89)  
\begin{align*}
\text{a. heropvoed} & \quad \text{[participle: <201]} \quad \text{[past participle: 3]} \\
\text{b. geheropvoed} & \quad \text{[participle: 39]} \quad \text{[past participle: 0]} \\
\text{c. heropgevoed} & \quad \text{[participle: 486]} \quad \text{[past participle: $>$20]} \\
\text{d. hergeopvoed} & \quad \text{[participle: $-$]} \quad \text{[past participle: 0]} \\
\end{align*}

The results in (89) suggest that some speakers may indeed feel that *heropvoeden* is a compound verb. It is doubtful, however, whether this can be generalized to other cases such as *heraanmelden*: whereas a search for *heraangemeld* resulted in 70 hits, there were only two relevant cases with *geheraanmeld* and none with *heraanmeld*.

B. The formation of *te*-infinitives

The examples in (90) show that the compound verb *overwegen* cannot be split, whereas the particle verb *aanmelden* must be split in certain contexts. Note again that the orders marked with a star can be found on the internet, but since the numbers are small and the results sound extremely bizarre, we have decided to simply ignore them.

(90)  
\begin{align*}
\text{a. Jan zit de mogelijkheden te overwegen/over te wegen.} \\
\quad \text{Jan sits the possibilities to consider} \\
\quad \text{‘Jan is considering the possibilities.’} \\
\text{b. Jan probeert zich aan te melden/te aanmelden.} \\
\quad \text{Jan tries REFL prt. to register} \\
\quad \text{‘Jan is trying to register.’} \\
\end{align*}

Our Google search on the string *[voor aan te melden]* resulted in 28 hits, only three of which involved the construction aimed at. However, the results for the string *[voor aan te melden]* (with a space between the two particles) include an uncertain number of relevant cases: in the majority of the results, *voor* seems to function as the prepositional part of a pronominal PP (e.g. *Hij probeert zich hier tijdig voor aan te melden* ‘He is trying to register for this in time’), but we managed to find a small number of cases of the intended construction while browsing through the first 100 results. Since the string *[te vooraan melden]* resulted in just one relevant case, it seems safe to conclude that *voor aan melden* behaves as a (separable) particle verb. The string *[voor in te tekenen]* resulted in 60 hits, but not all hits involved the construction looked for; we stopped our manual count after we found 20 relevant cases; the string *[voorin te tekenen]* resulted in four more relevant hits. Our search on *[te voorintekenen]*, with various placements of extra spaces, resulted in just two hits, so that we can again conclude that we are dealing with a (separable) particle verb.
(91) a. Jan heeft besloten zich voor aan te melden.
   Jans has decided REFL pre prt. to register
   ‘Jan has decided to preregister.’
   b. Jan heeft besloten (zich) voor aan te tekenen voor het boek.
   Jans has decided REFL pre prt. to subscribe to the book
   ‘Jan has decided to presubscribe to the book.’

The results of our Google searches for similar examples with her- are far from unequivocal. The numbers in square brackets in (92) are the combined results of searches for various variants of the strings [te her-P-V] and [her-P te V], e.g., with or without a space between her and the P-element. Naturally, the results for the (a)-examples are in line with our earlier conclusion that the use of her- does not affect the separability of the input collocation, but the results for the (b)-examples are surprising in that they show that heraannmelden sometimes behaves like a compound.

(92) a. Jan heeft besloten zijn beslissing te heroverwegen.
   Jan has decided his decision to reconsider
   ‘Jan decided to reconsider his decision.’
   a’. *Jan heeft besloten zijn beslissing herover te wegen.
   b. Jan heeft besloten zich te heraanmelden.
   Jan has decided REFL to re-prt-register
   ‘Jan has decided to reregister.’
   b’. Jan heeft besloten zich heraan te melden.

For completeness’ sake, (93) shows that the result is even more spectacular in the case of heropvoeden: (89) has shown that it is sometimes treated as a compound in the case of participle formation. The results of our Google searches show that in the majority of te-infinitives this collocation is treated as a compound.

(93) a. te heropvoeden
   to re-prt.-educate
   ‘to re-educate’
   b. herop te voeden
   c. her te opvoeden

\[ \text{C. Word order in progressive aan het + } V_{\text{infinite}} \text{ constructions} \]

Our Google searches on progressive constructions like [vooraan aan het melden] and [aan het vooraanmelden], with various placements of extra spaces, did not result in any cases of the construction we are investigating, and we therefore simply provide our own judgments in (94). Examples such as (94a) are also discussed in Blom (2005), who assigns them a question mark. Unfortunately, she does not discuss the order in (94b), which to our ears sounds far more degraded. Blom also notes that separating the two particles, as in (94c), is impossible.

(94) a. dat Jan zich aan het VOOR aan melden is.
   that Jan REFL AAN HET pre prt. register is
   ‘that Jan is preregistering.’
   b. ??dat Jan zich VOORaan aan het melden is.
   c. *dat Jan zich VOOR aan het aanmelden is.
For completeness’ sake, note that (94b) is fully acceptable if vooraan is construed as an adverbial phrase of place, which requires the compound stress pattern vooraan. In (94c), voor can readily be interpreted as a locational adverbial phrase. This is, of course, irrelevant to our present discussion.

Example (95) contains similar cases with voorintekenen. Since we were not able to find any relevant cases on the internet, our own judgments must suffice. Although (95a) may be considered somewhat marked by some speakers, it sharply contrasts with (95b&c), which seem severely degraded. Example (95c) is again acceptable with the irrelevant adverbial reading of voor.

(95) a. dat Jan (zich) aan het voor in tekenen is.
   that Jan REFL AAN HET pre prt. subscribe is
   ‘that Jan is presubscribing.’
   b. ??dat Jan (zich) VOORin aan het tekenen is.
   c. *dat Jan (zich) voor aan het intekenen is.

We now proceed to similar examples for cases with her-. Example (96) shows first that heroverwegen, in accordance with our findings above that it exhibits compound behavior, cannot be split; cases like (96b&c) do not occur on the internet.

(96) a. Jan is zijn beslissing aan het heroverwegen.
   Jan is his decision AAN HET reconsider
   ‘Jan is reconsidering his decision.’
   b. *Jan is zijn beslissing herover aan het wegen.
   c. *Jan is zijn beslissing her aan het overwegen.

Although verbs like heraanmelden can be optionally split by the infinitival marker te, our judgments on the examples in (97) indicate that the split is not possible in the progressive aan het + V\textsuperscript{infinitive} construction.

(97) a. Jan is zich aan het heraanmelden.
   Jan is REFL AAN HET re-prt.-register
   ‘Jan is reregistering’
   b. *Jan is zich her aan het melden.
   c. *Jan is zich her aan het aanmelden.

Although there are no relevant cases of heraanmelden on the internet, our judgments seem to be confirmed by similar Google searches for the verbs herindelen ‘to reclassify’, herinvoeren ‘to reintroduce’, heropbouwen ‘to rebuild’, and heropvoeden ‘to re-educate’: all these verbs frequently occur in the string [aan het her + particle + V\textsuperscript{infinitive}] but virtually never in the string [her + particle + aan het + V\textsuperscript{infinitive}]. The conclusion we can draw from the discussion above is that verbs like vooraanmelden and heraanmelden cannot be analyzed as phrasal ([\textsuperscript{V-XV\textsuperscript{o}}]), but must be seen as word-like V*-units ([\textsuperscript{V* X V\textsuperscript{o}}]); see Table 4.

D. Word order in verb cluster constructions

Our judgments on the word order in the verb clusters in (98) lead to the same conclusion as in the previous subsection. The search strings [moet vooraanmelden] and [kan voorinschrijven] in the primeless examples can be found on the internet,
albeit scantily sometimes; our Google searches resulted in 2 relevant hits for the
former and 10 for the latter. We were not able to find any instances of the orders in
the primed examples. It stands to reason that we have ignored cases in which the P-
elements were used with an adverbial meaning or where they were part of a split
pronominal PP.

(98) a. Zoek uit of je je moet vooraanmelden via Blackboard.  
    find out whether you REFL must pre-prt.-register via Blackboard
    ‘Find out whether you have to preregister via Blackboard.’
    a’. *Zoek uit of je je vooraan moet melden via Blackboard.
    a”. *Zoek uit of je je voor moet aanmelden via Blackboard.
    b. Ik lees net dat ik niet meer kan voorinschrijven.
        I read just that I no longer can pre-prt-subscribe
        ‘I’m just reading here that I can no longer preregister.’
    b’. *Ik lees net dat ik niet meer voorin kan schrijven.
    b”’. * Ik lees net dat ik niet meer voor kan inschrijven.

Our judgments on the examples in (99) again lead to the same conclusion. The
search strings [moet heraanmelden] and [moet voorinschrijven] in the primeless
examples are easy to find on the internet; our Google searches resulted in 3 relevant
hits for the former and 46 for the latter. We were not able to find any instances of
the orders in the primed examples.

(99) a. dat je je bij het opstarten moet heraanmelden.
    that one REFL with the booting must re-prt.-register
    ‘During booting one has to reregister.’
    a’. *dat je je bij het opstarten her aan moet melden.
    a”. *dat je je bij het opstarten her aan moet melden.
    b. Ik weet niet goed hoe ik mij moet herinschrijven.
        I know not well how I REFL must re-prt.-write
        ‘I’m not certain how to reregister.’
    b’. *Ik weet niet goed hoe ik mij in moet schrijven.
        I know not well how I REFL re-prt. must write

E. Conclusion

The discussion above has shown that double particle verbs like voor aan melden
‘preregister’ and particle verbs prefixed with her- behave like V*-units; they can be
separated when the formation of past/passive participles or te-infinitives is involved,
but not in progressive aan het + V\text{infinitive} or verb-cluster constructions. The fact that
they resist verb-second is therefore expected; see Table 4.

X. Immobile verbal collocations (7): type voorverkopen ‘to sell in advance’

This subsection concludes with a brief discussion of a type of immobile verb that
has received relatively little attention in the literature so far; see Den Dikken (2003)
for some preliminary remarks. Consider the examples in (100), in which a verb
prefixed with ver- is preceded by some particle-like element.
The (a)-examples behave more or less as expected given that particle verbs are normally separable, so nothing much needs to be said about these cases. The (b)-examples are also as expected since over with the meaning component “too much” normally behaves as a prefix and is thus expected to be pied-piped under verb-second; cf. Jan overvoedt zijn kat ‘Jan is giving his cat too much food’. The (c)-examples are the unexpected, immobile cases, which allow neither “pied piping nor °stranding, and simply resist verb-second altogether.

Since verbs prefixed with ver- block the realization of the preverbal part of the participial circumfix ge-...-d/t, we can only determine whether or not the P+V collocations are compounds by investigating the te-infinitives in (101). As expected, the inseparable P+V collocation in the (b)-examples must appear as a unit after the inflectional element te, whereas the two other collocation types cannot; although some speakers may feel uncomfortable with example (101c), they will agree that it is much better than its primed counterpart.

We expect the separable collocation voor verwarmen to differ from the immobile collocation voor verkopen in that only the former can be split in the progressive aan het + V infinitive constructions. Our judgments given in (102) indicate that this is indeed borne out. These judgments seem to be confirmed by a Google search (11/2/2015): the split form [voor aan het verwarmen] indeed occurs on the internet a couple of times while the string [voor aan het verkopen] could not be found.
Type, \( [V* X V] \), is a kind of in-between category; the constituent parts of the \( V^* \)-units consist of the morphological and syntactic processes indicated in the rows A to C. The second type, \( [V X V] \), the constituent parts \( X \) and \( V \) can be targeted individually by the morphological and syntactic processes in the A-row but not by the syntactic processes in the B-row. Moreover, \( V^* \)-units are special in that they are immobile; verb-second can neither affect the verbal part in isolation nor the collocation as a whole.

The data discussed in this subsection confirm our expectation that the immobile P+V collocation \( voorverkopen \) is a \( V^* \)-unit. Many questions remain, however, such as what determines whether we are dealing with a separable or an inseparable collocation. We will leave this for future research.

**XI. Summary**

This section has discussed various verb types that resist verb-second in main clauses. Verb-second resistance was found in certain X+V collocations like \( touwtje springen \) ‘to skip’, in double particle verbs like \( voor aan melden \) ‘to preregister’, and in particle verbs preceded by the prefix \( her- \) like \( heraanmelden \) ‘to reregister’. In order to provide sufficient background information for the discussion of these so-called immobile verbs, Subsections I-III provided evidence that there are at least three types of X+V collocations with the distinguishing properties indicated in Table 5. The first type, \( [v_{c} X V^o] \), is made up of true compounds; the constituent parts \( X \) and \( V \) cannot be targeted individually by the morphological and syntactic processes indicated in the rows A to C. The second type, \( [v_{c} X V^o] \), consists of phrasal constituents; the constituent parts \( X \) and \( V \) can be targeted individually by the morphological and syntactic processes indicated in the rows A to C. The third type, \( [v_{c} X V^o] \), is a kind of in-between category; the constituent parts of the \( V^* \)-unit can be targeted individually by the morphological processes in the A-row but not by the syntactic processes in the B-row. Moreover, \( V^* \)-units are special in that they are immobile; verb-second can neither affect the verbal part in isolation nor the collocation as a whole.
The immobile V*-units seem to fall apart in at least two subtypes. First, Subsection IV has shown that (optional) syntactic incorporation into the verb of (i) a bare nominal object, (ii) a bare adjectival complementive or (iii) a bare adposition (=verbal particle) can create an immobile V*-unit. Second, Subsection VI has shown that there are also V*-units like *touwtje springen ‘to skip’ which cannot have a syntactic source and must therefore be listed as such in the lexicon. Although much is still unclear about the nature of these V*-units, Subsection V suggested that there may be a syntactic reason for the fact that V*-units like *touwtje springen resist verb-second.

Subsections VII and VIII dealt with two additional types of V+X collocations that resemble *touwtje springen in that they resist verb-second: typical examples are vinger verven ‘to do finger painting’ and hand lezen ‘to palm read’. It turned out, however, that it is far more difficult to establish their type as the tests in the A- and B-column of Table 5 do not provide unequivocal results: speakers seem to be quite uncertain about how to use these collocations.

Subsection IX continued the discussion of immobile verbs with an investigation of complex particle verbs. Although such P+V colloctions can normally be analyzed either as a phrasal V'-unit or as a V*-unit, the former analysis is excluded for double particle verbs or particle verbs preceded by the prefix her-. Their V*-status correctly predicts that they cannot undergo verb-second.

Subsection X concluded with a brief discussion of immobile particle verbs of the type voorverkopen ‘to sell in advance’ that have received relatively little attention in the literature so far. The discussion has shown that this type of immobile particle verbs exhibits the behavior typical of V*-units.

10.3. Verb-first/second: special cases

This section discusses a number of special cases concerning the placement of finite verbs, which have in common that they pose (sometimes apparent) problems for the view that °verb-second is an obligatory and exclusive property of Dutch main clauses. Section 10.3.1 starts by discussing a class of main clauses in which verb-second fails to apply. Section 10.3.2 continues with a number of embedded adverbial clauses in which verb-second does apply. We will not discuss here the use of clauses introduced by the complementizer dat ‘that’ or of ‘if’ as independent utterances such as given in (104); for this, we refer the reader to Section 5.1.7.
(104) a. Dat je dat kan!
that you that can
‘It is amazing that you can do that!’
b. En of ik dat wil!
and whether I that want
‘I certainly want that!’

10.3.1. No Verb-first/second in main clauses?

This subsection discusses cases in which verb-second fails to apply in main clauses. The focus will be on clausal COMPARATIVE CORRELATIVE constructions of the form hoe A₁-er ... hoe A₂-er ‘the more A₁ ... the more A₂’; example (105a) shows that such constructions have the finite verb of the main clause, which is given in italics, in clause-final position. In more formal language, the modifier hoe is sometimes substituted by des te; we will briefly discuss the fact that this is not always possible. We also pay some attention to cases such as (105b), which only occur as proverbs.

(105) a. Hoe eerder je komt, hoe beter het natuurlijk is.
how sooner you come how better it of course is
‘The sooner you come, the better it is of course.’
b. Wat niet weet, wat niet deert.
what not knows, what not hurts
‘What one doesn’t know can’t hurt.’

Comparative correlative constructions express a positive correlation between two or more entities, properties, events etc. Two idiomatic examples are given in (106): example (106a) expresses a correlation between the number of people and the degree of enjoyment, and (106b) relates the time in the evening to the quality of the people present (normally used in jest, that is, as an ironic way of expressing a negative correlation between the two).

(106) a. Hoe meer zielen, hoe meer vreugd.
how more souls how more joy
‘The more, the merrier.’
b. Hoe later op de avond, hoe schoner volk.
how later in the evening how more beautiful folk
‘The best guests always come late.’

Clausal comparative correlatives such as (107) are problematic in the light of the hypothesis that main clauses require the finite verb to be in first or second position. If the examples in (107) are complete (that is, non-reduced) sentences, we should conclude that at least one of the two constituting clauses functions as a main clause. Nevertheless, both clauses have the finite verb in clause-final position.

(107) a. Hoe langer ik ernaar kijk, hoe meer ik erin ontdek.
how longer I at it look how more I in it discover
‘The more I look at it, the more I discover in it.’
b. Hoe groter een telescoop is, hoe meer licht hij opvangt.
how bigger a telescope is how more light he prt catches
‘The bigger a telescope is, the more light it catches.’
1292 Syntax of Dutch: Verbs and verb phrases

According to Haeseryn et al. (1997:566), examples such as (107) alternate with examples such as (108), in which the second clause exhibits verb-second: the finite verb occurs right-adjacent to the clause-initial phrase *hoe meer N*. For this reason the first clause is analyzed as an adverbial phrase.

(108) a. %Hoe langer ik ernaar *kijk*, hoe meer *ontdek* ik erin.
    how longer I at.it look how more discover I in.it
    ‘The longer I look at it, the more I discover in it.’
    b. %Hoe groter een telescoop *is*, hoe meer licht *vangt* hij op.
    how bigger a telescope is how more light catches he prt.
    ‘The bigger a telescope is, the more light it catches.’

The percentage signs in (108) indicate that according to us these examples are infelicitous; see Den Dikken (2003) for similar judgments. This might in fact be in line with the claim in Haeseryn et al. (1997) that verb-second is the less favored option in the case of *hoe* ‘how’; it is fully acceptable only if the modifier *hoe* ‘how’ is replaced by the more formal form *des te* (in which *des* is the old genitive form of the definite article), as in (109).

(109) a. Hoe langer ik ernaar kijk, *des te meer* <*ontdek*> ik erin <*ontdek*>.
    how longer I at.it look the TE more discover I in.it
    ‘The longer I look at it, the more I discover in it.’
    b. Hoe groter een telescoop *is*, *des te meer licht* <*vangt*> hij op <*vangt*>.
    how bigger a telescope is the TE more light catches he prt.
    ‘The bigger a telescope is, the more light it catches.’

It is worth noting that, although both Haeseryn et al. and Den Dikken claim that the verb-second orders in (109) are the preferred ones, a Google search (1/6/2014) on the string *[hoe meer je * des te meer]* has revealed that the °verb-final order is actually the more frequent one: we found 10 cases with and 17 cases without verb-second. This, in tandem with the fact that the verb-second order is often given as the preferred one in the more prescriptive literature (which is summarized at taaladvies.net/taal/advies/vraag/1238), suggests that this order does not belong to Dutch °core grammar (the automatically required part of the language) but is part of the periphery (the consciously learned part); this would, of course, also be consistent with the fact that *des te meer* is part of the formal register. Because we do not have sufficient information for boosting this idea, we will leave the issue for future research and simply assume here that both orders in (109) are fully acceptable. Since the verb-second order is normally restricted to main clauses, its availability in (109) makes it plausible that the second clause functions as the main clause. This is also supported by the fact, illustrated in (110), that embedding such examples blocks verb-second; see Den Dikken (2003), who also notices that embedded constructions such as (109) are possible only with °bridge verbs like *zeggen* ‘to say’, *denken* ‘to think’, *vinden* ‘to find’, etc.

(110) a. dat hoe langer ik ernaar kijk, *des te meer* <ontdek> ik erin <ontdek>.
    that how longer I at.it look the TE more discover I in.it
    ‘that the more I look at it, the more I discover.’
Position of the finite verb (verb-first/second) 1293

b.  dat hoe groter een telescoop is, des te meer licht <\text{vangt}> hij op <\text{vangt}>.
    ‘that how bigger a telescope is the TE more light catches he prt.’

In this connection it should be added that verb-second is restricted to the second
clause; it is categorically rejected in the first clause. We refer the reader to Den
Dikken (2003) for data that reveal a similar contrast between the two parts of the
English comparative correlative construction \textit{the more $A_1$ ... the more $A_2$}.

The conclusion that the second clause is the actual main clause seems firmly
grounded, but it also raises the question of the precise structure of the construction
as a whole. That the phrase \textit{des te meer} is left-adjacent to the finite verb in verb-
second position in examples such as (109) suggests that this phrase occupies the
initial position of the main clause. If correct, this would imply that the first clause is
\textit{external} to the main clause (and thus belongs to the class of elements to be
discussed in Chapter 14); this is schematically represented in (111).

(111)  $\text{[clause hoe A-er ...]}, \text{[main clause [hoe/des te A-er] ....]}$

Being external to the main clause is in fact not exceptional for adverbial-like
clauses, as we also find this in conditional and concessive clauses like (112a&b),
which will be discussed in more detail in Section 10.3.2. Such examples are also
similar to comparative correlatives in that the main clauses are introduced by (or at
least contain) some element that establishes a relation between the material external
to the main clause and the main clause itself; the linking elements \textit{dan} ‘then’ and
\textit{toch} ‘still/nevertheless’.

(112) a.  Als je wil komen, \textit{dan} ben je welkom.
    ‘If you want to come then you’re welcome.’

b.  Ook al ben je sterk, \textit{toch} ben je niet slim.
    ‘Even though you’re strong still are you not smart’

It should be noted, however, that the similarity between comparative correlative and
conditional/concessive constructions is not perfect: the linking elements \textit{dan} ‘then’
and \textit{toch} are resumptive in nature, so that we may be dealing with ‘left dislocation
(cf. Section 14.2); the linking element in comparative correlatives (\textit{hoe A$_2$-er} ‘the
more A2’), on the other hand, does not have any obvious resumptive function, so
that a left-dislocation analysis seems less plausible.

The analysis suggested in (111) raises at least two non-trivial problems. The
first problem is that we have to account for the fact that verb-second is not
obligatory in the comparative correlative construction with \textit{des te meer} in initial
position (cf. (109)), and is even impossible in the corresponding constructions with
\textit{hoe} (cf. (108)). The second problem, which is probably related to the first one,
involves the option of adding complementizers to the examples in (107). The
resulting examples in (113) are perhaps less favored than those in (107), but seem
grammatical and can all readily be found on the internet, as the reader can verify
himself by performing a Google search on the string [\textit{hoe meer (dat) je * hoe meer
(dat) je}]; examples such as (113) are also accepted by Den Dikken (2003) and
Paardekooper (1986:350/658); the latter reports to accept the complementizer of in this context as well.

(113) a. Hoe langer dat ik ernaar kijk, hoe meer Ø ik erin ontdek.
    a’. Hoe langer Ø ik ernaar kijk, hoe meer dat ik erin ontdek.
    a”. Hoe langer dat ik ernaar kijk, hoe meer dat ik erin ontdek.
    how longer that I at.it look how more that I in.it discover
    ‘The longer I look at it, the more I discover in it.’
    b. Hoe groter dat een telescoop is, hoe meer licht Ø hij opvangt.
    b’. Hoe groter Ø een telescoop is, hoe meer licht dat hij opvangt.
    b”. Hoe groter dat een telescoop is, hoe meer licht dat hij opvangt.
    how bigger that a telescope is, how more light that he prt-catches
    ‘The bigger the telescope, the more light it catches.’

Note in passing that Den Dikken (2003:9) claims that the primeless and doubly-primed examples in (113) cannot be replicated in the corresponding constructions with des te; his claim is, more specifically, that the complementizer dat cannot follow a des te-phrase in the first clause. However, this seems to be refuted by our Google search (2/7/2014), which came up with the pattern in (114), with “$” indicating that we did not find this sentence type. Our search on the string [des te meer dat * des te] resulted in 30 cases of the type in (114a), but did not yield cases of the type in (114c). The latter is in fact somewhat surprising given that the string [des te * des te meer dat] did come up in various instances of the type in (114b). Due to the fact that des te is part of the formal register, it is somewhat difficult to provide acceptability judgments on these cases, and we will therefore not digress on these examples here.

(114) a. Des te langer dat ik ernaar kijk, des te meer Ø ik erin ontdek.
    b. Des te langer Ø ik ernaar kijk, des te meer dat ik erin ontdek.
    c. "Des te langer dat ik ernaar kijk, des te meer dat ik erin ontdek.
       the TE longer that I at.it look the TE more that I in.it discover
       ‘The longer I look at it, the more I discover in it.’

To the two problems for the analysis in (111), respectively, verb-second and the use of the complementizer, the fact that the complementizer need not be present in the verb-final construction should be added. The presumed main clause may thus occur in three different forms; the form in (115b) is the expected one, whereas the forms in (115a&c) are the unexpected, deviant ones.

(115) a. [clause hoe A-er ...], [main clause [hoe/des te A-er] ... V\textit{finite}]
    b. [clause hoe A-er ...], [main clause [des te/*hoe A-er] V\textit{finite} ... t\textit{v}]
    c. [clause hoe A-er ...], [main clause [hoe/des te A-er] dat ... V\textit{finite}]

Den Dikken (2003) relates the grammaticality contrast between hoe and des te in the verb-second construction in (115b) to the fact that the phrase hoe A-er cannot normally occur in main-clause initial position, whereas des te A-er can. This is demonstrated in (116) by means of coordinate constructions with the adveritative conjunction maar ‘but’, which expresses a negative correlation.
This subsection discusses a number of potential cases of embedded clauses with comparative correlatives. The examples in (119) suggest that the second clauses in the proverbs in (118) systematically go against it. Some examples are given in (118).

(118) a. Wat niet weet, wat niet deert.  
   [proverb]  
   ‘What the eye doesn’t see the heart doesn’t grieve over.’

   b. Wie dan leeft, wie dan zorgt.  
   [proverb]  
   ‘We’ll cross that bridge when we get to it.’

   c. Wie niet waagt, wie niet wint.  
   [proverb]  
   ‘Nothing ventured, nothing gained.’

   d. Wie het eerst komt, wie het eerst maalt.  
   [proverb]  
   ‘First come, first served.’

The discussion above has shown that comparative correlative constructions of the type in (115a&c) are indeed problematic for the otherwise robust generalization that main clauses have obligatory verb-second. To our knowledge there are no other productive constructions that violate this generalization but there are idiomatic constructions that systematically go against it. Some examples are given in (118).
The examples in (118), which can probably be seen as historical relics, all have the same overall structure: the first clause is a free relative and the second clause is introduced by a resumptive (demonstrative) pronoun that links the free relative to the main clause. The parallel form of the two clauses may suggest that they have the same internal structure, but this is actually not the case given that the non-idiomatic present-day counterpart of the examples in (118) would have verb-second in the second clause; this is illustrated for (118d) in (119) with and without a resumptive pronoun.

(119) a. Wie het eerst komt, die <maalt> het eerst <*maalt>. [literal]
   who the first comes who grinds the first
   ‘Who comes first gets the first shot at grinding.’
   b. Wie het eerst komt <maalt> het eerst <*maalt>. [literal]
   who the first comes grinds the first
   ‘Who comes first gets the first shot at grinding.’

The examples in (119) suggest that the second clauses in the proverbs in (118) should be analyzed as main clauses too. We refer the reader to Den Dikken (2003) for the claim that the analyses of examples such as (118) and comparative correlatives can be unified by assuming that the non-main clauses in the latter construction are also free relatives, a property he claims to be characteristic for comparative correlatives cross-linguistically; cf. Den Dikken (2005).

To complete our discussion of the comparative correlative construction, we want to point out that comparative correlatives such as (117b”) should not be confused with *hoe ... hoe-phrases of the type in (120a), which can be used as complementives in, e.g., copular constructions; cf. A4.3.2.1, sub II. Since (120a’) shows that finite clauses cannot be used as complementives in copular constructions, the suggested sluicing-analysis for (117b”) would not be suitable for such *hoe ... hoe-phrases.

(120) a. Het wordt hoe langer hoe beter.
   it becomes how longer how better
   ‘It is getting better and better.’
   b. *Het wordt [dat het beter is].
   it becomes that it better is

10.3.2. Verb-first/second in embedded clauses?

This subsection discusses a number of potential cases of embedded clauses with verb-first/second. The starting point of our discussion is the observation that verb-first/second is categorically rejected in finite argument clauses: object clauses, for instance, always have the form in (121a&b), with the obligatorily complementizer *dat ‘that’ or of ‘if’/whether’ and the finite verb in clause-final position; the primed examples show that finite argument clauses without a complementizer and with verb-second are excluded; see Section 5.1.1, sub II. Note that we marked the primed examples with a number sign because they are acceptable as cases of (semi-)direct reported speech, but this is, of course, not the reading intended here.
Position of the finite verb (verb-first/second) 1297

(121) a. Jan zei [dat/*Ø Els ziek was]. b. Jan vroeg [of/*Ø Els ziek was].

b. ‘Jan said that Els was ill.’

(122) a. ‘Doordat Els ziek is, kan ze vandaag niet werken. because Els ill is can she today not work

‘Because Els is ill, she cannot work today.’

b. ‘Hoewel Els ziek is, gaat ze vandaag werken. although Els ill is goes she today work

‘Although Els is ill, she’s going to work today.’

Nevertheless, it often appears as if verb-first/second applies in various types of adverbial clauses; cf. Haeseryn et al. (1997:1254ff). Subsections I to III discuss three types of such adverbial verb-first (V1) clauses: the prototypical and most frequent type is represented by the conditional construction in (123a); (123b&c) illustrate two less frequent types. Subsection IV continues with a discussion of concessive verb-second (V2) clauses such as (123d) introduced by (ook/zelfs) al ‘(even) though’, in which the adverbial clause has the verb in second position. We will show, however, that all italicized clauses in (123) are external to the main clause and conclude from this that run-of-the-mill, clause-internal adverbial clauses are always verb-final. Subsection V concludes with a number of potential counterexamples to this generalization, but shows that also for these cases it is plausible that the V1-clauses in question are not clause-internal.

(123) a. Is Els morgen ziek, dan gaat ze niet werken. [conditional V1]

is Els tomorrow ill then goes she not work

‘If Els is ill tomorrow, she won’t go to work.’

b. Was Jan erg tevreden, Peter was dat zeker niet. [contrastive V1]

was Jan very satisfied Peter was that certainly not

‘Even if Jan was quite satisfied, Peter certainly wasn’t.’

c. Help Marie iemand, wordt ze door hem beroofd! [exclamative V1]

helps Marie someone is she by him robbed

‘Imagine: Marie is helping someone and she gets mugged by him!’

d. Ook al is Els ziek, toch gaat ze vandaag werken. [concessive V2]

even though is Els ill still goes she today work

‘Even though Els is ill, she’s still going to work today.’
Before starting the discussion, we want to point out that besides the instances in (123) there are other cases that are used especially in the formal register. We take the constructions in (123) to be representative of everyday usage and refer the reader for the more formal/obscure cases such as the comparison construction in (124b) to Haeseryn et al. (1997:1391ff).

(124) a. Alsof hij beter was dan anderen, zo gedroeg hij zich.
   as if he was better than others so behaved he
   ‘He behaved as if he was better than others.’
   b. Als was hij beter dan anderen, zo gedroeg hij zich.
      as was he better than others so behaved he

1. Conditional V1-clauses

The italicized conditional clauses in (125) show that verb-second is optional: if the conditional clause is introduced by the linker element als ‘if’, the finite verb occurs in clause-final position but if als is not present, the finite verb must be clause-initial.

(125) a. Als het morgen regent, dan ga ik naar de bioscoop.
   if it tomorrow rains then go I to the cinema
   ‘If it rains tomorrow, I’ll go to the cinema.’
   b. Regent het morgen, dan ga ik naar de bioscoop.
      rains it tomorrow then go I to the cinema
      ‘If it rains tomorrow, then I’ll go to the cinema.’

That verb-first cannot apply in run-of-the-mill adverbial clauses can be shown in at least two ways. First, the examples in (126) show that verb-first is marked if the resumptive element dan is not present. Example (126b) is marked with a percentage sign to indicate that the latter is possible in one specific context only, namely when the conditional clause is part of a left-dislocation construction; cf. Den Besten (1983:fn.3), Haeseryn et al. (1997:section 21.8), Den Dikken (2003), and Beekhuizen (2008).

(126) a. Als het morgen regent, ga ik naar de bioscoop.
   if it tomorrow rains go I to the cinema
   ‘If it rains tomorrow, I’ll go to the cinema.’
   b. %Als was hij beter dan anderen, zo gedroeg hij zich.
      as was he better than others so behaved he

Second, the examples in (127) show that verb-first is also excluded if the adverbial clause is in clause-final position.

(127) a. Ik ga naar de bioscoop als het morgen regent.
   I go to the cinema if it tomorrow rains
   ‘I’ll go to the cinema if it rains tomorrow.’
   b. *Ik ga naar de bioscoop regent het morgen.
      I go to the cinema rains it tomorrow
A generalization that more or less presents itself on the basis of the examples in (125)-(127) is that conditional adverbial clauses allow verb-first only if they are clause-external. This is the case in left-dislocation constructions such as (125), in which the clause-initial position of the main clause is occupied by the resumptive element *dan* ‘then’, but not in examples such as (126), where the conditional clause occupies the clause-initial position itself or examples such as (127), where it occurs in clause-final position. The structures we would like to propose are given in (128).

(128) a. \[\text{Cond-clause Als het morgen regent}, \text{main-clause dan ga ik naar de bioscoop}\].
   a’. \[\text{Cond-clause Regent het morgen}, \text{main-clause dan ga ik naar de bioscoop}\].
   b. \[\text{main-clause Als het morgen regent} \text{ga ik naar de bioscoop}\].
   b’. \[\text{main-clause Regent het morgen} \text{ga ik naar de bioscoop}\].
   c. \[\text{main-clause Ik ga naar de bioscoop Als het morgen regent}\].
   c’. \[\text{main-clause Ik ga naar de bioscoop Regent het morgen}\].

Observe that verb-first is also excluded in parenthetic conditional clauses, as shown by the examples in (129). Since it can be argued that parenthetical clauses are not structurally embedded in the main clause, this shows that being external to the main clause cannot be considered a sufficient condition for allowing verb-first.

(129) a. Ik ga morgen, als het (tenminste) regent, naar de bioscoop.
   I go tomorrow if it at least rains to the cinema
   ‘I’ll go to the cinema tomorrow, at least if it rains.’
   b. *Ik ga morgen, regent het (tenminste), naar de bioscoop.
   I go tomorrow rains it at least to the cinema

Note in passing that we can identify parenthetical clauses by means of the phrase *tenminste* ‘at least’: addition of this phrase to the examples in (125) and (126a) gives rise to severely marked results but it is easily possible in (129a). It is possible in (127a), but this requires the adverbial clause to be preceded by an intonation break.

That left-dislocated phrases are indeed clause-external is also shown by examples like (130) and (131). In (130), the main clause is an imperative, and since imperative clauses always have the finite verb in first position, the *als*-clause cannot be clause-internal. The same holds for the examples in (131), in which the main clause is a *yes/no*-question.

(130) a. Als je morgen daar bent, help hem *(dan)* een beetje!
   if you tomorrow there are help him then a bit
   ‘If you’re there tomorrow, do help him a bit!’
   b. Ben je morgen daar, help hem *(dan)* een beetje!
   are you tomorrow there help him then a bit
   ‘If you’re there tomorrow, do help him a bit!’

(131) a. Als je morgen daar bent, help je hem *(dan)* een beetje?
   if you tomorrow there are help you him then a bit
   ‘If you’re there tomorrow, will you help him a bit then?’
   b. Ben je morgen daar, help je hem *(dan)* een beetje?
   are you tomorrow there help you him than a bit
   ‘If you’re there tomorrow, will you help him a bit then?’
Observe that the V1-requirement of the main clauses in (130) and (131) makes it necessary to place the resumptive element *dan* in the middle field of the clause. The examples in (132) show that this option is not available in declarative main clauses: the resumptive element must be placed in clause-initial position as in the acceptable examples in (125) above.

(132) a. *Als het morgen regent, ik ga *dan* naar de bioscoop.
    if it tomorrow rains I go *then* to the cinema

b. *Regent het morgen, ik ga *dan* naar de bioscoop.
    rains it tomorrow I go *then* to the cinema

The hypothesis that verb-first is possible only if the conditional adverbial clause is left-dislocated predicts that embedding the two examples in (125) will not give rise to an acceptable result, given that left dislocation is a property of root clauses. The unacceptability of (133b) shows that this is indeed what we find for (125b). The case for (125a) is less straightforward in the light of the acceptability of (133a), but the fact that addition of the resumptive element *dan* is impossible (regardless of its position in the ‘matrix clause) shows that a left-dislocation analysis is not appropriate. That addition of *tenminste* ‘at least’ to the conditional clause is possible in fact suggests that we are dealing with a parenthetical clause; see the discussion of (129).

(133) a. Ik denk dat *als het morgen (tenminste) regent* ik naar de bioscoop ga.
    I think that if it tomorrow at.least rains I to the cinema go
    ‘I think that if it rains tomorrow, I’ll go to the cinema.’

b. *Ik denk dat *regent het morgen* ik naar de bioscoop ga.
    I think that rains it tomorrow I to the cinema go
That the addition of the resumptive linking element *dan* ‘then’ to example (133a) leads to unacceptability suggests that the presence of this element is a reliable clue for assuming left dislocation. If so, this supports the hypothesis based on the acceptability contrast between the examples in (125) and in (126)/(127) that verb-first is restricted to left-dislocated clauses.

Before concluding this subsection, we will briefly address two issues that may complicate the investigation of conditional V1-clauses but which have received hardly any attention in the syntactic literature so far. First, the argument built on embedding is complicated by the fact that besides examples such as (133a) it is often possible to have constructions such as (134a), with two complementizers *dat* and the resumptive element *dan*. It is not a priori clear whether such an example should be seen as the embedded counterpart of (125a) or whether we are dealing here with a performance phenomenon: processing of the embedded clause in (133a) may be hampered by the lengthy interruption of the parenthetic conditional clause, and resumption of the part preceding the parenthetical clause may therefore be seen as a repair strategy. The fact that example (125b) does not have such a “counterpart” is unexpected under the first approach and thus favors the second approach.
or should the presumed second conjunct be analyzed as a parenthetical clause? That raises the following question: are we really dealing with coordination in (135b) or the one in (136a)? We will leave this issue to future research.

Note in passing that, although examples such as (134a) seem quite outlandish at first sight, they are actually quite frequent; a Google search (2/12/2014) on the string [dat als je * dat je dan] resulted in 264 hits, the vast majority of which instantiate the intended construction. We refer the reader to Section 14.2 for a discussion of a wider range of utterances of this type.

A second complicating issue is that in coordinate structures such as (135) verb-second may apply in the second conjunct if the linker als is not realized; cf. Haeseryn et al. (1997:1252). At first sight, this seems to confirm the earlier established fact that the position of the finite verb in left-dislocated conditional clauses depends on the presence of als, but closer scrutiny reveals that the second conjunct in (135b) differs conspicuously from the cases discussed earlier in that its clause-initial position is filled by the subject; example (135c) shows that this is normally excluded in conditional clauses.

This raises the following question: are we really dealing with coordination in (135b) or should the presumed second conjunct be analyzed as a parenthetical clause? That is: should (135b) be analyzed along the line in (136a) or the one in (136b)? We will leave this issue to future research.

If we put these two complicating issues aside for the moment, we may conclude that the generalization that verb-first/second is excluded in embedded clauses can be maintained. The research question we still need to answer, however, is not “how is it that certain types of embedded clauses sometimes exhibit verb-first/second” but instead “how is it that left-dislocated clauses can sometimes take the form of either a main or a non-main clause”?

II. Contrastive V1-clauses

The conditional construction in (137a) and the contrastive construction in (137b) are similar in that the V1-clauses are not part of the main clause. This is clear from the fact that the initial position of the main clause is filled by some other constituent: the resumptive element dan in (137a) and the subject Jan in (137b). The primed
examples show that the V1-clauses cannot occupy the initial position themselves; recall that we have postponed discussion of the fact that some speakers do seem to allow (137b') to Subsection V.

(137) a. *Regent het morgen, dan ga ik naar de bioscoop.
   rains it tomorrow then go I to the cinema
   ‘If it rains tomorrow, then I’ll go to the cinema.’
   a'. %Regent het morgen, ga ik naar de bioscoop.
   rains it tomorrow go I to the cinema
   ‘If it rains tomorrow, I’ll go to the cinema.’
   b. Gaat Peter graag uit, Jan zit liever thuis.
    goes Peter gladly out Jan sits rather at home
    ‘Whereas Peter likes to go out, Jan prefers to stay at home.’
   b'. *Gaat Peter graag uit, zit Jan liever thuis.
    goes Peter gladly out sits Jan rather at home

At first sight, the primeless examples in (138) seem to show that the two V1-clauses in (137) both alternate with across-the-board adverbial clauses introduced by a complementizer and with the finite verb in clause-final position. Closer scrutiny shows, however, that this is not the case. The optionality of dan in (138a) reveals that the als-clause could be either left-dislocated or clause-internal, that is, located in the initial position of the main clause. It is of course only the left-dislocated clause that can be considered an alternant of the similarly left-dislocated V1-clause in (137a). The fact that the terwijl-clause in (138b) triggers subject-verb inversion in the main clause shows that it occupies the clause-initial position and can consequently not be seen as an alternant of the left-dislocated V1-clause in (137b). We could conclude that contrastive V1-clauses alternate with terwijl-clauses if it is possible to have terwijl-clauses without subject-verb inversion, but (138b') shows that this is not the case.

(138) a. Als het morgen regent, (dan) ga ik naar de bioscoop.
   if it tomorrow rains then go I to the cinema
   ‘If it rains tomorrow, (then) I’ll go to the cinema.’
   b. Terwijl Peter graag uitgaat, zit Jan liever thuis.
    while Peter gladly out-goes sits Jan rather at home
    ‘Whereas Peter likes to go out, Jan prefers to stay at home.’
   b'. *Terwijl Peter graag uitgaat, zit Jan liever thuis.
    while Peter gladly out-goes sits Jan rather at home
    ‘Whereas Peter likes to go out, Jan prefers to stay at home.’

The examples in (138) thus show that the alternation occurs with the conditional construction only. This should be related to another conspicuous difference between the two constructions; while Subsection I has shown that the resumptive element dan is obligatory in the conditional construction, resumption does not seem possible in the contrastive construction. This suggests that while the conditional V1-clause (indirectly) plays a semantic role in the main clause, this does not hold for the contrastive V1-clause because it is not connected to the main clause by formal means (like resumption).
The fact that the syntactic tie between the two clauses is tighter in the conditional than in the contrastive construction is reflected by the semantics of the two constructions. In the conditional construction, there is an intimate relationship between the truth of the propositions expressed by the V1-clause and the main clause, which is normally expressed in propositional calculus by the \(^2\)material implication in (139a). In the contrastive construction, on the other hand, the V1-clause and the main clause are used to independently assert a proposition, as expressed by the conjunction in (139b). The crucial difference between the two formulas is that conjunctions but not material implications are expressed by means of independent clauses.

(139) a. conditional construction: \(p \rightarrow q\)  
   b. contrastive construction: \(p \land q\)

Subsection I has shown that the resumptive element *dan* in conditional constructions must occupy the clause-initial position of a declarative main clause; see the contrast between the examples in (125b) and (132b), repeated here for convenience as (140). This would imply that the initial position plays a special role in the connection of the clauses.

(140) a. *Regent het morgen, dan ga ik naar de bioscoop.*  
   \(\text{‘If it rains tomorrow, then I’ll go to the cinema.’}\)  
   b. *Regent het morgen, ik ga dan naar de bioscoop.*  
   \(\text{‘If it rains tomorrow, then I’ll go to the cinema.’}\)

Although there is no resumptive element in the contrastive construction, it seems that there are also restrictions here on the element in the first position of the declarative main clause. In order to clarify this we first have to digress on the meaning of the construction. As the name of the construction already suggests, the key issue is the notion of CONTRAST. What is contained in this notion can be clarified by considering the larger sample of examples in (141); the notion of contrast applies to the italicized elements, and the underlined phrases occupy the initial positions of the main clauses; cf. Beekhuizen (2008).

(141) a. Gaat Peter *graag* uit, Jan *zit* meestal liever thuis. \([\text{entity}]\)  
   \(\text{‘While Peter likes to go out, Jan prefers to stay at home.’}\)  
   b. Was Marie *vroeger* arm, nu is ze erg rijk. \([\text{time}]\)  
   \(\text{‘While Marie used to be poor, she’s now very wealthy.’}\)  
   c. Praat Jan *bij Els* heel veel, *bij mij* is hij heel stil. \([\text{location}]\)  
   \(\text{‘While Jan is talkative with Els, with me he’s quite silent.’}\)

The italicized elements are topical and contrastive in the sense that the non-italicized parts of the clauses provide mutually incompatible comments on these elements: the comments in (141b), for instance, can be translated as the lambda expressions \(\lambda x \text{ POOR}(x)\) and \(\lambda x \text{ RICH}(x)\), which are mutually incompatible in the
sense that $\lambda$-conversion cannot involve a single entity e as is clear from the fact that the formula POOR(e) & RICH(e) is contradictory. The semantic function of the topical elements is to add information that resolves the contradiction, as is clear from the fact that the informal predicate logic translations of the examples in (141) given in (142) are fully coherent.

(142) a. WANT TO GO OUT(p) & RATHER STAY AT HOME(j)
   b. $\exists t_1 [\text{POOR(m)} \land t_1 < \text{now}] \land \exists t_2 [\text{RICH(m)} \land t_2 = \text{now}]
   c. $\exists p_1 [\text{TALKS A LOT(j)} \land p_1 = \text{with Els}] \land \exists p_2 [\text{SILENT}(j) \land p_2 = \text{with me}]

Beekhuizen (2008) observes that in some cases the relevant notion is not contrast but unexpectedness or, perhaps even better, concessiveness. The comments in example (143a), for example, are not contradictory but instead tautologous in nature. For example, the formula GOOD SOPRANO(e) & ABLE TO SING WELL(e) is tautologous in the sense that the denotation of GOOD SOPRANO is included in the denotation of ABLE TO SING WELL. Again the topical elements resolve the tautology, as is shown in the informal predicate logic translation in (143b). Observe that concessive examples can often be recognized by the fact that the topical element in the main clause can be preceded by the focus particle ook ‘too’; adding this particle to the contrastive examples in (141) leads to a semantically incoherent result.

(143) a. Is Els een goede sopraan, ook Marie kan goed zingen.
   Is Els a good soprano also Marie can well sing
   ‘Although Els is a good soprano, Marie also sings well.’
   b. GOOD SOPRANO(e) & ABLE TO SING WELL(m)

In his newspaper corpus Beekhuizen found that the topical elements normally refer to entities (including individuals) and aspects of the spatio-temporal settings of the propositions expressed by the two clauses. Given the semantic discussion above, this does not come as a surprise as these settings are especially suitable in resolving the contradictory/tautologous nature of the comments. Beekhuizen also found that in more than 90% of the attested cases, the initial position of the declarative main clause is occupied by the topical element. That this position is a designated position for such elements is also clear from the fact illustrated in (144) that changing the word orders of the main clauses gives rise to less felicitous results. Note that we used the diacritic “$” to express this because the main clauses are fully acceptable without the contrastive V1-clauses and there is consequently no a priori reason for assuming that the examples in (144) are syntactically ill-formed; italics and underlining are used in the same way as in (141).

(144) a. $\text{Gaat Peter graag uit, meestal zit Jan liever thuis.}$ [entity]
   goes Peter gladly out generally sits Jan rather at home
   ‘Whereas Peter likes to go out, Jan generally prefers to stay at home.’
   b. $\text{Was Marie vroeger arm, ze is nu erg rijk.}$ [time]
   was Marie in.the.past poor, she is now very wealthy
   ‘Whereas Marie used to be poor, she’s now very wealthy.’
   c. $\text{Praat Jan bij Els heel veel, hij is bij mij heel stil.}$ [location]
   talks Jan with Els very much he is with me very quite
   ‘Whereas Jan is talkative with Els, with me he’s quite silent.’
The fact that the topical constituent must occupy the initial position of the declarative main clause is again not surprising, given that contrastive topic/focus elements are generally found in this position; cf. Section 11.3.2. It is perhaps remarkable, however, that it does not seem possible to use contrastive accent to improve the examples in (144) while this is possible in contrastive coordination constructions such as (145), in which small caps indicate focus accent.

\[(145)\]

\[\text{a. Marie was} \text{ VROEGER arm, maar} \text{ NU is ze erg rijk.} \]
\[\text{Marie was in the past poor but now is she very wealthy} \]
``Whereas Marie used to be poor, she’s now very wealthy.’’

\[\text{b. Marie was} \text{ VROEGER arm, maar ze is NU erg rijk.} \]
\[\text{Marie was in the past poor but she is now very wealthy} \]
``Whereas Marie used to be poor, she’s now very wealthy.’’

This contrast between the two construction types may be related to the fact that the declarative clauses in examples such as (141) are probably not contrastive focus constructions but contrastive topic constructions, that is, have contrastive accent on the topical element, with an additional accent in the comment of the clause: it is difficult to get this accent pattern if the topical element occupies a position in the middle field of the clause: ‘‘Ze is NU erg RIJK.

\[(146)\]

\[\text{a. Gaat Peter graag UIT, JAN zit meestal liever THUIS.} \]
\[\text{goes Peter gladly out Jan sits generally rather at home} \]
``Whereas Peter likes to go out, Jan prefers to stay at home.’’

\[\text{b. Was Marie vroeger ARM, NU is ze erg RIJK.} \]
\[\text{was Marie in the past poor now is she very wealthy} \]
``Whereas Marie used to be poor, she’s now very wealthy.’’

\[\text{c. Praat Jan bij Els heel VEEL, bij MIJ is hij heel STIL.} \]
\[\text{talks Jan with Els very much with me is he very quiet} \]
``Whereas Jan is talkative with Els, with me he’s quite silent.’’

Beekhuizen further found that the associate of the topical element in the contrastive V1-clause often precedes the subject. The examples in (147) show that this is not always possible but that it depends on the information-structural properties of the subject: while definite subjects may follow the adverbial phrase in 2013 if they are part of the discourse-new information, this is impossible for presuppositional subject pronouns like hij ‘he’. This seems to fit in with the word order generalizations discussed in Section 13.2.

\[(147)\]

\[\text{a. Was in 2013 mijn buurman werkeloos, nu kan hij overal werken.} \]
\[\text{was in 2013 my neighbor jobless now can he anywhere work} \]
``Although my neighbor was jobless in 2013, he can work anywhere now.’’

\[\text{b. Was <hij> in 2013 <*hij> werkeloos, nu kan hij overal werken.} \]
\[\text{was he in 2013 jobless now can he anywhere work} \]
``Although he was jobless in 2013, he can work anywhere now.’’

In the examples above the topical constituent has the same syntactic function as its associate in the contrastive V1-clause. The examples in (148) show, however that this need not be the case: (148) shows that a subject may be contrasted with an
agentive *door*-phrase, which shows that it is sufficient if the topical elements have a similar semantic function.

(148) Beweert Jan dat Els ziek is, door Marie wordt dit ontkend.

claims Jan that Els ill is by Marie is this denied

‘Whereas Jan claims that Els is ill, this is denied by Marie.’

This section has shown that contrastive/concessive V1-clauses are external to the main clause and therefore do not constitute counterexamples to the generalization that dependent clauses do not allow V-first/second. We have also seen evidence that such V1-clauses differ from conditional V1-clauses in that they are not left-dislocated and do not alternate with run-of-the-mill adverbial clauses introduced by some linker. From a syntactic point of view contrastive V1-clauses are less intimately related to the following main clause than conditional V1-clauses, due to the lack of resumption.

**III. Exclamative V1-clauses**

The exclamative constructions in (149) are taken from Van der Horst & Van der Horst (1999:266) in a slightly adapted version. Examples like these are characterized by a typical exclamative intonation pattern; small caps indicate contrastive accent and the exclamation mark the exclamative intonation contour. Exclamative constructions are normally used to express an emotional attitude of the speaker towards the propositional content: amazement, vexation, indignation, etc.

(149) a. ZIJN we eindelijk in Parijs, REgent het de hele dag!

are we finally in Paris rains it the whole day

‘We’ve finally managed to get to Paris and it’s been pouring all day!’

b. HEEFT hij eindelijk een baan, komt hij niet OPdagen!

has he finally a job, comes he not up-show

‘At last he has a job and what does he do? He doesn’t show up!’

At first sight examples such as (149) look very similar to the marked conditional constructions with a conditional V1-clause and without the resumptive element *dan* ‘then’, the discussion of which we have postponed to Subsection V. This is a visual deception, however: in speech the intonation pattern would immediately distinguish the two. Furthermore, the two have quite different meanings. A nice illustration of this is given by Van der Horst & Van der Horst; they quote an advertisement slogan for Croma, a brand of frying fat:

(150) a. %Hou je van vlees, braad je in Croma. [conditional]

like you of meat fry you in Croma

‘If you like meat, then you fry [it] in Croma.’

b. HOU je van vlees, braad je in CROMA! [exclamative]

like you of meat fry you in Croma

‘How can you be so stupid: You like meat and you fry [it] in Croma.’

The conditional use in (150a) was of course the one intended; if one gave this slogan an exclamative intonation pattern, it would give rise to a reading expressing utter disapproving amazement, which we tried to express by means of the
that the first clause need not even be coordinated with a declarative clause, but can be a V1-clause. The examples in (153), which again are modelled on example (152b), show that this is indeed possible.

Position of the finite verb (verb-first/second)

(151) a. [ZIJN we eindelijk in Parijs], regent het de hele dag! 
    ‘We’ve finally managed to get to Paris and it’s been pouring all day!’
    [= (149a)]

   b. *Het regent [zijn we eindelijk in Parijs] de hele dag!
   c. *Het regent de hele dag [zijn we eindelijk in Parijs]!

The examples in (151) suggest instead that the first V1-clause is external to the second one. It would be another argument for assuming that the first clause is external to the second clause.

Exclamative examples such as (149) never involve a resumptive element, which may indicate that the first V1-clause is in the initial position of the second clause. However, this would run afoul of our earlier conclusion on the basis of conditional and contrastive constructions that V1-clauses are always clause-external. Let us then consider the alternative that the first clause is external to the second clause, although it is not easy to find convincing arguments for/against the two options. It would be an argument in favor of the first option if the V1-clause could also appear in some other clause-internal position, but the examples in (151) show that this is not the case.

In the introduction to this section, we have seen that concessive clauses come in at least two varieties, repeated here in a slightly different form as (155a&b). The concessive clause in (155a) is an ordinary adverbial clause: the impossibility of putting the finite verb before the clause indicates that the first clause is external to the second clause. The translation in (150b) shows that this is indeed possible.

Examples (152) and (154) strongly suggest that the exclamative constructions in (149) and (150b) involve juxtaposed clauses, which in fact ties in nicely with the observation that exclamative constructions of this sort are typical of speech because it would be another argument for assuming that the first clause is external to the second one. It would be an argument in favor of such an analysis if the contrastive V1-clause could also occur syntactically independent of the second one. The coordination constructions in (152), which are based on the examples in (149) and (150b), show that this is indeed possible.

(152) a. ZIJN we eens in Parijs, en dan regent het de hele dag!
    are we PRT in Paris and then rains it the whole day
    ‘Finally, we are finally in Paris. And, guess what, it is raining all day!’

   b. HEEFT hij eindelijk een baan, en dan komt hij niet opdagen!
    has he finally a job, and then comes he not up-show
    ‘At last he has a job and then this happens/we get such a reaction.’

   c. HOU je van vlees en dan braad je in CROMA!
    like you of meat and then fry you in Croma
    ‘He finally has a job. And, guess what, he doesn’t turn up!’

In fact, the examples in (153), which again are modelled on example (152b), show that the first clause need not even be coordinated with a declarative clause, but can also be coordinated with an interrogative clause, or a demonstrative pronoun/referential noun phrase preceded by dan.
pronoun/referential noun phrase preceded by also be coordinated with an interrogative clause, or a demonstrative that the first clause need not even be coordinated with a declarative clause, but can in fact, the examples in (153), which again are modelled on example (152b), show that this is indeed possible.

The examples in (151) suggest instead that the first V1-clause is external to the second one if the second clause could be used as an independent exclamative V1-clause in other contexts. The examples is (154) strongly suggest that the exclamative constructions in (149) and (150b) involv) show that this is also possible.

Examples (152) and (154) strongly suggest that the exclamative constructions in (149) and (150b) involve juxtaposed clauses, which in fact ties in nicely with the observation that exclamative constructions of this sort are typical of speech because exclamative V1-constructions of the type in (152) and (154) are also relatively rare in written language. If the juxtaposition analysis is indeed correct, exclamative V1-clauses are well-behaved with respect to our hypothesis that V1-clauses cannot occur clause-internally.

IV. Concessive V2-clauses

In the introduction to this section, we have seen that concessive clauses come in at least two varieties, repeated here in a slightly different form as (155a&b). The concessive clause in (155a) is an ordinary adverbial clause: the impossibility of including the particle toch in the initial position of the main clause shows that it must occur clause-internally and, in keeping with our hypothesis that V1-clauses cannot occur clause-internally, it is introduced by the complementizer-like element hoewel ‘although’ and has the finite verb in clause-final position. The concessive clause in (155b), on the other hand, must be external to the main clause, as is clear from the fact that the particle toch in the first position of the main clause cannot be omitted. Concessive main clauses such as (155b) differ from the conditional clauses discussed in the subsection I in that they do not have an alternant with the finite verb in clause-final position; examples such as (155b') are unacceptable.
(155) a. *Hoewel Els ziek is, *(toch) gaat ze vandaag werken.
   although Els ill is, still goes she today work
   ‘Although Els is ill, she’s still going to work today.’

   b. Ook al is Els ziek, *(toch) gaat ze vandaag werken.
      even though is Els ill still goes she today work
      ‘Even though Els is ill, she’s still going to work today.’

   b’. *Ook al is Els ziek, toch gaat ze vandaag werken.
      even though Els ill is still goes she today work

The reason for the ungrammaticality of (155b’) might be that examples such as (155b) cannot be analyzed as left-dislocation constructions; see the discussion of contrastive construction in Subsection II. If (155b) were a case of ‘left dislocation, we would expect the particle toch to be analyzed as a resumptive element linked to the concessive clause, but this is rather unlikely, given that example (156a) shows that this particle can also be used in examples with a clause-internal concessive clause: if toch were a resumptive element, example (156a) would have two constituents performing an identical syntactic function. Furthermore, example (156b) shows that toch differs from conditional dan in that it need not be clause-initial in declarative clauses; it can in fact even be left out entirely, although Haeseryn et al. (1997:1391) claim that this is a feature especially found in written texts.

(156) a. Hoewel Els ziek is gaat ze vandaag toch werken.
   although Els ill is goes she today still work
   ‘Although Els is ill, she’s still going to work today.’

   b. Ook al is Els ziek, ze gaat vandaag (toch) werken.
      even though is Els ill she goes today (still) work
      ‘Even though Els is ill, she’s (still) going to work today.’

The ungrammaticality of (155b’) is also related to the status of the element (ook) al ‘even though’. We have seen that we can account for the complementary distribution of als and the finite verb in initial position of left-dislocated conditional clauses by assuming that als is a complementizer occupying the C-position, that is, the target position of verb-first/second. The fact that (ook) al does not block verb-second shows that it is a regular phrase in clause-initial position and not a complementizer-like element. This is also consistent with the fact, illustrated in (157a&b), that some other constituent will normally be moved into this position if (ook) al is omitted. The conclusion that (ook) al is a phrase occupying the clause-initial position of the concessive clause correctly predicts that it cannot license the clause-final placement of the finite verb in (155b’).

(157) a. Ook al was de reclame groot, toch bleef het succes maar klein.
      even though was the publicity big still stayed the success PRT small
      ‘Even though there was a lot of publicity, the success was small.’

   b. De reclame was groot, toch bleef het succes maar klein.
      the publicity was big still stayed the success PRT small
      ‘There was a lot of publicity, still the success was small.’
Note in passing that Haeseryn et al. (1997:1392) claim that the omission of (ook) al does not require some other constituent to be moved into clause-initial position: they consider *Was de reclame groot, toch bleef het succes maar klein* possible in the formal register. According to us, this example is artificial and obsolete; see Van der Horst (2008) for a similar example from Old Dutch (p.337) and the claim that the construction with al is already common in Middle Dutch (p.773-4).

That concessive clauses introduced by (ook) al have the hallmarks of regular main clauses seems to fit in nicely with our earlier conclusion that a left-dislocation analysis is not possible; they must therefore be analyzed as independent main clauses. This is also suggested by yet another difference from conditional clauses. The (a)-examples in (158), repeated from Subsection I, show that conditional clauses in extraposed position must be introduced by als and therefore do not allow movement of the finite verb. Example (158b), on the other hand, shows that placing the concessive clause last does not affect its form; this shows again that it cannot function as a regular adverbial clause.

(158) a. Ik ga naar de bioscoop als het morgen regent.
    I go to the cinema if it tomorrow rains
   a’. *Ik ga naar de bioscoop regent het morgen.
    I go to the cinema rains it tomorrow
   b. Het succes bleef maar klein, ook al was de reclame groot.
    the success stayed small even though was the publicity big
    ‘The success was small even though there was a lot of publicity.’

The discussion above leaves us with the question as to what kind of structure is plausible for the concessive constructions under discussion. The first thing that comes to mind is that we are dealing with two juxtaposed main clauses and this may in fact be a plausible analysis for examples such as (157b), given that (159a) shows that we may also coordinate the two clauses by means of the conjunction maar ‘but’ and that the first clause can readily be used independently. This does not hold for examples such as (157a): the use of maar ‘but’ in (159b) gives rise to a degraded result and the independent use of the first clause in (159b’) has some sense of incompleteness (indicated by the diacritic “$” and a series of dots).

(159) a. De reclame was groot (maar toch bleef het succes maar klein).
    the publicity was big but still stayed the success only small
    ‘There was a lot of publicity, still the success was small.’
   b. *Ook al was de reclame groot (maar toch bleef het succes maar klein).
    even though was the publicity big but still stayed the success only small
   b’. 5Ook al was de reclame groot, ...

It follows that the examples in (159) suggest that a simple juxtaposition analysis might not be the right answer. Since we do not have any further insights to offer at this point, we leave the question unresolved as to the internal structure of the concessive construction under discussion, while concluding that this does not jeopardize the generalization that verb-first/second is excluded in dependent clauses.
V. Some potential problems

The previous subsections have shown for a number of adverbial-like V1/2-clauses that they are clause-external, and thus support the hypothesis that verb-first/second is impossible in the case of average (clause-internal) adverbial clauses. This subsection considers some potential counterexamples to this hypothesis. The first case was already mentioned in our earlier discussion but put aside. Consider again the examples in (160). Example (160b) is normally considered infelicitous but we marked it with a percentage sign, as Van der Horst & Van der Horst (1999:256ff) provide a large number of attested conditional V1-clauses without resumptive dan from various written sources such as newspapers, belles-lettres, advertisements, etc.

\begin{align*}
(160) & \text{a. } \text{Als het morgen regent (dan) ga ik naar de bioscoop.} \\
& \text{if it tomorrow rains then go I to the cinema} \\
& \text{‘If it rains tomorrow (then) I’ll go to the cinema.’} \\
& \text{b. } \text{Regent het morgen, } \% \text{(dan) ga ik naar de bioscoop.} \\
& \text{rains it tomorrow then go I to the cinema} \\
& \text{‘If it rains tomorrow then I’ll go to the cinema.’}
\end{align*}

Van der Horst & Van der Horst claim that examples of this type are a recent innovation that became especially popular in the 1980’s although they also found some cases from the 14th century onwards; the examples in (161) show that there are even a number of proverbs of this form.

\begin{align*}
(161) & \text{a. } \text{Komt tijd, komt raad.} \\
& \text{comes time comes council} \\
& \text{Approximately: ‘Time brings counsel.’} \\
& \text{b. } \text{Baadt het niet, (dan) schaadt het niet.} \\
& \text{helps it not then harms it not} \\
& \text{‘It can’t do any harm and it may do some good.’}
\end{align*}

Van der Horst & Van der Horst (1999:256ff) provide an analysis according to which conditional V1-clauses are clause-internal if dan is not present, and claim that this has become possible in analogy to constructions with als-clauses. They further suggest that the rise of clause-internal conditional V1-clauses is to be expected as this eliminates an irregularity from the system by allowing all dependent clauses to occur clause-internally. From our perspective, however, such a change would introduce an irregularity into the system because it goes against the well-supported hypothesis that V1-clauses are categorically rejected in clause-internal position. This hypothesis can be saved, however, if we assume that constructions with conditional V1-clauses but without resumptive dan are not part of Dutch °core grammar.

Two options present themselves. One possibility, which is also considered by Van der Horst & Van der Horst, is built on the observation that the use of resumptive dan is a property of spoken language, that is, it is disfavored in written language; its omission in constructions with conditional V1-clauses may therefore be a case of hypercorrection. Another possibility appeals to the fact that some speakers allow omission of resumptive elements in clause-initial position. If correct, the analysis of the constructions with conditional V1-clauses without resumptive
The analysis of the constructions with conditional V1-clauses without resumptive speakers allow omission of resumptive elements in clause-initial position. If correct, be a case of hypercorrection. Another possibility appeals to the fact that some resumptive Van der Horst & Van der Horst, is built on the observation that the use of Dutch °core grammar.

Conditional constructions with conditional V1-clauses but without resumptive internal position. This hypothesis can be saved, however, if we assume that verb-first/second change would dependent clauses to occur clause-internally. From our perspective, however, such a change would introduce an irregularity into the system because it goes against the position of the discontinuous PP *daar ... op.

Van der Horst & Van der Horst (1999:256ff) provide an analysis according to some cases from the 14th century onwards; the examples in (161) show that there is an optionality of the discontinuous PP *daar ... op.

(160) a. Regent het morgen, *[dan ga ik naar de bioscoop].
   ‘If it rains, then I’ll go to the cinema.’

b. Bananen, *[daar ben ik dol op].
   ‘Bananas, I’m fond of (them).’

Since we are not able to test whether this expectation is borne out, we have to leave this to future research, while noting that we believe that a correlation is likely to be found. The reason for this optimism is that according to Van der Horst & Van der Horst (1999:270) the rise in popularity of the two constructions in (162) occurred more or less simultaneously (in the second half of the 20th century). Whatever the outcome of such an investigation, we can conclude from the discussion above that it is not at all obvious that the occurrence of conditional V1-clauses without resumptive *dan refutes the hypothesis that V1-clauses do not occur clause-externally:

Adverbial-like V1-clauses containing the modal verbs willen and mogen constitute a second potential problem. We will confine the discussion to cases with willen, as illustrated in (163). At first sight, these examples seem to be regular conditional constructions of the type discussed in subsection 1: the optionality of the resumptive element *dan ‘then’ in (163a) suggests that the als-clause is a run-of-the-mill adverbial clause, which can either occupy the clause-initial position of the main clause or be left-dislocated; the obligatoriness of *dan in (163b) further suggests that we are dealing with a proper V1-clause in the sense that it occurs clause-externally.

(163) a. Als je wil slagen (dan) moet je harder werken.
   ‘If you want to pass the exam then come you harder work’

b. Wil je slagen *(dan) moet je harder werken.
   ‘If you want to pass the exam, (then) you must work harder.’

Closer scrutiny shows, however, that in at least some cases we may be dealing with a slightly different construction type. First, the examples in (164) show that the alternation between the als-clause and the V1-clause is not always possible.

(164) a. ??Als het project wil slagen, *(dan) moeten we hard werken.
   ‘If the project wants succeed then must we hard work’

b. Wil het project slagen, *(dan) moeten we hard werken.
   ‘We must work hard if the project is to succeed.’
Second, example (164b) does not express a “material implication: the “eventuality of “the project becoming a success” as expressed in the first clause is not presented as a sufficient condition for the eventuality of “we working hard” as expressed in the second clause. In fact, the relation is reversed: the second eventuality can be seen as a prerequisite for the first one to come into existence; Boogaart et al. (2007:240) characterize examples such as (164b) as teleological in nature. Related to this is that the modal verb willen in (164) cannot have a deontic (volitional) interpretation but is instead interpreted epistemically; cf. Section 5.2.3.2, sub IIIA. The primed examples in (165) show that teleological V1-clauses differ from the conditional ones in that they can occur in clause-final position.

(165) a. Regent het morgen, dan ga ik naar de bioscoop.  
   rains it tomorrow then go I to the cinema  
   ‘If it rains tomorrow, then I’ll go to the cinema.’
   a’. *Ik ga naar de bioscoop, regent het morgen.  
   I go to the cinema rains it tomorrow  
   ‘Imagine: Marie is helping someone and then that person robs her!’

(166) a. Wil het project *(tenminste) slagen, dan moeten we hard werken.  
   wants the project at.least succeed then must we hard work  
   ‘For the project to succeed, we must work hard.’
   b. We moeten hard werken, wil het project tenminste slagen.  
   we must hard work wants the project at.least succeed  
   ‘We must work hard in order for the project to succeed.’
   c. We moeten, wil het project tenminste slagen, hard werken.  
   we must wants the project at.least succeed hard work  
   ‘We must work hard in order for the project to succeed.’

The presence of dan proves that the V1-clause in (166a) is clause-external and the possibility of tenminste in (166a) makes it plausible that we are dealing with a
parenthetical clause, and these two facts, in turn, strongly suggest that teleological V1-clauses conform to our hypothesis that adverbial-like V1-clauses occur clause-externally only. But, of course, more investigation of this construction is needed to establish this conclusion more firmly; we refer the reader to Beekhuizen (2008:ch.5) for a good starting point.

VI. Conclusion
Subsections I to IV have shown that the italicized V1/2-clauses in (123), repeated here as (167), are clause-external; in the conditional construction in (167a), this is clear from the fact that most speakers require the expression of the resumptive element dan ‘then’ in the initial position of the main clause; in the contrastive and concessive constructions in (167b&d), this is clear from the fact that the initial position of the main clause is occupied by some other constituent. For the exclamative construction in (167c), this is a bit harder to show but a juxtaposition analysis is quite plausible given that the first clause may also be used as the first conjunct in the near-synonymous coordinate construction Help Marie iemand en dan wordt ze door hem beroofd! ‘Imagine: Marie is helping someone and then that person robs her!’.

(167) a. Is Els morgen ziek, dan gaat ze niet werken. [conditional V1]
   ‘If Els is ill again tomorrow, then she won’t go to work.’
   b. Was Jan erg tevreden, Peter was dat zeker niet. [contrastive V1]
   ‘Whereas Jan was very satisfied, Peter was that certainly not
   c. Help Marie iemand, wordt ze door hem beroofd! [exclamative V1]
   ‘Imagine: Marie is helping someone and that person robs her!’
   d. Ook al is Els ziek, toch gaat ze vandaag werken. [concessive V2]
   ‘Even though Els is ill, she’s still going to work today.’

The discussion supported the hypothesis that verb-first/second is impossible in run-of-the-mill, that is, clause-internal adverbial clauses. Subsection V concluded with a number of potential problems for this hypothesis; it seems plausible, however, that the V1-clauses discussed in this subsection are not clause-internal either.