ON N. CHOMSKY'S STRICT SUBCATEGORIZATION OF VERBS

1. This paper studies the so-called *strict subcategorization rules*, and the theory associated with them, in the transformational grammar of English as proposed by Noam Chomsky in his *Aspects*.  

2. The syntactic component of English transformational grammar consists of two mutually ordered parts, viz., the base and the transformational subcomponents. The initial part of the base are the so-called *categorial rules*, which are of almost exclusive interest to us here. Their primary task is to generate what are usually called *basic sentence patterns*, and will here, with Chomsky (*Aspects*, p.113), be designated with the expression, *frames of category symbols*. — The rules of the transformational subcomponent modify, in various ways, the frames generated by the base. For several reasons — one of them being that the correct work of the transformational subcomponent quite often depends on the kind of lexical items with which the syntactic *positions* in the frames of category symbols have been filled — the lexical items must be introduced from the lexicon into the empty positions in the frames before the rules of the transformational subcomponent can be allowed to modify the frames. It is with the introduction of the lexical items into the frames that the strict subcategorization rules, another constituent of the base, have to do.

3. How exactly the lexical items are inserted into the frames of category symbols, is a question not altogether settled. For a discussion of this, see, e.g., *Aspects*, pp. 120-3. So much is certain, however, that the insertability of a lexical item into a position of a frame of category symbols is governed by quite severe restrictions. This has led to the inclusion, into the theory of language, of a number of conventions that prescribe the canonical form of the lexical entries and regulate the process of inserting the lexical items into the frames. As to the form of the lexical entries, each entry must have associated with it a *complex symbol*, in which is stated the information required, or supplied, by the conventions described below.

First, there is a convention that each lexical item is to be specified as capable of being *dominated* by at least one of the category symbols that immediately dominate those positions in the frames into which the lexical

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1 N. Chomsky, *Aspects of the theory of syntax*. Cambridge, Mass., 1965. — Some familiarity with this work is assumed throughout the paper, of which the fully initiated reader need only read §§ 5, 8 ff.

2 On the notions of *dominate* and *immediately dominate*, see § 6 below.
items can be inserted. In the present theory, such category symbols are, e.g., N (= noun), V (= verb), Place (= adverbial complement of place), etc. So every lexical item is specified as either [+ N], or [+ V], or [+ Place], etc. The convention further states that any lexical item X can only be introduced into those positions in the frames that are immediately dominated by the category symbols in terms of which X is specified, in the lexicon, as capable of being dominated by. — The convention prevents, e.g., *find Johned Mary from being derived from the frame \(NP^{\text{Aux}}V^{\text{NP}}\) beside the correct John found Mary.\(^3\)

Secondly, there is a convention that requires some kinds of lexical items to be specified in terms of the frame(s) into which they may be introduced. There is, e.g., a frame that permits the introduction of lexical items that are verbs followed by the direct object and, possibly, other complements (cf. bring), and another frame that permits the introduction of the lexical items that are verbs followed by no verb complement (cf. elapse). In order to prevent the grammar from generating *John elapsed a book, beside the grammatical John brought a book, it is necessary to specify, in the lexical entry of elapse, that this verb can only be introduced into the frame (or rather, into a member of that set of frames) which is — loosely speaking — characterized by the lack of the positions usually called objects. Likewise in innumerable other cases.

The task of the specification of the frames is of considerable theoretical and practical interest because (to adduce just one reason) it is not irrelevant, for a grammar whose evaluation measure favours the shortness of its rules and of the representations of its items (cf. Aspects, pp. 42-4), to state whether the complete frame is to be indicated in each case, or only a part of it. Seeing that some positions are present in all the frames generated by the rules of the base subcomponent, Chomsky has decided on the partial specification of the frames in the complex symbols of the lexical items, and introduced, into the base subcomponent of the grammar, a new kind of rules called strict subcategorization rules. Given a frame \(F\) and, in \(F\), a position \(P\) into which lexical items can be introduced, these rules automatically indicate which part of \(F\) has to be specifically mentioned in the complex symbols of the lexical items that can be introduced into \(P\). As Chomsky puts it, in Aspects, p. 113, »Strict subcategorization rules /.../ subcategorize a lexical entry in terms of the frames of category symbols in which it appears.« — Empirical evidence seems to indicate that only the lexical categories\(^4\) V and N need be so subcategorized.\(^5\) — We shall presently return to the convention expressed in the strict subcategorization rules.

\(^{3}\) Alternatively, the convention permits the generation of *find Johned Mary, but stamps such strings as deviant. — Similar alternatives concerning the generation of deviant sentences could be pointed out in a number of cases below. Far from being unimportant, this matter is nevertheless almost irrelevant in the context of the present paper, and will in view of this not be mentioned again.

\(^{4}\) A category designated by a category symbol that immediately dominates a position into which lexical items can be introduced, is called a lexical category. — On immediately dominate, see § 6 below.
Thirdly, there is a convention that requires the lexical items described, by the first-mentioned convention, as [+ N] or [+ Article], to be specified in terms of the so-called syntactic features, such as, for [+ N]: [± Common], [± Count], [± Animate], [± Human], [± Abstract]; for [+ Article]: [± Definite]. The same syntactic features are introduced, by the rules of the base subcomponent, into the positions of the frames, dominated by the category symbols N or Article. The convention permits only those lexical items to be introduced into these positions that are both instances of N or Article, and specified in terms of the same syntactic features as the positions into which they are to be inserted. — This feature specification is a preliminary to the next-mentioned convention.

Fourthly, there is a convention that requires some kinds of lexical items (other than instances of N or Article) to be specified in terms of that part of their context that consists of the syntactic features previously allotted, in accordance with the third-mentioned convention, to the positions, in the frames, immediately dominated by the category symbols N or Article. The specification accounts for the situations such as the following. Some adjectives can only co-occur with non-Abstract nouns; some verbs can only co-occur, within the simplex sentence, with Animate direct objects (cf. *frighten in sincerity frightens the boy, as against sincerity frightens the table, where table is non-Animate), etc. The convention requires, for the time being, only lexical items that, are [+ Adjective] or [+ V] to be so specified, and introduces, with the help of the so-called selectional rules, the same specifications, called selectional features, into the positions, of the frames, to be filled with the lexical items that are either [+ Adjective] or [+ V]. The convention permits only those lexical items to be introduced into these positions, that are both instances of Adjective or V and specified in terms of the same selectional features as the corresponding positions of the frames.

Fifthly, a convention, presumably incorporated into the semantic component of the grammar, sees to it that sentences like Chomsky's oculists are generally better trained than eye-doctors (see Aspects, p.77), where oculists and eye-doctors are completely synonymous, are marked as deviant by the grammar.


6 Only these two kinds are actually treated, from this point of view, in the fragmentary grammar presented in Aspects, pp. 106-7.

7 This is a complete list of the relevant subset of the syntactic features, as stated in Aspects, pp. 82 ff., 107. Examples (Aspects, p. 83): boy, dog, book, virtue, dirt are [+ Common]; John, Fido, Egypt are [- Common]. Boy, dog, book are [+ Count]; virtue, dirt are [- Count]. Boy, dog; John, Fido are [+ Animate]; book, Egypt are [- Animate]. Boy, John are [+ Human]; dog, Fido are [- Human]. Virtue is [+ Abstract]; dirt is [- Abstract].

Lastly, there is a convention requiring that each lexical item \( X \) be specified in terms of the transformations that those lexical strings are permitted to undergo that originate from the frames of category symbols into which \( X \) has been inserted. Thus, while some lexical items that are \([+\text{V}]\) must be marked as undergoing the passive transformation, others must be marked as not undergoing it, although the strings satisfy the structural description of the transformation in question.\(^9\)

4. Before returning to the strict subcategorization rules, I propose to present the initial rules of the base subcomponent of English grammar. These rules generate the frames of category symbols upon which the work of the strict subcategorization rules depends.\(^{11}\)

\[
\begin{align*}
(i) & \quad S \rightarrow \text{NP}^\text{Copula} \text{Predicate-Phrase} \\
(ii) & \quad \text{Predicate-Phrase} \rightarrow \text{Aux}^\text{Operand} \text{VP} \text{Prep-Phrase} \text{Time} \\
(iii) & \quad \text{VP} \rightarrow \begin{cases} 
\text{NP} (\text{Prep-Phrase}) (\text{Prep-Phrase}) (\text{Manner}) \\
\text{S} \\
\text{Predicate} \end{cases} \\
(iv) & \quad \text{Predicate} \rightarrow \begin{cases} 
\text{Adjective} \\
(\text{like}) \text{Predicate-Nominal} \end{cases} \\
(v) & \quad \text{Prep-Phrase} \rightarrow \text{Direction}, \text{Duration}, \text{Place}, \text{Frequency}, \text{etc.} \\
(vi) & \quad \text{V} \rightarrow \text{CS}
\end{align*}
\]

A cursory explanation of the symbols used in the rules (The order of the symbols is the same as that in which the symbols appear in the rules; the note «see rule...» means that the meaning of the symbol is to be deduced from the way in which the symbol is developed in the rule referred to):

\( S = \) sentence. \( \text{NP} = \) nominal phrase. \( \text{Predicate-Phrase} \): see rule (ii). \( \text{Aux} = \) auxiliary; in rule (xvi), not stated above, this symbol is rewritten as Tense (M) (Aspect), where M = modal verb. \( \text{VP} = \) verbal phrase; see rule (iii). On the parenthesis convention, ( ), see below § 8. Place = adverbial complement of place; examples: \( \text{here}, \text{in the bookstore}, \text{everywhere}, \ldots \) (but not \( \text{to the bookstore}, \text{etc.} \)). Time = adverbial complement of time; examples: \( \text{yesterday}, \text{sometime}, \text{today}, \ldots \) (but not \( \text{frequently}, \text{for a long time}, \text{etc.} \)). The braces, \{ \}, contain alternate strings of symbols. Copula: example \( \text{be} \). Predicate: see rule (iv). \( \text{V} = \) verb. \( \text{Prep-Phrase} = \) prepositional phrase (roughly: preposition^\text{NP}, but see also rule (v)). Manner = adverbial complement of manner; examples: \( \text{with enthusiasm}, \text{patiently}, \text{etc.} \). \( \text{S'} = \) sentence; in contradistinction to \( \text{S} \) it indicates »the position of a transform

\(^9\) In this respect e.g. \( \text{live} \) (in \( \text{England is live} \) by many people — see Aspects, pp. 217-8) and \( \text{dash} \) (in "this room was dashed into by John — see Lakoff, o. c., p. F-13) contrast. Some information on the passive transformation has to be stated in the lexical entries of \( \text{live} \) and/or \( \text{dash} \) irrespective of the possibility that the passive transformation may be dependent upon the presence of a dummy string by \( \text{passive} \) in the deep structure.

\(^{11}\) Examples of (not fully specified) lexical items containing the information required by the enumerated conventions are to be found in Aspects, e.g., pp. 94, 107; cf. also § 2 of chapter 1: The structure of the lexicon.

\( ^{11}\) The rules are stated in Aspects, pp. 106-7, see also p. 102. Here, nos. (i-vi) are reproduced in exactly the form given l.c.
of a sentence (Aspects, p. 216). Adjective: examples: red, good, etc. Predicate-Nominal: examples: a new man (in feel like a new man), president (in become president), etc. Direction = adverbial complement of place indicating direction (of movement); examples: to the bookstore, into the room, etc. — Notice that the same category symbol, Place, is generated twice, both in rule (ii) and in rule (v).12 — Duration = adverbial complement of time indicating duration (of action, state); examples: for three hours, long, etc. Frequency = adverbial complement of time indicating frequency (of action, state); examples: three times a week, often, etc. CS = complex symbol, i.e., the data specified in the positions of the frames, and in the lexical entries, as required by the conventions enumerated in § 3 above.

Rule (i) states that every sentence consists of a (subjectival) nominal phrase and a predicate phrase. (Notice that the term Predicate is used in another meaning, see rules (iii-iv).) — Rule (ii) states that every predicate phrase consists of an auxiliary and a verbal phrase, to which an adverbial of place and/or an adverbial of time are optionally added (on this see §§ 8 f. below). — Rules (iii-iv) essentially finish the generation of the frames of category symbols as concerns the structure of the verbal phrase. — Rule (vi) is a conventionalized expression that triggers off the strict subcategorization of the verb, on which see below, §§ 6-7. — Of the remaining twelve rules, not stated here, rule (vii) rewrites the nominal phrase, and rule (viii) triggers off the strict subcategorization of the noun. As we here limit our attention to the strict subcategorization of verbs, we shall let these remarks on the structure of the rules suffice.

In Aspects, pp. 92. 94-6, the following possible partial structures of the VP are enumerated, together with the examples given:

V Adjective: grow old/sad, feel sad, become sad, seem sad, look sad
V Predicate-Nominal: become president
V like Predicate-Nominal: look like a nice person, act like a fool, seem like a nice fellow, feel like a new man
V S': think that he will come, believe it to be unlikely, believe that it is unlikely (the structure of this example is actually given as V that S')
V NP S': persuade John that it is unlikely, persuade Bill that we should leave,
   persuade John that there was no hope (the structure of this example is actually given as V NP that S')
V NP: eat food, grow a beard, believe me, bring the book
V: elapse, grow (as in John grew), look (as in John looked)
V Prep-Phrase: look at Bill, decide on a new course of action
V NP (of Det N) S': persuade Bill of the necessity for us to leave
V Prep-Phrase Prep-Phrase: argue with John about the plan
V NP Prep-Phrase Prep-Phrase: save the book for John
V NP Prep-Phrase Prep-Phrase: trade the bicycle to John for a tennis racket.

5. The provisional character of the rules stated,13 which must be insisted on, is shown among other things by the following circumstances, pointed out here because they are relevant to the matter under discussion.

First, there is the question of the category symbols Time and Place ii introduced in rule (ii) as optional constituents of the predicate phrase. This matter is discussed in §§ 8-9 below.

Secondly, the present version of rule (v) raises important questions, some of which are as follows:

12 To facilitate reference, the symbols Place ii and Place v will be used below (by way of a purely notational device) for Place as generated by rule (ii) and by rule (v), respectively.

13 This has often been emphasized by the writers on transformational grammar, both as regards the specific solutions proposed and the general framework.
(1) The terminal etcetera symbol in rule (v) suggests that the repertory of the categories to be immediately dominated by Prep-Phrase is not yet definitively determined. Judging by the post-Aspects work done on transformational grammar, the etc. presumably includes, at least, Instrument and Reason.\(^\text{14}\)

(2) The category symbols Direction, Place-v, Duration, Frequency, etc. are generated alternatively, i.e., so that each occurrence of the symbol Prep-Phrase in the frame can be rewritten as only one of the symbols enumerated on the right side of rule (v). While there is no denying, on the basis of empirical evidence, that Place-v and Direction alternate with each other\(^\text{14}\) (in the sense that, whenever they actually co-occur in real sentences, this fact can invariably be explained with the help of the assumption that what could be an instance of Place-v is in reality an instance of some other category of the deep structure), the empirical evidence furnishes clear examples at least of pairs, if not also triples, of instances of Duration, Frequency, Direction/Place-v co-occurring within real simplex sentences. Examples: *remain in England for a long time* (Place-v and Duration), *dash into the room three times a week* (Direction and Frequency), *last three hours three times a week* (Duration and Frequency). I think that — if the present form of rule (v) is to be preserved — we are entitled to such an explanation concerning these examples as would not contradict the arrangement of the right side of rule (v). (The explanation would be of great importance for the study of the grammar of, say, Slavic languages, in which adverbials like Duration and Frequency are closely linked with aspectual phenomena, and as such require careful treatment.)

(3) If an explanation of the kind required in (2) above is not propounded, and the grammar consequently has to be corrected so as to allow for the category symbols Direction/Place-v, Frequency, Duration, etc. to co-occur within some simplex frames of category symbols, a further difficulty arises. Suppose that we wish the grammar to generate a frame that contains both Duration and Instrument within the same VP. Cf. *write with a pen for a long time*. Obviously, in this case we wish the grammar to rewrite the leftmost Prep-Phrase generated by rule (iii) as Instrument, and the rightmost Prep-Phrase generated by the same rule as Duration, or v.v. This, however, leaves us without any possibility of introducing, say, an indirect object into such a frame, and thus makes the model too poor, from the empirical point of view: we are forced to conclude that the category symbols like the Prep-Phrases playing the rôle of indirect objects (*to*/for a person), and other Prep-Phrases that are not rewritten as any of the complements enumerated on the right side of rule (v) (cf. *write on a piece of*..."
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paper, eat from the plate), are only in limited ways combinable, within the simplex frames of category symbols, with category symbols such as Direction/Place-v, Frequency, Duration, etc. With »in limited ways«, I mean the following. Whenever rule (iii) generates one Prep-Phrase, and rule (v) applies, there can be no indirect object in the same frame; whenever rule (iii) generates two Prep-Phrases, and rule (v) applies to one of the two Prep-Phrases, and the remaining Prep-Phrase is rewritten as indirect object, there are no other Prep-Phrases in the frame that are not rewritten in accordance with rule (v); whenever rule (iii) generates two Prep-Phrases, and rule (v) applies twice, there are no Prep-Phrases in the frame that are not rewritten in accordance with rule (v) — which goes to say that indirect objects cannot co-occur with more than one of the category symbols Direction/Place-v, Frequency, Duration, etc. This seems to contradict the facts; Chomsky's own example (see Aspects, p. 96) trade the bicycle to John for a tennis racket, containing a Prep-Phrase rewritten as indirect object to John and the Prep-Phrase for a tennis racket (to which rule (v) has — presumably — not applied) is readily expandable with, say, five times, which is a Frequency.

(4) But suppose for a moment that an explanation of the kind required in (2) above is available, so that not more than one Prep-Phrase need be rewritten in terms of rule (v). In this case we lack the information as to which of the two Prep-Phrases is to be rewritten when rule (v) applies. Only superficially is this merely a technical matter: since context-sensitive rules are not allowed in this part of the grammar (Aspects, pp. 112, 141), a new category symbol would have to be introduced into the theory of language to supplant one of the Prep-Phrases.

(5) There is yet another sense in which the grammatical model discussed seems to be too weak. The application of rule (v) is naturally restricted to those frames of category symbols that contain one or more Prep-Phrases. Consequently sentences derived from frames containing the VP of, say, the type V^S' (cf. I believed/thought that . . . ), which contain no Prep-Phrases in their deep structure, should not contain instances of Frequency, Duration, Direction/Place-v, etc. Now consider the sentence I believed/thought for a long time that . . . , in which the structure of the VP is V^S'~Duration. How are such examples to be accounted for?

(6) As rule (v) stands now, it is obligatory, and so rewrites every Prep-Phrase generated by rule (iii). This again makes the model too poor because it even excludes the Prep-Phrases that are indirect objects, from the frames of category symbols. If the rule is to remain in the grammar in its present form, which is doubtful, it should be made either optional, or the source of every possible Prep-Phrase (including the indirect object) that is dominated by the VP and generated by the categorial rules of the base.

(7) On the other hand, rule (v), optional or obligatory, generates (from Prep-Phrase~Prep-Phrase) also structures such as Duration~Duration, Frequency~Frequency, etc., which are actually never needed, because any pairs, or triples, or . . . , containing identical elements of these are developed by
the transformational rules from structures consisting of two, or three, or..., connected S's (see Aspects, pp. 137, 225 note 11). We feel intuitively that this is not due to mere chance, and therefore wish the theory explicitly to express this constraint. — This may look like unfair criticism to those who know that Chomsky relies on the so-called »filtering«, or »blockings«, effect of the transformational rules (Aspects, pp. 138-9) to determine whether a frame of category symbols is well formed in the sense that it is presumed, by the grammar, to underlie an actual sentence. Thus there would simply be no transformations that developed frames containing, say, Duration-Duration any further, and in this sense such frames do not qualify as frames. The weakness of this approach seems to me to lie in the circumstance that it fails to differentiate between frames that never qualify as deep structures (the type of Duration-Duration), and frames that may qualify in some languages but not in others, presumably for language-dependent reasons. The transformational »filter« seems to be capable of covering both cases, but, I repeat, fails to differentiate between them, and therefore is in need of a supplement in the form of universal constraints on the form of the strings (and/or the structural descriptions of transformations) in the former case.16

16 To the points just enumerated above, two, less relevant in the context of this paper, are added here:

(1) It has been tentatively suggested by Chomsky (Aspects, p. 141) that to a large extent, the rules of the base may be universal, and thus not, strictly speaking, part of particular grammars«. If this is true, we can evaluate the rules proposed in the light of data furnished by languages other than English. Here we shall just touch upon a single aspect of the evaluation from this point of view, viz., the question of the relevancy of the subjectival nominal phrase to the strict subcategorization of verbs. As will be seen below (§ 7), in the Aspects-version of English transformational grammar this category is considered totally irrelevant in respect of the strict subcategorization of verbs. Since this means that all lexical items (of all languages, if the base is universal) that contain the feature [+ V] invariably co-occur, within the simplex frames of category symbols, with subjectival nominal phrases, there arises the question, so far unanswered, as to the treatment of the so-called »impersonal« sentences, which are so abundant, e.g., in Slavic languages. While Chomsky's grammar treats the dichotomy expressed in the opposition of personal vs. impersonal sentences as purely secondary (pertaining to the surface structure only), in the past work on the syntax of Slavic languages the classification of sentence patterns usually began with this dichotomy. We are, therefore, curious to see a comprehensive treatment of the Slavic impersonal sentences from Chomsky's point of view.

(2) The category symbol Direction of rule (v) is to be substituted for by combinations of lexical items yielding, e.g., to the bookstore etc., in which the goal of some movement is indicated. Now in all the cases of sentences in which the only adverbal complement of place which is not a Place-ii indicates the goal of the movement, the complement is synonymous with the extended complement Direction~from some place; thus, he dashed into the room is synonymous with he dashed into the room from some place, as against, say, enter into a combination, which is not expandable to *enter into a combination from some place, and where the prepositional phrase into a combination is not a Direction. On the other hand, whenever the only adverbal complement of place that is not a Place-ii indicates the movement from some place, the complement is synonymous with itself expanded with to some place; thus they came from London is synonymous with they came to some place from London, as against, say, he ate from a broken plate,
6. We are passing on to the informal presentation of the strict subcategorization. This process is triggered off by rules that are instances of the rule schema

\[ A \rightarrow CS \]

where \( A \) is the symbol to be subcategorized. Chomsky says (Aspects, p. 99) that this rule schema is short for

\[ A \rightarrow CS / \alpha \rightarrow \beta \]

where \( \alpha A \beta \) is a \( \sigma \), where, furthermore, \( \sigma \) is the category symbol that appears on the left in the rule \( \sigma \rightarrow \ldots A \ldots \) that introduces \( A.\alpha \)

A category symbol that occupies the left side of a categorical rule is said to immediately dominate each category symbol introduced in the same categorical rule. Thus, \( \sigma \) immediately dominates \( A \) in the rule \( \sigma \rightarrow \ldots A \ldots \). — The broader notion of dominate will here be informally presented with the help of the graphical representations of an ordered sequence of rules. As is well known, the ordered sequence of rules

\[ \ldots \rightarrow B^\sigma \]

\[ \sigma \rightarrow a^\alpha A^\beta \]

\[ \alpha \rightarrow X^\chi Y \]

\[ A \rightarrow CS \]

can be represented as

![Graphical representation of the rules](image)

(where the ellipsis under \( A \) stands for the complex symbol of \( A \)). A node \( N' \) (i.e., any point at which a line of the graphical representation ends) is said to dominate another node \( N'' \) whenever \( N'' \) is, graphically, under \( N' \) (i.e., \( N'' \) is introduced in a later rule than \( N' \)), and \( N' \) and \( N'' \) are connected, directly or indirectly through other nodes (all of which have been generated

which sentence is not expandable to *he ate from a broken plate to some place*, and where the prepositional phrase *from a broken plate* does not indicate movement from some place. — These facts have so far remained unexpressed in English transformational grammar, and should, moreover, presumably be treated as language universals. — On p. (2), see also J. D. Apresjan, »Opyt opisanija značenij glagolov po ix sintaksičeskim priznakam (tipam upravlenija)«, Voprosy jazykoznaniya, 1965, 5.
by later rules, that N'), with the help of the graphical lines. — Thus, in the
graphical representation above, o dominates o, X, Y, A and β.

At the point at which the rule A → CS applies, B, X, Y, A, and σ represent
the last line of the derivation under construction. They constitute a frame
of the following form: B^X^Y^A^σ. — We are now ready to state which
part of this frame is relevant to the strict subcategorization of A:

The part of the frame of category symbols that is relevant to the strict
subcategory of A is constituted by those category symbols of the last
line of the derivation under construction that are dominated by the node
that immediately dominates A.

Using the notational conventions of Aspects, we can in our case state
the relevant part of the frame as follows:

\[ X^Y^β. \]

Consequently, the complex symbol of A contains the strict subcategorization
feature \([+ X^Y^β]\). The complex symbol of any lexical item that can be
inserted into position A in the frame of category symbols must contain the
features \([+ A]\) and \([+ X^Y^β]\) (convention 2 above, § 3).

7. We are now ready to observe the effect of the strict subcategorization
principle with respect to the category V. The reader is referred to § 4 above,
where the relevant rules are stated, and is advised to draw the graphic
representations of some of the possibilities expressed in the rules. We see that
V is introduced into the grammar by rule (iii); it follows from the structure
of this rule that V is immediately dominated by VP; beside dominating V,
VP also dominates NP, Prep-Phrase (one or both of them), Manner, S', Pre-
dicate, as the case may be; whenever rules (iv) and (v) apply, VP also
dominates the category symbols immediately generated by these rules.
Consequently, the category symbols just enumerated form the relevant part of
the syntactic frame with respect to V at the time of the application of rule (vi)
if they and V co-occur in any frame under construction. On the other hand,
VP does not dominate the subjectival NP, Aux, Time, and Place-II; these,
then, are not relevant to the strict subcategorization of V.

Example: John worked at the job at the office (see Aspects, p. 101). Just
before the application of rule (vi), the last line of the derivation under
construction is NP^Aux^V^Prep-Phrase^Place-II. Through the application of
the strict subcategorization rule (vi), V is allotted a complex symbol con-
taining the strict subcategorization feature \([+ Prep-Phrase]\). The complex
symbol of the lexical entry of work must contain \([+ V]\) and \([+ Prep-
Phrase]\). The identity of the two complex symbols (viz., of the complex
symbol of V and of the complex symbol of work) is a condition sine qua non
of the insertability of work into the position V of the particular frame.

The above informal presentation of the notions dominate and immediately
dominate does not do justice to these notions, which are in reality used in a much
more general way than indicated here. For a better, but still non-technical, approxi-
mation, see Emmon Bach, An introduction to transformational grammars, New
York, 1964, pp. 72-3.
8. At this point we must discuss the parenthesis convention used in the rules in § 4 above. Consider the case of Manner in rule (iii). Clearly the parentheses go to say that

(1) there is a set of such frames of category symbols as contain Manner,
(2) there is a set of such frames of category symbols as do not contain Manner.

The two points are to be interpreted as meaning that there are verbs

(1') that co-occur with manner adverbials,
(2') that do not co-occur with manner adverbials, within the same simplex sentence of the deep structure.

The points (1—2) are borne out by the empirically verifiable fact that there actually exist sentences of both kinds — those containing manner adverbials, and those without them.

It is pointed out in Aspects, pp. 166-7, that the verbs of the simplex sentences not containing manner adverbials, can be further classified as

(2 a) those that can take manner adverbials freely (although they do not do so always), and
(2 b) those that cannot take manner adverbials freely.

Thus, while we can have he read the book and he read the book carefully (where carefully is a Manner), we cannot have *John resembled his father carefully, although we can say: John resembled his father.

To account for the difference between (2 a) and (2 b), Chomsky makes the complex symbols of the lexical items such as resemble (type 2 b)) contain the strict subcategorization feature [+ — NP] (but not [+ — NP Manner]), and makes the complex symbols of lexical items such as read (type (2 a)) contain the subcateg. feature [+ — NP Manner]. To this Chomsky adds a syntactic redundancy rule (see Aspects, p. 168) of the following form:

[+ — ϕ Manner] → [+ — ϕ],

where ϕ stands for »any constant string« (e.g., NP). The rule is to be interpreted as introducing a new strict subcategorization feature (i.e., the one stated on the right side of the rule) into those complex symbols in the lexicon that contain strict subcategorization features of the form stated on the left side of the rule. With lexical items such as read this means that, after this rule has been applied to their complex symbols, the items are specified not only as insertable into the set of such frames of category symbols as contain a VP of the structure V Manner, but also into the set of frames containing a VP of the structure V NP.

An implication of the inclusion of the described type of syntactic redundancy rules into the grammar is that any such frame of category symbols as some syntactic redundancy rule postulates the existence of, is identical to at least one frame that is included into the grammar independently of any syntactic redundancy rules.

Illustration: the syntactic redundancy rule stated above postulates, by implication, the existence of a set of such frames of category symbols as contain a VP of the form V ... , where the ellipsis contains no Manner. In particular, the above redundancy rule postulates the existence of a frame
containing a VP of the form \( V^\wedge NP \ldots \), where the ellipsis contains no Manner. Now, is such a frame needed in the grammar quite independently of the above redundancy rule? It is: it serves to account for sentences such as *John resembled his father*.

Can this implication of the parenthesis convention and of the syntactic redundancy rules in all cases be empirically verified? This is important for the following reason. If the verification gives a negative result in some cases, we are forced to conclude that the *Aspects*-version of English grammar contains two kinds of frames:

1. such as are required to account for sentences of the type of *John resembled his father*, and may be at the same time postulated by the syntactic redundancy rules;

2. such as are postulated by the syntactic redundancy rules *only*.

Bearing this implication of the parenthesis convention and of the syntactic redundancy rules in mind, we proceed to study the category symbols Place-\( ii \) and Time, which are enclosed in parentheses just as Manner is (see rule (ii) of § 4 above). Interpreting the parentheses in the same way as in the case of Manner, above, we are bound to assume that

1. there is a set of such frames of category symbols as contain both Place-\( ii \) and Time;

2. there is a set of such frames of category symbols as contain Place-\( ii \) but no Time;

3. there is a set of such frames of category symbols as contain Time but no Place-\( ii \);

4. there is a set of such frames of category symbols as contain neither Place-\( ii \) nor Time.

Examples: (1) *At five o'clock I drank milk at the coffee-house* (where *at five o'clock* is a Time, and *at the coffee-house* is a Place-\( ii \)); (2) *I drank milk at the coffee-house*; (3) *At five o'clock I drank milk*; (4) *I drank milk*.

In Chomsky's opinion the choice of the place-\( ii \) or the time adverbial is completely independent of the particular verb used in the sentence. Yet, to some degree, comparison between Manner, as a category that is dependent on the choice of the verb as far as its co-occurrence restrictions are concerned, and Place-\( ii \) or Time, is possible: the case of the non-occurring Place-\( ii \) and/or Time is more like the case of Manner with *read* than of Manner with *resemble*; just as we, in the case of manner adverbials, speak of verbs, like *read*, that can freely take Manner, and of verbs, like *resemble*, that do not, so we could, theoretically, speak of sentences in which Place-\( ii \) and/or Time can occur, and of sentences in which they cannot occur; the similarity between the Manner-and-*read* type and the case of Place-\( ii \)/Time lies in the circumstance that the statement that in some sentences of the deep structure Place-\( ii \) and/or Time cannot occur, finds only little empirical support (see § 9 below). Yet the grammar, in its present version, treats Place-\( ii \) and Time similarly as it treats Manner with *resemble*. We consequently miss a redundancy rule that would make the case of Place-\( ii \) and Time like a case of Manner with *read*, rather than of Manner with *resemble*. (The particular set
of redundancy rules that is to account for Place-ii and Time as regards their behaviour in respects that are under consideration here, will be referred to as the spatio-temporal redundancy rule below).

The greater similarity of the behaviour of Place-ii and Time on the one side and the Manner-and-read, rather than the Manner-and-resemble, type on the other side, was especially clear in the older version of transformational grammar as propounded by J. J. Katz and P. Postal in their book, *An integrated theory of linguistic descriptions* (Cambridge, Mass., 1964). According to Katz and Postal any sentence S that does not contain an instance of Place-ii and/or Time in its surface structure, is synonymous

(1) either with a sentence S' the surface structure of which is identical to that of S except for the fact that S' contains some place and/or time adverbial (cf., e.g., *In the restaurant* Paul ate, and Peter drank, where and Peter drank is synonymous with *and Peter drank in the restaurant*, where *restaurant* = *restaurant*),

(2) or with a sentence S" the surface structure of which is identical to that of S except for the fact that S" contains the place adverbial *at some place* and/or *at some time* (cf., e.g., *John first taught*, which is synonymous with *John first taught at some place*).

Cases of type (1) go under the heading of pronominalizations, and will be disregarded below. Cases of type (2) are accounted for in the following way by Katz and Postal. They introduce a dummy symbol Δ and a number of optional rewriting rules that rewrite any member of a definite subset of terminal symbols as Δ. These rules apply, if at all, before the introduction of the lexical items into the positions of the frame. There is a convention that permits the optional introduction of a very limited set of lexical items into the positions that are Δ. Some of the possibilities are as follows:

- *at some place*, for the place-Δ
- *at some time*, for the time-Δ
- *in some way*, for the manner-Δ
- etc.

If a member of this set of lexical items has not been introduced (the introduction being optional), the respective position remains empty (unactualized).

Thus a sentence such as *John taught at some place* has the same structural origin as *John taught*, provided that both come from *John taught Δ*, where Δ is a Place. This accounts for the structural similarity and the semantic affinity (synonymity) of the two sentences *John taught* and *John taught at some place*, on at least one semantic reading of each of them.

In this vein Katz and Postal would account for cases of Manner with read (they would derive all the sentences containing this verb, in this meaning, from a frame containing Manner as a constituent of the VP, and let the dummy-convention take care of the sentences in the superficial structure of which Manner is not represented), as well as for cases of Place-ii and Time (again letting the dummy-convention take care of the sentences in the superficial structure of which Place-ii and/or Time are not represented, and there
would consequently be no need for parentheses enclosing Place-ii and Time in Katz and Postal's version of Chomsky's rule (ii).

It is to be noted that in Aspects the device of the syntactic redundancy rules is made use of in order to account for some of the problems (viz., such as described above with regard to the category of Manner) raised by Katz and Postal in connection with the dummy-convention. Apart from failing to treat Place-ii and Time in a similar way as they treat Manner (in the sense that the spatio-temporal redundancy rule has not yet been formulated), the syntactic redundancy rules do not provide an explanation of the structural and semantic similarity of sentences such as *he read the book* and *he read the book in some way*, on one semantic reading of each sentence. Presumably, the semantic side of the problem is to be managed by the rules, not yet stated, of the semantic component of the grammar.

Chomsky gives no reasons, in Aspects, for abandoning the Katz-and-Postal dummy-convention in favour of his own syntactic redundancy rules. I venture to suggest that one of Chomsky's reasons for doing so is to be sought in the circumstance that under the Katz-and-Postal dummy-convention the strings of the form *in some way*, etc. were introduced into the grammar in at least two ways, viz., (1) as dummies, and (2) in the same way as any other lexical item would have been introduced. As there was very little difference, on at least one of their semantic readings, between these entities from either source, either as concerns their syntactic behaviour (including their feature specifications) or their semantic status, this treatment was a drawback under the school's own evaluation measure (cf. Aspects, pp. 42-4). Chomsky's syntactic redundancy rules remedy this state of affairs to some extent, but, I repeat, for the time being at the cost of not accounting for the semantic side of the problem, as well as failing to provide for an adequate treatment of the categories Place-ii and Time. In my opinion, this part of the theory is consequently in need of revision and development.

To summarize, we can say that the spatio-temporal redundancy rule is needed to supplement the parentheses in rule (ii). With this addition, however, another problem seems to arise: if all the cases of syntactic frames with no Place-ii and/or Time are due to the application of the supposed spatio-temporal redundancy rule, then three sets of frames, viz.,

1. the set that contains Place-ii but no Time,
2. the set that contains Time but no Place-ii, and
3. the set that contains neither Place-ii nor Time,

owe their existence exclusively to this redundancy rule. Thus we are confronted with the possibility of not less than three sets of frames of category symbols (in fact seventy-five percent of all the frames postulated by the grammar!) being necessary, so to say, only in virtue of this supposed spatio-temporal redundancy rule.

9. On the other hand, there seems to be some empirical evidence (of which only a fragment will be discussed below) to support the claim that some
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varieties of the sets of those frames of category symbols that contain no Place-ii and/or Time may be needed in the grammar quite independently of the supposed spatio-temporal redundancy rule. — We limit the following argument to instances of Place-ii, and will return to Time later on.

Consider the sentence *in the house, he dashed into the room*, where *into the room* is a Direction (which in turn is a Prep-Phrase dominated by VP), and *in the house* is a Place-ii. See Aspects, p. 102. Now let us, by way of experimentation, exchange the two nominal phrases in Place-ii and Direction for each other. The result is *in the room, he dashed into the house*. The new sentence makes sense if the house is in the room; similarly the original sentence implies that the room is in the house. We can state this implication in general terms by taking the nominal phrases of the two local adverbials to be geographical areas, and claiming that the nominal phrase of Direction is always geographically included in the nominal phrase of Place-ii, thus implying, first, that the nominal phrase of Place-ii is never geographically included in the nominal phrase of Direction, and, secondly, that the nominal phrases of Place-ii and of Direction are never geographically mutually exclusive. This claim will here be called the geographical claim. — Another example is the sentence *in England, he lived in Essex* (where *in England* is a Place-ii; and *in Essex* is a Place-v, see Aspects, p. 102), the implication of which is that Essex is in England; cf. *in Essex, he lived in England*, which makes sense only under the condition that England is in Essex.

The geographical claim is not vacuous in the sense that any prepositional phrase that is a verbal complement has the relation indicated by the claim, to Place-ii; cf. *John argued about the garden in the kitchen*, where *about the garden* is a Prep-Phrase, and *in the kitchen* is a Place-ii; the implication of the sentence is definitely not that the garden is in the kitchen.

Before we can continue some possible counter-examples to the geographical claim must be dealt with.

Consider Kuryłowicz's sentence *he went to New York on the »Carnatic«*.18 Kuryłowicz analyzes this sentence into the immediate constituents *he went to New York* and on the »Carnatic«, where the latter immediate constituent is an accompanying loc/ative/./ In *he went* to New York, to New York is called acc/usative/ of goals, and it is stated that its syntactical cohesion with the verb is closer than the bond between such a group and an accompanying loc./ Translated into the terminology of transformational grammar this goes to say that while to New York is a Direction, a part of the VP, and thus relevant to the strict subcategorization of the verb go, on the »Carnatic« is a Place-ii, not a part of the VP, and thus not relevant to the strict subcategorization of the verb. If this analysis is correct, the sentence is structurally identical to *in the house, he dashed into the room*, and should imply that New York is on the (ship called) »Carnatic« — which the sentence does not imply. In this sense, the sentence is a counter-example to our geographical claim. But only on the face of it; in my opinion, on the

»Carnatic« cannot be analyzed as a Place-ii in the underlying structure of the sentence; unless the expression by ship is also so analyzed, which is unlikely. By ship and on the »Carnatic« are instances of Instrument, or Means, or whatever we call it, in the underlying structure. The sentence need therefore not detain us.

Another possible counter-example could be they travelled to Chicago via New York, if to Chicago is analyzed as a Direction, and via New York as a Place-ii. Thus the sentence should imply that Chicago is in New York, which it does not. I think that in the underlying structure of this sentence via New York is represented approximately as by the/a way leading over/through New York, which is a Place-ii. Then the implication of the sentence is that Chicago lies (= is a point) on a way leading over/through New York; the implication, however clumsily expressed, is correct, and the sentence thus no counter-example to the geographical claim.

I believe, moreover, that the geographical claim has universal value in that it can be verified in other languages than English (e.g., in Slavic languages like Slovenian, Serbo-Croat, and Russian), and that the apparent counter-examples can be eliminated in various natural and for the most part systematic ways.

The version of English transformational grammar presented in Aspects does not contain the geographical claim and as far as I can see cannot express it in a formalized manner as long as the rules of the grammar preserve their present form.

A solution with which to incorporate the geographical claim into the grammar, could be this. In deriving the sentence in the house, he dashed into the room we postulate as its underlying structure a string of syntactic elements that is almost identical to the underlying structure of the synonymous sentence he dashed into the room, which was in the house. We assume that the common underlying structure of both sentences is more similar to the latter than to the former sentence, i.e., the underlying structure of the main sentence he dashed into the room has a structure attached to the nominal phrase of its Direction that is to result either in a relative clause which was in the house, or in being shortened to what looks like a Place in the house, or, maybe, in being shortened to an of-Phrase the antecedent of which remains the nominal phrase of the Direction of the house; there may be even further possibilities.

The deeper structure of he dashed into the room, which was in the house can then be schematically represented in the following way (the

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19 Needless to say, the claim must be formalized whether language-dependent or language-independent. As far as I can see the solutions sketched below can be either incorporated into the theory of language as a universal constraint on the form of grammars, or made part of English transformational grammar (though the latter possibility is less likely to be the right one).

20 In this way the sentence becomes just a special case of the kind represented in more explicit form by he dashed into the room, which was in the house, which was in the middle of the garden, which was...
below representations are just informal expository devices giving the bare essentials):

\[
\text{he dashed} \rightarrow \text{Direction}
\]

\[
\text{into the room} \rightarrow S'
\]

\[
\text{room}^a = \text{room}^b
\]

\[
\text{the room}^b \text{ is in the house}
\]

Alternatively, Place-ii is not relegated to a position in what is to become a relative sentence, but is made the main element of a sentence into which the rest of the example is embedded. This possibility may be schematically represented as follows:

\[
S
\]

\[
S' \rightarrow \text{was in the house}
\]

\[
\text{he dashed into the room}
\]

The essential difference between the two approaches lies in the circumstance that, while under the former alternative Place-ii (\textit{in the house}) is included in an embedded sentence, under the latter alternative it is a constituent of a matrix sentence. That this difference may play an important rôle in the grammar, has been pointed out by Lakoff (\textit{o.c., section F}), who finds that there is a correlation between the status of a sentence (embedded \textit{vs.} matrix) and the structure of questions that can have the complex sentence (i.e., one consisting of at least one matrix and one embedded sentence, on the level of deep structure) as the corresponding answer. — Some evidence to support the claim that the former alternative is to be preferred, will be found in point (2) of footnote 22 below.

Notice that the frame which contains Direction/Place-v \textit{contains no Place-ii} under these analyses. This seems to lead to the conclusion that Chomsky's parentheses enclosing Place-ii in rule (ii) are motivated quite
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independently of the postulated, spatio-temporal redundancy rule, in that they accommodate cases like *he dashed into the room (,) which was in the house*. On the other hand, it remains unclear how to express, in the grammar, the fact that Place-ii is to be omitted from the frame only when the frame contains Direction or Place-v (most of the remaining cases lacking Place-ii presumably being attributable, as already stated, to the spatio-temporal redundancy rule). Moreover, the presence of the latter two categories in the frames of category symbols and the choice of the appropriate verb (which must be specified as taking Direction or Place-v) being interdependent, I feel entitled to ask whether we here are not confronted with a case of Place-ii being relevant to the strict subcategorization of the verb. If the answer to this question is positive, the task that remains to be done is to revise the strict subcategorization of the verb in such a way that it can also cover the situation just outlined.

In the same sense as Direction/Place-v seems to alternate with Place-ii, Frequency and Duration seem to alternate with Time. Consider the two examples (cf. Aspects, p. 102) *yesterday the performance lasted three hours* (where *yesterday* is a Time, and *three hours* a Duration), and *last year John won three times a week* (where *last year* is a Time, and *three times a week* is a Frequency). These sentences make sense if the three hours mentioned elapsed within the time period called yesterday, and if the three times a week occurred within last year. In order to formalize this interdependence of Frequency/Duration and Time, presumably the three category symbols must somehow be united under one node, in which Time would have Frequency/Duration as its antecedent. The following sentences, synonymous with the two examples quoted, would then better reflect their underlying structure than our examples (which must have very much the same underlying structure): *the performance lasted three hours, which (hours) occurred yesterday* and *John won three times a week, which (times or weeks) occurred last year*. The transformational rules would then see to it that the two sentences are each optionally reduced to one, thus yielding our two examples.

Alternatively, Time is not relegated to a position in what is to become a relative clause, but is made the main constituent of a sentence into which the rest of the examples is embedded. This possibility may be represented in the following approximate way:

```
S
   /
  /
S' was yesterday
  /
the performance lasted three hours
```
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As to the difference between the two approaches, the pertinent remarks in the comment to the deep structure of *in the house, he dashed into the room* apply.

Notice that under both alternatives the frame of category symbols which contains Duration and/or Frequency *does not contain Time*. This, again, seems to support Chomsky's proposal that the Time of rule (ii) be enclosed in parentheses. It also goes to show that not all the cases of Time absent from the frames of category symbols are due to the application of the spatio-temporal redundancy rule.

On the other hand, the present version of the base in *Aspects* does not account for the consequences of these analyses, i.e., for the fact that Duration/Frequency and Time alternate in the same minimal sentence, so that underlying strings of the form \[s \ldots Frequency \text{and/or} Duration \ldots Time \ldots\] are not well formed.

10. Concluding remarks. I have had the opportunity to consult two of Chomsky's post-*Aspects* papers, viz., *Topics* (see the reference of footnote 5 above) and the uncorrected mimeographed manuscript of *Remarks on nominalization* (to appear in Jacobs and Rosenbaum, eds., *Readings in English transformational grammar*). As to *Topics*, Chomsky himself states on p. 2 of the paper that *in general, this article contains no new or original material* in comparison to *Aspects*. *Remarks on nominalization*, though epoch-making in another respect, is silent on the points discussed above, as far as I can see, apart from a remark, on p. 47 of the paper, that can be construed as meaning that Place-ii and Time, if they are to be introduced as complements of VP, are optional elements — a standpoint advocated in *Aspects* as well, and one of the starting points of our discussion above.

21 I have also read Chomsky's *Cartesian linguistics*, New York, 1966. As the subtitle of the book ("A chapter in the history of rationalist thought") indicates, *Cartesian linguistics* deals with problems quite different from those tackled in the present paper.

22 But see *Aspects*, p. 219, end of note 28: *Place Adverbials (at least those which are VP complements) must sometimes, or perhaps always, be regarded as Sentence transforms (so that, for example, "I read the book in England" derives from an underlying structure very much like the one that underlies "I read the book while (I was) in England"). Adverbials are a rich and as yet relatively unexplored
Povzetek

Pričujoči prispevek "O strogi subkategorizaciji glagolov v teoriji N. Chomskega" je prikaz in kritika tistega dela transformacijske slovnice, ki ga je — pod imenom "stroga subkategorizacija" — prvi obdelal N. Chomsky v knjigi *Vidiki sintaktične teorije* (bibliografski zapis tega dela je v op. 1). — Vse v prispevku navedene na- drobnosti zadevajo strogo subkategorizacijo glagolov.

§ 3 kratko pojasnjuje mesto stroge subkategorizacije med tistimi deli jezikovne teorije in slovnic, ki zadevajo zgradbo besednjaka (tu pojmovana kot sestavni del vsake popolne transformacijske slovnice) in vstavljanje slovarkih enot iz besednjak- kaj na mesta stavčnih vzorcev vgloboku strukturi. — Formalizacija pravil stroge subkategorizacije je kratko prikazana v§ 6.

V § 4 so navedena pravila transformacijske slovnice angleškega jezika, ki so odlučila pri strogi subkategorizaciji glagolov. V § 5 je podana delna kritika teh pravil. Večina točk zadeva pravilo (v), ki razvija nekatere predložne sintagme v prislovna določila na vprašanje *kje, kam, kako dolgo, kolikokrat* itd. Glavni očitki so naslednji: a) pravilo (v) še ni zapisano v dovolj natančni obliki; b) dopušča v vsakem minimalnem stavčnem vzorcu globoke strukture le največ dve prislovni določili omenjenih zvrst; c) dopušča v istem minimalnem stavčnem vzorcu globoke strukturo po eno prislovno določilo na vprašanje *kam* in po eno na vpra- šanje *kje* (pri čemer je zadnje tiste vrste, ki jo uvaža pravilo (v)); d) ne dopušča navzočnosti indirektnega objekta v minimalnih stavčnih vzorcih globoke strukture, ki vsebujejo več kot eno izmed opisanih prislovnih določil. Itd.

 §§ 8—9 zavedata prislovna določila na vprašanje *kje* (in sicer samo tista izmed teh določil, ki jih ne uvaža pravilo (v), temveč pravilo (iii)) in na vprašanje *kdo*. Za ti vrsti določili trdi Chomsky, da se lahko v istem minimalnem stavčnem vzorcu globoke strukture veže z vsakim glagolom in ju zato ni treba navajati med pogoji, ki jih morajo glagoli izpolnjevati, da bi bili vstavljeni na nekatera mesta v stavčnih

Sistem, and therefore anything we say about them must be regarded as quite tentative."

On the face of it, this quotation suggests a solution that makes the remarks offered in the present article unnecessary. Unfortunately, I cannot see that the proposal really solves the problem:

(1) It does not express the geographical claim (see § 9 above), although it obliterates it at the cost of making the model too rich.

(2) It makes it very difficult to formulate the spatio-temporal redundancy rule, in that this rule now has to range over two deep sentence structures in order to account for the affinity of the deep structure of *I read the book* and *I read the book at some place*, the latter of which can be graphically represented with the help of the following informal expository device (the representation is indirectly based upon the proposal quoted above; there is, of course, no knowing whether it is the one that Chomsky had in his mind when writing his terse note 28):

![Diagram](image)

It is to be hoped that the difficulties of (2) can be obliterated, for the affinity of *I read the book at some place*, *I read the book while (I was) at some place*, *I read the book and (simultaneously) I was at some place*, *I read the book has to be accounted for*. But the obliteration will undoubtedly lead to a drastic reformulation of the schema of the syntactic redundancy rules. Whether the problem of (1) will have been eliminated in the process, remains to be seen.
vzorcih globoke strukture. V prispevku so navedeni angleški primeri, ki zbujajo dvom v splošno veljavnost te trditve, in kažejo na to, da na primer glagoli, ki dopuščajo v 'svojih' stavčnih vzorcih globoke strukture navzočnost določila smeri, hkrati prepovedujejo navzočnost določil na vprašanje kje v teh vzorcih globoke strukture. V nasprotju z navedenim mnenjem Chomskega sledi, da je navzočnost tistih določil na vprašanje kje, ki jih uvaja pravilo (ii), vendarle v nekaterih primerih odvisna od vrste glagola v istem minimalnem stavčnem vzorcu globoke strukture. — Podobno velja za določila časa.

V op. 22 je navedeno nikalno stališče avtorja prispevka do možnosti, da bi npr. vsa tista določila na vprašanje kje, ki jih uvaja v sedanji različici transformacijske slovnice pravilo (ii), prenesli v drug, z danim povezan, minimalni stavčni vzorec globoke strukture, ne da bi pri tem sformaliziral tudi podatek, da je tak prenos njen samo v natanko določenih posebnih primerih (npr. kadar je v stavčnem vzorcu globoke strukture določilo smeri). Utemeljitev nikalnega stališča je v tem, da postane model jezika z uvedbo te možnosti prebogat (v kibernetičnem smislu besede 'prebogat').