EXOCENTRIC (BAHUVRĪHI) COMPOUNDS IN CLASSICAL
SANSKRIT

Brendan S. Gillon
McGill University

1 Introduction

Constituency grammars originated with Leonard Bloomfield (1933) and were
developed during the nineteen forties and nineteen fifties by a number of
American structuralist linguists, including Harris (1946) and Wells (1947) —
to mention just two. In the late nineteen fifties, Chomsky (1957) suggested
that constituency grammars could be formalized as context free grammars.
It is now clear that context free grammars fall short of properly formalizing
the constituency grammars of the American Structuralists (Manaster-Ramer
and Kac 1990). Indeed, in the nineteen sixties, Chomsky himself formalized
a number of other important aspects of constituency grammars, introducing
more complexity to the labels, both terminal and non-terminal, and permit-
ting the use of null elements.

Though constituency grammars were initially conceived of as applying
to phrases, work in the nineteen eighties (Di Sciullo and Williams 1987;
Selkirk 1982; Williams 1981) showed that such rules could be used to analyze
showed that the same analysis extended to the analysis of compounds and
derivational morphology in Classical Sanskrit.

The aim of this paper is to look more carefully at the application of
constituency rules to the analysis of exocentric (bahuvrīhi) compounds. In
particular, using a conjecture by Bhartrhari pertaining to non-constituent (a-
samārtha) compounds, I wish to show that both Sanskrit non-constituent (a-
samārtha) compounds and Sanskrit exocentric (bahuvrīhi) compounds can
be analyzed in terms of constituency grammar, suitably augmented with
argument frames, a generalization of subcategorization frames. Argument
frames, as I shall show, play a key role in providing a satisfactory analysis of
both kinds of compounds.
2 Exocentric (Bahuvrīhi) Compounds

The classical Indian grammatical tradition identifies a number of different kinds of exocentric (bahuvrīhi) compounds. They include: privative exocentric (naĩ-bahuvrīhi) compounds, comitative exocentric (saha-bahuvrīhi) compounds, prepositional exocentric (prādi-bahuvrīhi) compounds, homodenotative exocentric (samānādhikaraṇa-bahuvrīhi) compounds, and heterodenotative exocentric (vyadhikaraṇa-bahuvrīhi) compounds. Our attention will be confined to homo-denotative ones (samānādhikaraṇa-bahuvrīhi).

Homo-denotative exocentric (samānādhikaraṇa-bahuvrīhi) compounds are compounds whose canonical phrasal paraphrase is a relative clause in which the first constituent of the compound is predicated of the second, and they thereby share the first, or nominative, case – and if the first constituent is an adjective, they agree in number and gender as well. Putting these observations together, one arrives at the natural hypothesis that an exocentric compound is a descriptive compound suffixed with a phonetically null suffix which converts the descriptive compound into an adjective.

\[(1) \text{Exocentric (bahuvrīhi) Compound:} \]
\[
\begin{align*}
\text{Compound:} & \quad \text{samacittah (even-minded)} \\
\text{Analysis:} & \quad ((A \text{ sama}) \prec (N \text{ cittaḥ})) \\
& \quad ((A \text{ even}) \prec (N \text{ mind })) \\
\text{Paraphrase:} & \quad [RC [VP (asti)] [AP \text{ samam }] [NP \text{ cittam }] \text{ yasya }] \\
& \quad \text{whose mind is even}
\end{align*}
\]

The evidence that homo-denotative exocentric (samānādhikaraṇa-bahuvrīhi) compounds are adjectives is that they have all the properties adjectives in Sanskrit have. First, adjectives in Sanskrit, like those in Latin, agree with the nouns they modify in case, number and gender. Consider the adjective tīkṣṇa (sharp). If it modifies a noun in the nominative, singular, masculine, say asih (sword), then it has the form tīkṣṇah; and if it modifies a noun in the nominative, singular, feminine, say churī (knife), then it has the form tīkṣṇā; and

\[1\text{Homo-denotation (sāmānādhikaraṇa) is the counterpart in the Indian grammatical tradition of the Western technical notion of concord or agreement. As will be elaborated below, adjectives which modify nouns in Sanskrit agree with the nouns in case, number and gender. The concord is seen by the traditional Indian grammarian as accruing to the fact that a noun and an adjective modifying it have the same denotation (sāmānādhikaraṇa).} \]
if it modifies a noun in the nominative, singular, neuter, say \textit{patram} (blade), then it has the form \textit{tikṣṇam}. Now consider the compound \textit{dīrgha-kāṭha}. If it is to be construed with a masculine, singular noun in the nominative case, say \textit{puruṣaḥ} (man), to yield the sense \textit{long-necked man}, then the compound must have the nominative, masculine, singular form, namely, \textit{dīrgha-kāṭhaḥ}. If it is to be construed with a feminine, nominative, singular noun, say \textit{strī} (woman), to yield the sense \textit{long-necked woman}, then the compound must have the feminine, nominative, singular form, \textit{dīrgha-kāṭhā}. And finally, if it is to be construed with a neuter, nominative, singular noun, say \textit{mitraṁ} (friend), to yield the sense \textit{long-necked friend}, then the compound must have the neuter, nominative, singular form, \textit{dīrgha-kāṭham}.

Next, adjectives in Sanskrit can be turned into abstract nouns by the affixation of the suffix \textit{-tva} (-\textit{ness}): for example, the adjective \textit{kṛśa} (thin) may be converted into the abstract noun, \textit{kṛśa-tva} (thin-\textit{ness}). Exocentric \textit{bahuṃri}hi compounds are susceptible of the same conversion: for example, \textit{dīrgha-kāṭha} (long-neck\textit{ed}; cf., level-head\textit{ed}) be turned into \textit{dīrgha-kāṭha-tva} (long-neck\textit{ed-ness}; cf., level-head\textit{ed-ness}).

Moreover, just as an adjective such as \textit{kṛśaḥ} (thin) can function, as its English translation can, as a common noun, meaning the same thing as its English nominal counterpart, \textit{the thin}, so too should an exocentric (\textit{bahuṃri}hi) compound be liable to function as a common noun. And this too is true, as observed by Speijer (1886, §222, fn. 1) and as exemplified by following compound and its commentarial gloss.

\begin{enumerate}
\item \textit{(2.1) NBT 48.4}
\textit{(vyutpanna} ≺ \textit{saṃketaḥyā)}
\item \textit{(2.2) NBTP 49.1-2}
\textit{vyutpannah. jñātaḥ saṃketaḥ yena saḥ}
\textit{arisen known convention by whom he}
\textit{One by whom the conventions of language are known}
\textit{(jñāta (known) glosses \textit{vyutpanna (arisen)})}
\end{enumerate}

There is independent confirmation that homo-denotative exocentric (\textit{saṃmāna-\textit{ad}hikaraṇa-bahuṃri}hi) compounds are best treated as descriptive (\textit{kar-madhāra}ya) compounds to which a phonetically null, possessive, adjectival suffix (symbolized hence forth with ‘B’) is affixed. Sanskrit has a phonet-
ically overt, possessive, adjectival suffix -ka which is virtually synonymous with the phonetically null one just hypothesized. Though their distributions are somewhat different (A 5.4.151 ff.), nonetheless, they overlap to such an extent that commentators to a text in which an exocentric (bahuvr̥ihi) compound occurs frequently repeat the compound, adding the -ka suffix to signal the fact that the compound in question is to be construed, not as a descriptive (karmadhārāya) compound, but as an exocentric (bahuvr̥ihi) compound (Boose and Tubb 1981, ch. 5, sec. 15).

English too has homo-denotative exocentric compounds. By and large, they are marked by the adjectival, possessive suffix, -ed. These English compounds, exemplified by such compounds as longlegged, literal-minded, and two-footed, have a distribution narrower than that of its counterpart in Sanskrit — a fact which will be dilated on below.

Not every English homo-denotative exocentric compound has the -ed suffix. In particular, English homo-denotative exocentric compounds which serve as proper names or epithets seem to require a phonetically null counterpart to the -ed suffix. Examples of proper names are particularly common in children’s stories. For example, in the children’s movie, Land Before Time, the two dinosaurs which are the main characters are named, big foot and long neck, instead of big-footed and long-necked. Examples of epithets are such compounds as red-head, dim-wit, hard-back, etc., to which there correspond red-headed, dim-witted, hard-backed, and so forth. (See Marchand 1969, ch. 2, sec. 18 for other examples.) Moreover, it seems that the -ed suffix and its phonetically null counterpart are in free variation in exocentric compounds which are initial constituents in larger compounds: long-necked bottle plant and long neck bottle plant both denote plants for bottles whose necks are long.

Another parallel between English and Sanskrit homo-denotative exocentric (samāña-adhikaraṇa-bahuvr̥ihi) compounds is the predication relation in the canonical paraphrase may be metaphorical, instead of literal. Thus, in the compounds candra-mukha (moon-faced), sthūla-caraṇa (club-footed), and ayo-muṣṭi iron-fisted, a face (mukha) is likened unto a moon (candra), a foot (caraṇa) unto a club (sthūla), and a fist (muṣṭi) unto iron (ayas).

It is interesting to note in this connection that the Sanskrit suffix -ka, used to mark phonetically a bahuvr̥ihi compound, is said by Pāṇini (A 5.4.155) to be prohibited from affixation to bahuvr̥ihi compounds which serve as names.
As noted by Di Sciullo and Williams (1987, p. 30), in English, constituents outside of a compound cannot be construed with constituents subordinate within a compound. This generalization is undoubtedly true of English compound formation, as illustrated by the contrast in the interpretability of the expressions in (3).

(3.1) ((man ≺ eating) ≺ shark)
(3.2) *(eating ≺ shark) of men

Interestingly, this generalization was presupposed as true of Sanskrit by Pāṇini. His treatment of compounds is to pair them with canonical phrasal paraphrases with which they share a common derivational ancestor; in addition to their semantic relation, they bear the syntactic relations of having the same heads and of having the same constituency. Hence, the constituency of compounds mirrors that of their canonical phrasal paraphrases. A condition on compound formation is that two elements cannot undergo compounding, the deletion of morphology from the subordinate element, unless the two elements form a constituent (A 2.1.4). A consequence of this is that inflected lexical items exterior to a compound are not construable with subordinate constituents within it. The applicability of this rule is illustrated both by Patañjali, in his Mahābhāṣya, or Great Commentary, on Pāṇini’s Aṣṭādhyāyī (at A 2.1.1), and by Bhartṛhari, in his work on the semantics of Sanskrit (VP 3.14.46), with the following example:

(4.1) \[ NP (rddha ≺ rāja ) ≺ puruṣaḥ ) ]
rich king man
servant of a rich king

(4.2) *[ NP (rddhasya ] (rāja−puruṣaḥ) ]
of rich king-man
servant of a rich king

Thus, the expression in (4.1) is acceptable, whereas the one in (4.2) is not, as signalled by the asterisk.

Though the generalization holds of English compounds, it does not of Sanskrit compounds. Counter-examples are furnished both by Patañjali (MBh on A 2.1.1) and by Bhartṛhari (VP 3.14.47):
Indeed, compounds appearing in configurations such as that in (5.3) are given a special name by Sanskrit grammarians: they call them *a-samartha* compounds (i.e., non-constituent compounds). Moreover, these compounds are well attested in the classical literature. A study of over three-hundred sentences, chosen essentially at random from the Sanskrit corpus, reveals thirteen clear cases of non-constituent (*a-samartha*) compounds. (See Appendix I in Gillon 1993.) And a study of the first approximately five-hundred sentences of a single text reveals forty-three clear cases. (See Appendix II in Gillon 1993.)³

Thus, for example, in the best known play by the finest dramatist of Sanskrit literature, Kalidāsa’s *Śakuntalā*, one finds precisely these configurations.

(6)  Ś 3.9.16 (= SG 3.1.6)
\[
[NP\_1 [NP\_3 tasyām ] (snigdha-<drṣṭyā) ]
\]
on her fixed-gaze
\[
(sūcita-<abhiliśaḥ)-B ]
indicated-affection-ed
.. whose affection was indicated by his gaze being fixed on her

Here, the past passive participle, *sūcita* (*indicated*), which is a subordinate constituent within the exocentric (*bahuvihi*) compound *sūcita-<abhiliśaḥ* (*indicated-affectioned: whose affection was indicated*), is construed with the third, or instrumental, case noun phrase *tasyam snigdha-<drṣṭyā* (*by his gaze being fixed on her*). Moreover, this noun phrase itself exhibits a non-constituent (*a-samartha*) compound, for the past passive participle, *snigdha*

³To put these frequencies in perspective, I should point out that non-constituent (*a-samartha*) compounds occurred more frequently in each corpus taken separately or jointly than either indirect questions or relative clauses.
(fixed) is found as a subordinate constituent in the compound snigdha-dṛṣṭyā (by fixed-gaze: by his gaze being fixed), yet it is construed with tasyām (on her), a seventh, or locative, case noun phrase, for which the verb snih (to fix) subcategorizes.

One person to attempt to meet the challenge presented by these compounds to Pāṇini’s grammar of Sanskrit was Bhartṛhari, who suggested that non-constituent (a-samartha) compounds are limited to cases where the subordinate constituent in the compound expresses a relation. Bhartṛhari’s insight is a deep one. The remainder of this paper is devoted to showing how this insight might be captured within constituency grammars and then applied to not only non-constituent compounds but also to exocentric ones. The main concept is that of an argument frame, or an enriched subcategorization frame.

An argument frame has its classical quantificational logic. In elementary model theory, the set of predicates is partitioned into cells of the same degree, or adicity. The set of predicates are partitioned into the family of sets, one of which comprises all the one-place predicates, another all the two-place predicates, etc. This partitioning of the predicates has two effects. On the one hand, it helps to determine which string of symbols is a well-formed formula and which is not; on the other hand, it determines what kinds of values can be assigned to it. Thus, if one is told that $P$ is a two-place predicate and that $a$, $b$ and $c$ are terms, then one knows that $Pab$ is a formula and that neither $Pa$ nor $Pcba$ is. At the same time, one knows that $P$ is to be assigned a set of ordered pairs in the model.

A similar effect can be achieved with a slight enrichment of subcategorization frames. Subcategorization frames were introduced into constituency grammar by Chomsky (1965 ch. 2.3.4; 2.4). They greatly simplified the constituency rules by having individual lexical items specify their complements. Subcategorization frames effectively formalized and generalized the lexicographical practice of distinguishing between transitive and intransitive verbs. Because the subcategorization frame of a word is silent about those constituents which are not its complements, the subcategorization frame of a verb does not specify that it has an argument corresponding to the subject of the clause in which it might occur. Argument frames will have this specification. As a result, argument frames will fulfill the same functions in constituency grammar which predicate adicity fulfills in classical quan-
tificational logic. It specifies the arguments associated with the word and it constrains the value assigned to it in a model to those relations with a corresponding arity, or degree of the relation. For example, a verb such as to die, which is intransitive, and thereby corresponding to a monadic predicate of classical quantification logic, takes only one argument and is assigned a unary relation (a subset of the model’s domain), while a verb such as to admire, which is transitive, and thereby corresponding to a dyadic predicate, takes two arguments and is assigned a binary relation (a set of ordered pairs of members of the model’s domain). Such a specification accounts for the contrasts in acceptability of the sentences given below.

(7.1) Bill died.
(7.2) *Bill died Fred.
(8.1) *Mary admires.
(8.2) Mary admires Bill.

Moreover, just as each predicate of a given adicity is interpreted by a relation of a corresponding arity, so each relational word is interpreted by a relation of a corresponding arity. It is crucial that this correspondence be properly established. To see why, consider this example from model theory. Let \( R \) be a binary predicate and let \( a \) and \( b \) be individual constants. Let \( M \) be a model whose domain is \( \{1, 2, 3\} \) and whose interpretation function \( i \) assigns 1 to \( a \), 2 to \( b \) and the set of ordered pairs \( \{\langle 1, 2 \rangle, \langle 2, 3 \rangle, \langle 3, 1 \rangle\} \) to \( R \). The clause of the truth definition of an atomic formula guarantees the following: \( Rab \) is true if and only if \( \langle i(a), i(b) \rangle \in i(R) \). It is crucial that the order of appearance of the individual constants \( a \) and \( b \) in the formula \( Rab \) be correlated with the ordered pair \( \langle i(a), i(b) \rangle \), not with the ordered pair \( \langle i(b), i(a) \rangle \). As the reader can easily verify, the ordered pair \( \langle i(a), i(b) \rangle \) is a member of \( i(R) \), but not the ordered pair \( \langle i(b), i(a) \rangle \).

The situation in natural language is, of course, much more complex than the situation in logical notation. To begin with, a syntactic structure of even a simple clause is much more complex than that of an atomic formula, the formation of the latter being simply a matter of concatenation. In addition, many argument positions have associated with them values, called valences or thematic roles. Indeed, these valences are at the heart of Pāṇini’s grammar, the Astādhyāyī, where they are known as kāraka, or factors. Typical valences include those recognized by Pāṇini: agent, patient, beneficiary, source and
Valences are confined to verbs and to nouns and adjectives derived from verbs. They are not associated with the arguments of underived relational nouns (for example, friend, cousin, neighbor, colleague) or with underived relational adjectives (for example, equivalent, opposite, proud, domestic and local). For the sake of simplifying the discussion, I shall avail myself of the terminology of valences to index the argument positions relevant to the exposition of the examples in the treatment below.

Following Bhartrhari's conjecture, I shall assume that non-constituent (a-samartha) compounds appear when the subordinate constituent in the compound has an argument which is construed with an inflected lexical item external to the compound. A survey of the cases mentioned above, as culled from the classical literature, shows that such is the case. Indeed, for the most part, the subordinate constituent is a deverbal noun or adjective, requiring an NP complement and often associating with it a particular valence.

Let us consider the case of a non-constituent compound snigdha-drṣṭyā, cited above. Recall that it is preceded by the pronoun tasyāṁ, which is construed with the word snigdha, itself subordinate to drṣṭyā. The past passive participle snigdha has two arguments, one of which must appear in the seventh case.

![Diagram of the tree structure of the compound snigdha-drṣṭyā](image)

(where PT denotes patient and LC denotes location). The idea is that the argument frames are passed, as it were, up the tree. It is the location argument which is passed up to the top node of the tree for the compound.\(^4\)

\(^4\)This compound is also an exocentric compound. This aspect of the compound is not being addressed here.
This contrasts with the situation in English. Sanskrit, as we just saw, permits unsaturated arguments associated with a non-head to be transmitted to the mother node, while English prohibits non-heads from having unsaturated arguments. Thus, for example, an expression such as (3.2) is prohibited in English. The reason is that, although one of the arguments associated with eating, namely the one whose valence is agent is saturated by the noun shark, the other argument associated with eating, namely the one whose valence is patient is not.\footnote{Evidence that the argument with the valence of patient is relevant comes from the acceptability of (3.1), namely man-eating shark.}

![Diagram](image)

This treatment of non-constituent (a-samartha) compounds extends to exocentric (bahuvrīḥi) compounds. Let us consider the following exocentric (bahuvrīḥi) compounds in Sanskrit:

(11.1) SK 830
Compound: praṃtāṭithiḥ grāmaḥ
Analysis: (praṃta-<atithiḥ)-B grāmaḥ reached-guest-ed village
Paraphrase \[RC atithayah praṃtāḥ yam \]
 guest reached which
 saḥ prāptāṭithiḥ grāmaḥ that
 the village which guests have reached

\[\text{man-eating shark}\]
(11.2) SK 830
Compound: ṛḍharathah ṛṇadvān
Analysis: (ṛḍha-ṛthaḥ)-B ṛṇadvān
drawn-cart-ed bull
Paraphrase: [RC ṛthaḥ ṛḍhaḥ yena]
cart drawn by which
sah ṛḍharathah ṛṇadvān
the bull by which a cart is drawn

(11.3) SK 830
Compound: upahṛtapāṣuḥ puruṣaḥ
Analysis: (upahṛta-ṣuḥ)-B puruṣaḥ
offered-cattle-ed man
Paraphrase: [RC paṣuḥ upahṛtaḥ yasmai]
cattle offered to whom
sah upahṛta-paṣuḥ puruṣaḥ
the man to whom cattle is offered

(11.4) SK 830
Compound: uddhṛtaudanā sthali
Analysis: (uddhṛta-odanā)-B sthali
removed-rice vessel
Paraphrase: [RC odanā uddhṛtaḥ yasyaḥ]
rice removed from which
sā uddhṛtaudanā sthali
the vessel from which rice has been removed
In the paraphrase and translation of Sanskrit exocentric (bahuvrīhi) compounds, the relative pronoun of the paraphrasing relative clause may be construed with either the second constituent (11.5) or the first constituent (all other examples). Both of these constituents are subordinate within the structure of the exocentric bahuvrīhi compound. This is reflected in the canonical paraphrase, where the relative pronoun is construed with the subject of the relative clause (11.5) or with its predicate (all other examples). Indeed, as noted by Coulson (1976, p. 121), Sanskrit exocentric (bahuvrīhi) compounds are ambiguous between two readings: on one, the denotation of the lexical item modified by the exocentric compound is interpreted as the possessor of what is denoted by the final constituent of the compound; and on the other, it is interpreted as bearing a valence of any unsaturated argument associated with the initial constituent of the compound.

Moreover, an exocentric compound has available a reading corresponding to each of the unsaturated arguments associated with its initial constituent.
Here emerges the difference between English and Sanskrit exocentric compounds alluded to above. Notice that, of the six examples, only the fifth allows an acceptable English calque: *reached-guested, *drawn-carted, *offered-cattled and *removed-vesseled but yellow-garmented. At the same time, while an English exocentric compound is paraphrasable with a relative clause, yet the relative pronoun of the paraphrase, “whose”, is construed only with the subject of the relative clause, which corresponds to the final constituent of the compound paraphrased. Thus, mean-spirited is paraphrasable as one whose spirit is mean, level-headed as one whose head is level, and long-legged as one whose legs are long.

English and Sanskrit exocentric (bahuvrīhi) compounds differ as follows: the English adjectival suffix -ed does not permit the transmission of unsaturated arguments of an exocentric compound’s initial constituent; whereas the Sanskrit adjectival suffix B does permit the transmission of such arguments.

The foregoing differences between compounds in English and Sanskrit suggests the following hypothesis: the argument frame of initial constituents in lexical structure, in particular, in compound, percolate in Sanskrit but does not in English. This hypothesis accounts for two facts: first, that, in Sanskrit, unsaturated arguments associated with the initial constituent of an exocentric compound can be assigned to the lexical item the compound modifies, whereas in English they cannot be; second, that Sanskrit productively forms non-constituent (a-samartha) compounds whereas English does not. Let us see how this account works.

Each adjective has at least one argument which is saturated either by the noun it modifies or by the subject noun phrase of which it is predicated. This is illustrated below, for modification both within phrasal structure and within compound structure.
Now, both the -ed suffix in English and the -B suffix in Sanskrit create adjectives from nouns. This means that they create an argument. Associated with the resulting argument is the valence *possessor* (annotated ps). When the English suffix is applied to a simple noun like *beard*, one obtains the following:

\[
\begin{array}{c}
(15) \quad \text{A (PS)} \\
\quad \text{N} \\
\quad \text{beard} \\
\quad \text{A (PS)} \\
\quad \text{-ed (PS)}
\end{array}
\]

And when the resulting form modifies a word such as *man*, the resulting interpretation is *man who possesses a beard*. Combining what has been said so far, one obtains an analysis for both the Sanskrit compound in (11.5) and its English claque translation.

Moreover, the foregoing analysis shows precisely where Sanskrit and English differ. A morphologically complex English word accepts unsaturated arguments associated only with its head. Whereas, a morphologically complex Sanskrit word accepts the unsaturated arguments either of its head or of its head’s sister. When an exocentric compound has no unsaturated argument other than the one associated with its possessive suffix, then its English and Sanskrit versions are equally acceptable.
In this example, the argument associated with *yellow* (*pīṭa*) is saturated by *garment* (*ambara*), and so the complex word *yellow garment* (*pīṭāmbara*) has no unsaturated argument. The suffixation of *-ed* (-B) to *yellow garment* (*pīṭāmbara*) creates an unsaturated argument with an associated valence, namely that of possessor (PS).

The situation is otherwise when the left-hand constituent of an exocentric compound has an unsaturated argument. Sanskrit permits unsaturated arguments associated with either a head and a non-head to be transmitted to the mother node; and, depending on which unsaturated argument is transmitted, the compound receives one or another interpretation. Thus, in the compound in (12) the unsaturated argument associated with the entire compound may have associated with it either the value AG or the value PS (annotated below as ⟨AG\PS⟩).

In contrast, English prohibits any unsaturated arguments from being associated with a non-head, with the consequence that the English counterparts to (9) are ungrammatical (annotated below as ⟨*⟩).
3 Conclusion

Above, we examined two kinds of compounds in Classical Sanskrit, non-constituent (*a-samartha*) compounds and exocentric (*bahuvrīhi*) compounds. The former compounds were considered problematic by the Indian grammatical tradition for Pāṇini’s grammar, the *Aṣṭādhyāyī*. An insight due to Bhartṛhari shows how they can be satisfactorily analyzed. This insight was recast using the notion of an argument frame, a generalization of subcategorization frame. A bonus of this solution is that it provides insight into well-know properties of the exocentric compounds of Classical Sanskrit, properties which exocentric compounds in English do not have.

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WORKS CITED OR CONSULTED


(1967).