Simple nouns are not that simple:
a survey of event nominals with no verbal counterpart

Nomes simples não são simples assim:
uma análise de nomes eventivos sem contraparte verbal

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RESUMO

Este artigo apresenta e discute o comportamento de nomes simples que denotam eventos (NSDEs) sem contraparte verbal, tais como *tempestade* e *show*. Esses nomes levantam questões interessantes tanto para a Semântica de Eventos quanto para teorias morfológicas em suas interfaces com sintaxe e semântica, já que canonicamente se associa a denotação de eventos a estruturas verbais. Para tanto, ancorados no Modelo da Morfologia Distribuída (MD) (Halle & Marantz, 1993, 1994), nós abordamos as principais propriedades sintáticas e semânticas dos NSDEs e mostramos que tipo de ferramentas da MD podem ser usadas para acomodar esses casos. Na sequência, nós discutimos alguns casos de nominalizações de participantes de eventos; em particular, aquelas que indicam aspecto gramatical, como *vestibulando* e *cliente*. Finalmente, nós apresentamos uma análise preliminar para nomes simples que denotam estados e mostramos em que medida elas se aproximam ou se afastam dos NSDEs.

PALAVRAS-CHAVE:

Nominalizações. Semântica de Eventos. Aspecto Gramatical. Morfologia Distribuída.

ABSTRACT

This paper presents and discusses the behavior of simple nouns denoting events (SNDEs) with no verbal counterpart, such as *tempestade* ('storm') and *show* ('concert'). These nominals give raise to interesting questions for both Event Semantics and morphological theories and their interfaces with Syntax and Semantics, since event denotation is traditionally associated to verbal structures. Thus, relying on Distributed Morphology (DM) (Halle & Marantz, 1993, 1994) framework, we approach the main properties of SNDEs' syntax and semantics and show what DM device can be used to handle such cases. Later, we discuss some instances of event participant nominals; particularly those indicating grammatical aspect, such as *vestibulando* ('') and *cliente* ('customer'). Finally, we present a preliminary analysis of simple nouns denoting states and show to the extent they differ from and are similar to SNDEs.

KEYWORDS:

Nominalization. Event Semantics. Grammatical Aspect. Distributed Morphology.

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1. Introduction

Since Davidson (1967), events have been argued to be linguistic objects. Thus, by taking them to pertain to the ontology of linguistics primes, one of the main questions was then what kind of linguistic expression could refer to them. The first and obvious answer to such question, particularly advanced in Parsons (1990), was that events were expressed by verbs. However, within the Generative tradition, mostly from the 1990s onwards, what was conceived as a "verb" came to be structurally expressed by different functional projections, such as vP, VoiceP, AplP, and the root itself. Furthermore, apart from verbs, other linguistic expressions were shown to denote events, arguably, the deverbal expressions in general, such as nominalizations, participles, etc.

In this scenario, this paper discusses some properties of events and how grammar can encode them where there seems to be no verbal structure. Specially, we approach two grammatical categories, namely, events and grammatical aspect[3] (henceforth, just "aspect"), in order to discuss them not only in the light of some "underinvestigated" empirical phenomena, that is, *simple nouns denoting events* (henceforth, SNDEs), but also under a strictly theoretical view, in that these nominals can shed some light on how to properly implement a formal description of these categories – a matter we advance within Distributed Morphology framework (Halle & Marantz, 1993, 1994) (henceforth, DM). Thereby, both description and analysis of the data rely on a full decomposition of words and do not take into account the etymology of words.

Empirically, we discuss SNDEs, such as *tempestade* ('storm'), *milagre* ('miracle'), *cirurgia* ('surgery'), *catástrofe* ('disaster') in Brazilian Portuguese (henceforth, BP), a type of nominal which are also found in other languages, such as English (*event*, *mischief*, *impulse*, *storm*, etc.); Spanish (*fiesta* ('party'), *accidente* ('accident'), *crisis* ('crisis')); French (*sac* ('sack'), *rapt* ('abduction'), *siège* ('siege')), etc., and discuss their semantics regarding events and their participants. That is, our analysis targets nominals where there is no apparent verbal category involved, even though there is reference to events.[4]

We also provide a theoretical discussion on how a formal theory such as DM can handle "verbal" information within linguistic expressions where one cannot presumably find a verbal structure, and thereby we mean that the syntactic properties traditionally or canonically associated to vP (responsible for both verbalization of the root/structure and event reading) and to

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[3] Also called "verbal aspect", "viewpoint aspect", and "outer aspect", among other names.

[4] Previous mention to this kind of data appears in Newmeyer (2008) and Alexiadou & Grimshaw (2008) for English, Resnik (2010) for Spanish, Roy & Soare (2011) for Romanian, and Krebs (2019) for French. For a preliminary analysis and typology for SNDEs in Portuguese, see Resende & Basso (2022).

VoiceP (responsible for external argument properties) do not hold for SNDEs.

In what events are concerned, following Davidson's (1967) influential paper, the literature agrees that there are important arguments for an *ontology of events*. Events are taken to be particulars, which take place in space (1a-b) and time (1b); they can be counted (1c); one can ascribe properties to them (1d), compare them (1e), etc.

(1) (a) Julius Cesar crossed the Rubicon with his army.

    (b) The last time Vesuvius erupted was in Italy, in 1944.

    (c) John was fired at least three times last year.

    (d) The invaders violently and slowly killed the villagers.

    (e) John writes slower than Mary.

As regards aspect, built in Smith (1997), Filip (1999), Bertinetto & Delfitto (2000), Bertinetto (2001), and based on Portuguese, Schmitt (2001), Wachowicz & Foltran (2006), and others, we assume a relational view of aspect and follow Klein's (1994) classical work in that *perfective aspect* involves the time of the event being included in the topic time, and *imperfective aspect* involves the topic time being included in – or equal to – the event time.[5]

Accordingly, a perfective event is an event which does not evolve beyond a certain topic time, whereas an imperfective event does the opposite: it ideally evolves beyond a certain topic time. However, imperfectivity can be conceived in two different "flavors", namely, *progressiveness*, where the event time is equals to the topic time, and *habitualness*, where the event time is included in a series of topic times. Following Müller (2020), we assume that habitual aspect describes (potential or actual) regularities occurring in a given series of topic times and can be said to present generalizations about events occurring at topic times.

The examples in (2) illustrate this difference: in (2a), the event of John smoking is included in the topic time (it is presented as closed at a certain topic time); in (2b), the event time includes the topic time (it is presented as an ongoing event at a certain topic time); and in (2c), the event time occurs in a series of topic times (in this case, in the past).

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[5] Formally, based on Bohnemeyer (2014), $[[\text{perfective}]]^{M,g} = \lambda P \exists e[\tau(e) \subseteq t_T \wedge P(e)]$, and $[[\text{imperfective}]]^{M,g} = \lambda P \exists e [t_T \subseteq \tau(e) \wedge P(e)]$, where "$\tau(e)$" represents event time and t_T represents the topic time.

(2) (a) John smoked this morning.

(b) John is smoking as we speak.

(c) John used to smoke before he got married.

The long and well-known discussion on events, aspect and the interplay between them has mostly revolved around verbs, participles, and nominalizations, due to the observation that events are usually expressed by (de)verbal elements, as well as resultatives and Slavic prefixes. As mentioned earlier, events in the nominal domain, except for nominalizations, have received less attention, and this paper aims to shed light on some empirical and theoretical issues regarding the relation between events and their participants by adding a new piece to the puzzle, namely, SNDEs, along the lines of Resende & Basso's (2022) recent proposal.

Specifically, we show that despite the same semantic (i.e., event) reading, there is a structural asymmetry between SNDEs and (de)verbal elements, and then we address the issue of how to formally implement these properties within DM's framework. Moreover, we discuss cases where there is aspectual morphology in nominals which are not deverbal and, finally, we make some comments on nominals that are not morphologically related to verbs but could be seen as (static) state nominals, which we will call "*simples nouns denoting states*" (henceforth, SNDSs).

Specifically, this paper is divided as follows: in § 2, we discuss the morphological and semantic properties of SNDEs and show what kind of empirical and theoretical issues they raise. In § 3, we discuss nouns denoting event participants and draw special attention to event participants with overt aspectual markings. In § 4, we offer a preliminary approach to nominals denoting states and show how that can be morphologically and semantically related to SNDEs.

2. Simple nouns denoting events

By definition, SNDEs belong to the nominal category – what one could call, in DM spirit, "root-nominalizations" – with no morphologically verbal counterpart. In Portuguese, these nouns surface just as a root followed by the nominal theme vowel (TH), such as in *evento* ('event') or *cirurgia* ('surgery'), glossed as √EVENT-o$_{TH}$ and √CIRURGI-a$_{TH}$ respectively. This is why they are called "simple": their structure is as simple as it can be; however, since we are assuming a full decomposition of words, not even these cases can be seen as simple in an important sense. In any case, Portuguese has another type of nominals denoting events, which also surface just as the root followed by the theme vowel; this is the case of "zero-nominalizations" (Resende, 2018) – see also

Don (2005), Harley (2009), and Iordăchioaia (2021) for English. Examples are given in (3): (3a) with SNDEs, and (3b) with zero nominalizations.

(3) (a) cirurgi-a   grev-e   event-o

     '√SURGERY-TH'   '√STRIKE-TH'   '√EVENT-TH'

   (b) conquist-a   cort-e   grit-o

     '√CONQUEST-TH'   '√CUT-TH'   '√SCREAM-TH'

On its face, the main difference between (3a) and (3b) is that the nominals in (3b) have a morphologically verbal counterpart: *conquistar* ('to conquest'), *cortar* ('to cut'), and *gritar* ('to scream') respectively, but the ones in (3a) do not: **cirurgiar, *grev(e)ar, *eventar.* However, apart from the morphological issue (i.e., why some nominal stems cannot have a morphologically verbal counterpart), both sets of nouns are event-denoting. For Resende (2018), despite their morphophonological form, zero nominalizations are not "simple" since they must carry a verbal layer to properly license certain structural properties.

Hence, the author argues that zero nominalizations are structurally "complex", because alongside the event reading there is evidence for a verbal layer (that is, vP/VoiceP) in their structure, such as *re*-prefixation, modification by manner adverbs, and licensing of *by*-phrases. Along these lines, we must then show that SNDEs are actually "simple(r)", at least, in what prototypical verbal categories (v°/Voice) licensing the event reading are concerned.

Resende & Basso (2022) argue that, despite the same surface form for both types of event denoting nouns, (3b) can be argued to have a non-overt verbal layer in them (hence, zero-nominalizations), whereas (3a) cannot (hence, SNDEs). This conclusion relies on morphological and syntactic evidence, specifically on the observation that there are *structural properties* depending on verbal forms, such as *re*-prefixation (Medeiros, 2012), manner adverbs licensing (Fu, Roeper, Borer, 2001), and *by*-phrases licensing (Alexiadou *et al.*, 2013), to mention a few.

We will not remake their case in this paper, but their main arguments are given as follows: by confronting SNDEs in (4) to zero nominalizations in (5), we observe that SDNEs cannot be modified by manner adverbs (which is a property associated to VoiceP), as in (4a); they cannot license agentive *por*-phrases (*by*-), as in (4b) (also associated to VoiceP); and they cannot be prefixed with *re-* (which is a property associated to vP), as in (4c).

(4) (a) *A tempestade repentinamente [assustou os moradores da vila].

'the storm suddenly [scared the villagers]'

(b) *O milagre pelo Papa [deixou os fiéis maravilhados].

'the miracle by-the Pope [let the believers amazed]'

(c) *re-tragédi-a   *re-grev-e   *re-event-o

're-tragedy-TH'   're-strike-TH'   're-event-TH'

(5) (a) O abandono do cachorro repentinamente [assustou os moradores da vila].

'the abandoning of-the dog suddenly [scared the villagers]'

(b) O canto de louvores pelo Papa [deixou os fiéis maravilhados].

'the singing of praises by-the Pope [let the believers amazed]'

(c) re-conquist-a   re-anális-e   re-envi-o

're-√conquest-TH'   're-√analys-TH'   're-√send-TH'

These tests can be taken as arguments to show that, regardless of being event denoting (a property one usually associates to vP), SNDEs cannot be *structurally* associated to a verbal layer; that is, they do not seem to have a vP/VoiceP in their structure. The contrast between (4) and (5) reveals that despite both sets of nouns surfacing with the same form (i.e., root + nominal theme vowel), they must differ somehow; otherwise, this behavior cannot be explained. The question then is what can be drawn from SNDEs with respect to event structure since they cannot presumably call upon a verbal structure.

Resende & Basso (2022) argue that, under a semantic perspective, SDNEs exhibit the main properties associated to events, that is, just as the examples in (1) for verbs, they can be located in time, as in (6a) (Vendler, 1967); they can be compared, as in (6b); and they can appear with verbs such as *ocorrer* ('to take place') and *acontecer* ('to happen'), as in (6c), which require an "eventive subject"[6] (Roy & Soare, 2013). The contrast with non-eventive simple nouns can be seen in (7).

(6) (a) uma tempestade / uma cirurgia / um blecaute ao meio-dia

'a storm / a surgery / a black-out at noon'

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[6] Actually, *ocorrer* and *acontecer* are unaccusative verbs and then the SNDE is originally their complement. However, in BP, the sentences with these verbs sound more natural when the nominals occupy their original position, and not the subject position. This is why we added the expletive pronoun *there* in the glossas in (6). Nothing in our analysis hinges on this choice.

(b) O tornado foi mais rápido do que o tsunami.

'the whirlwind was faster than the tsunami'

(c) Aconteceu um tornado / uma cirurgia / um blecaute.

'there happened a whirlwind / a surgery / a black-out'

(7) (a) *uma mesa / *uma praça / *um sindicato ao meio-dia

'a table / a square / a syndicate at noon'

(b) *O armário foi mais rápido do que o escritório.

'the closet was faster than the office'

(c) *Aconteceu uma mesa / *uma praça / *um sindicato.

'there happened a table / a square / a syndicate'

Given these considerations, if SNDEs display prototypical properties of event denoting items, then one further question is whether they could also be classified according to fine-grained properties of events. We suggest that this is indeed the case and propose a preliminary classification of SNDEs as regards the event type they denote, namely, internally caused events in (8a), including *meteorological events*, and externally caused events in (8b).

(8) (a) **Internally caused events**

blecaute ('black-out')

catástrofe ('catastrophe')

crise ('crisis')

milagre ('miracle')

pesadelo ('nightmare')

tragédia ('tragedy')

Meteorological events[7]

dilúvio ('flood')

neblina ('fog')

tempestade ('storm')

tornado ('whirlwind')

tsunami ('tsunami')

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[7] It should be noted that in BP there are meteorological event nominals, such as *chuva* ('rain'), *neve* ('snow'), and *ventania* ('gale'), which are morphologically related to a verbal counterpart, such as *chover* ('to rain'), *nevar* ('to snow'), and *ventar* ('to wind') respectively.

(b) **Externally caused events**

aula ('lecture')

baile ('ball/prom')

cambalhota ('somersault')

cerimônia ('cerimony')

chacina ('slaughter')

cirurgia ('surgery')

concerto ('concert')

crime ('crime')

dieta ('diet')

evento ('event')

farsa ('farce')

fiasco ('fiasco')

greve ('strike')

peça ('play$_N$')

porre ('boozing up')

regime ('diet')

show ('concert')

torneio ('tournament')

trote ('hazing')

The employed terminology is due to Levin & Rappaport-Hovav (1995), but the reasoning underlying this classification is owed to Marantz (1996, 1997). Externally caused events, such as *torneio*, *dieta*, *cirurgia*, etc., are those whose interpretation requires an agent (even when it is not pronounced). On their turn, internally caused events, as *milagre* or *tsunami*, do not depend on agents to take place, although they can be triggered by a causer, as in *o tornado causou um blecaute* ('the whirlwind caused a black-out') or in *a tempestade causou um enorme tsunami* ('the storm caused a huge tsunami').

Additionally, regarding the examples in (8), two more comments are in order. Firstly, this classification has a descriptive character rather than a theoretical one. Based on introspective judgments, we have collected these data and organized them in the light of some semantic properties, namely, the type of event as regards its causation. Another semantic property to be

investigated in further research is a classification based on telicity; for instance, whereas *pesadelo* and *dilúvio* do not seem to have an intrinsic telos, *chacina* and *aula* do seem to have an intrinsic culmination point. Thus, an open topic for investigation has to do with whether or not SNDEs fall into the Vendlerian classes just as "verbal events" do.

Secondly, we are making a case for SNDEs that are *simple* in the terms mentioned above (root + nominal theme vowel); however, there are other nominals denoting events with no verbal counterpart that cab be analyzed as exhibiting an overt nominalizer, such as *-ção* ['sẽw̃] ('(a)tion') in *erupção* ('eruption') and *missão* ('mission') and also *-ão* in *plantão* ('on-call'), *mutirão* ('task force'), *furacão* ('hurricane'), to mention a few – although *-ão* can be presumably analyzed as being part of the root as well, as in *cão* ('dog'). Again, this is just a first attempt to cast some generalizations about a set of nominals that have been underinvestigated in the event nominal domain.

Leaving these cases aside, following Resende & Basso (2022), we argue that SNDEs display the same semantic properties of the usual (i.e., (de)verbal) event denoting items. This conclusion points to one hypothesis, namely, the behavior of event denoting elements cannot be exclusively associated with the verbal domain, that is, events seem to exhibit pervasive semantic properties that do not depend on the morphological inventory of languages. For instance, English has the SNDE *treason*, whereas in BP, this event is expressed by a (de)verbal element: *traição* ('betrayal') from *trair* ('to betray'). On its turn, BP has *peça* (*teatral*) and Spanish has *pieza* as SNDEs, but English has *play* alongside the verb *to play*.

Semantically, this hypothesis endorses the view that the same *events* as entities can appear in different structures both in the same language and cross-linguistically, obeying different principles or constraints that are independent from which elements are needed for such an event to take place in the real world. At some level, this reasoning traces back to Grimshaw's (1990) distinction between *arguments* and *participants*, in that there are two kinds of linguistic expression denoting events, but only one of them makes it syntactically (i.e., by means of a verbal structure) and the other one makes it lexically/semantically. As Grimshaw argues, even "lexically relational" nominals can have participants (i.e., *semantic arguments*) despite lacking verb dependent argument structure (i.e., *syntactic arguments*).

Along these lines, if events (semantically) unfold independently from how linguistic structures encode/grammaticalize them, the question then is how grammar handles events and event participants that are not structurally derived. As regards event reading, as an "alternative" to

vº, we follow Marantz (2013, p. 159) in that some "roots provide the type of meanings classified as event, state and entity modifiers". In any case, it should be clear that this paper is not about a *general* theory of roots – for that, see Levinson (2015) and Alexiadou & Lohndal (2017). Rather, this paper is about *exceptions*; specifically, about "misbehaved" event nominals.

Under this perspective, again following Resende & Basso (2022), we argue that SNDEs denote events not because they merge a particular functional head (such as vº), but rather because their roots are event marked with an idiosyncratic EVENT diacritic feature, in the terms of Embick & Noyer (2007). As claimed, this is not a proposal targeting event expression in general; rather, this is a proposal to capture exceptions (an empirical fact that all morphological theories have to handle). In such a proposal, we revisit Marantz (1996)'s idea that roots can realize some syntactically relevant features and argue that "event roots" must carry this information in the syntax, because event reading is responsible for certain modifiers and some adjuncts (as we will see in the following).[8] This move allows us to capture the idiosyncratic nature of SNDEs cross-linguistically in the sense that the event denotation of these entities depends on the feature – call it an [EVENT] feature – and not on a verbal (vP/VoiceP) structure. Thus, by assuming that some roots are marked with this feature, we can capture two facts.

Firstly, being event marked is an idiosyncratic property of the root, i.e., it happened to be the case that (maybe due to a diachronic process) some roots do not derive verbs but can derive nouns with an event (denoting) reading; thus, we should expect that languages vary with respect to their SNDEs' inventory, because roots are not universal; rather, language specific.

Therefore, in English, *treason* is a SNDE, but not in BP, where there is *traição / trair*, whereas in Portuguese, *tempestade* ('storm') is a SNDE, but not in English (see *to storm the castle*). Thereby, it follows that if a given semantic property is encoded in the root, then one is supposed to find words derived from that root where that property is pervasive. Hence, if this analysis is on the right track, our prediction is that all words derived from SNDE roots will have (at least) an event flavor. This seems to be the case for (9).

(9) (a) grev-e   grev-ist-a

     'stirke'   'striker'

(b) cirurgi-a	cirugi-ão
'surgery'	'surgeon'
(c) crim-e	crimin-os-o
'crime'	'criminal'
(d) milagr-e	milagr-os-o
'miracle'	'what makes miracles'
(e) baile	bail-arin-o
'ball/prom'	'professional dancer'

Secondly, our working hypothesis is that these roots empirically do not have a verbal counterpart, because theoretically they *cannot* have a verbal counterpart. Due to a constraint we formulate in (10)[9], grammar will not allow the direct merge between an event root and a verbal functional head introducing event properties; that is, v°.

(10) Redundancy avoidance:

   If a root is event marked, then it cannot directly merge with an event head.

Basically, what (10) predicts is that the grammar cannot directly merge (that is, in a sisterhood relation) a SNDE root with a v°, which is the head associated with verbalization and event reading. Assuming this is correct, we explain why and how SNDEs exhibit semantic properties of events, but not their structural properties (i.e., those associated to vP/VoiceP). Moreover, although SNDEs are idiosyncratic in character (this is why they have to be listed), we prefigure a mechanism trying to constrain the possible mergers of a given pair of linguistic objects. As Marantz (2013, p. 159) notes about a related issue, what would cause problems for our approach would be roots creating their own syntax/semantics connection between vP structures and event semantics, not "roots allowing only an apparently idiosyncratic subset of the connections made available by the language."

Independent motivation for event marked roots is the existence of some event bound stems (in the so-called "neoclassical compounds"[10]), as √CID in *homicídio* ('homicide'), *suicídio* (''suicide'),

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[9] See De Belder & Van Craenenbroeck (2015) for an alternative view on roots and Harley (2014) for a general discussion on the debate on the nature of roots.
[10] See Gonçalves (2011) for an overview.

but also *inseticida* ('insecticide') and *bactericida* ('bactericide'), coming from Latin *cecīdī*, participle from *cædĕre* ('to kill'), rendering the following (literal) compositional meanings: "man-kill", "self-kill", "insect-kill", and "bacteria-kill". Another example is √FER in the adjectives *mortífero* ('deadly') and *frutífero* ('fruitful'), but also in the noun *sonífero* ('sleeping pill'); this stem comes from Latin *fer*, from *ferre* ('to carry'), and renders the literal meanings "death-carry", "fruit-carry", and "sleep-carry" respectively. These bound stems show that some roots do need to carry event information even though they cannot form actual verbs in the language (see **cidar*, **ferar*); the first stem in the compound serving as the theme of the event.

Additionally, as regards event participants not structurally derived (that is, not introduced by Voice), we argued in (8) that events are split off in two groups as for being internally caused and externally caused. However, this difference could not presumably be encoded into a single [EVENT] mark in the root. Thus, on that point, we follow Harley & Noyer (2000) and Marantz (2013), in that root meanings involve world knowledge to a large extent as to license certain structurally derived readings. In DM terms, it means that it is the access to Encyclopedia that will provide the full interpretation of these nominals and, hence, some adjuncts will be allowed to be interpreted as causers – in being semantically rather than syntactically licensed, in the terms of Grimshaw (1990).

As argued, SNDEs cannot merge v° neither Voice. In the latter case, this follows that SNDEs cannot license a syntactic projection introducing an external argument/agent – assuming that the presence of VoiceP depends on the presence of vP. This hypothesis seems to work fine to internally caused events, but in the case of externally caused events, some comments are in order. As shown in (4b), SNDEs do not combine with *by*-phrases; still, in examples such as *o milagre do Papa* ('the Pope's miracle') and *a cirurgia do Dr. Carlos* ('Doctor Carlos's surgery'), the DP introduced by *de* ('of') can be assigned a causer interpretation in the former and an agent interpretation in the latter.
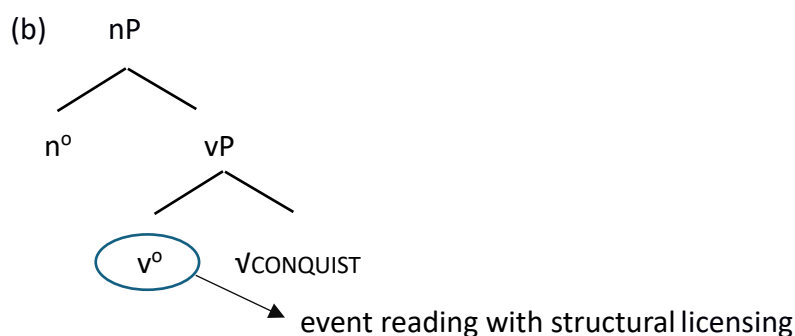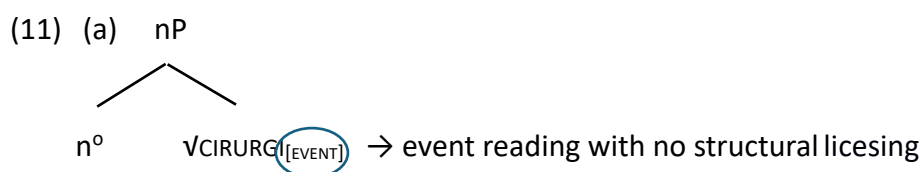
However, our working hypothesis is that it can receive an agent reading not because it is syntactically projected (i.e., in terms of VoiceP, for instance), but because speakers know things about miracles and surgeries that allow them to interpret an adjunct as such. Note that, since *de* is the preposition introducing default nominal adjuncts in Portuguese, other readings for this PP are also available. Em *cirurgia do Dr. Carlos*, for instance, *o Dr. Carlos* can be assigned a theme reading, one where he is the patient.[11] Additionally, note that DPs introduced by the preposition *de* in both

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[11] See Gallego (2015) for a proposal where the "semantic" complement of a noun is always a syntactic adjunct, never

aula de Inglês ('English class') and *o tornado do Mar Negro* ('the Black Sea's whirlwind') cannot be interpreted as agents, because this is not "semantically licensed" (or encyclopedically licensed) by what speakers know about these entities.

Along these lines, an internally caused event can (but not must) appear with a causer phrase. Hence, in both *aconteceu um milagre* ('a miracle happened') and *o Papa fez um milagre acontecer* ('the Pope caused a miracle to happen'), both "miracles" do not require an agent, although in the latter case, the Pope may have caused it, just as in *a storm can cause a tsunami* and, as argued in Marantz (1996, 1997), someone can cause amusement: *John amused the children with his stories*. This is why there must be a difference between agents that are syntactically projected and phrases that can be interpreted as agents according to the speaker's Encyclopedic knowledge.

In this point, our reasoning traces back to Grimshaw (1990)'s influential work and parallel "nouns denoting events with syntactic participants" and "nouns denoting events with semantic participants" to explain the semantic similarity, but syntactic/structural difference, between SNDEs, on one hand, and verbs and (de)verbal expressions, on the other. Therefore, our working hypothesis is that SNDEs have a structure as in (11a), for *surgery*, in contrast to (11b), with a zero nominalization: *conquista* ('conquest').

(11) (a)   nP
         /   \
       n°   √CIRURG([EVENT]) → event reading with no structural licesing

      (b)   nP
         /   \
       n°   vP
               /   \
             v°   √CONQUIST
                 ↘
              event reading with structural licensing

2. Event participants with no verbal counterpart

Alongside SNDEs, we would also like to draw attention to certain event participant nominals with no verbal counterpart. Event participants can be formed in BP by a series of nominalizers, and

an argument.

this matter will not concern us in this paper – some examples are *contador* ('accountant'), *pintor* ('painter'), *fofoqueiro* ('gossiper'), *manobrista* ('valet'), *aprendiz* ('learner'), *assaltante* ('robber'), *formando* ('student about to graduate'), etc. All these nominals have morphologically related verbs and can be argued to be derived from a verbal stem. Things become more interesting with two further sets of data, namely, *zero event participant nominals* and *event participants with no verbal counterpart*, although we will not provide a full-fledge analysis for (12) and (13). BP examples of the first case can be seen in (12).

(12) (a) assassino   adivinha   governo   intérprete   visita

       'assassin   soothsayer   government   interpreter   visitor

       guia   servo   testemunha   vigia   xereta

       'guide   servant   witness   watcher   busybody'

   (b) hóspede   suspeito   paquera

       'guest   suspect   crush'

In (12a), we find zero agent nominals that are transparently formed from the verbal stem, with the meaning "the one that V", where "V" stands for their morphologically related verb. For their turn, in (12b), we find cases of zero nominals with the same compositionality, but whose interpretation is of patient: "the one that someone V". Leaving these cases aside, there are other instances of zero nominals that are interpreted as having (at least) an agentive flavor, with a morphologically related verb, but whose meaning cannot be derived from the verbal stem (that is, cases where the paraphrasis "the one that V" does not apply), as we can see in (13).

(13) (a) crítico ('critic') ≠ who criticizes, from *criticar* ('to criticize')

    (b) médico ('doctor') ≠ who medicates, from *medicar* ('to medicate')

    (c) síndico ('condominium manger') ≠ who manages, from *sindicar* ('to investigate')

    (d) guarda ('guard') ≠ who keeps, from *guardar* ('to keep')

    (e) penetra ('uninvited guest') ≠ who penetrates, from *penetrar* ('to penetrate')

The nominals in (13) could be seen, in DM terms, as nominalizations from the root, which also derives from (non-semantically related) verbs – see Alexiadou & Schäfer (2010) for the same kind of distinction between *er*-nominals in English. In any case, the data which are more relevant

to the present discussion are those in (14) and (15), because they denote event participants, but have a root that cannot seem to (synchronically) derive verbs. Moreover, another interesting point is that these nominals display overt aspectual markings, such as *-ndo* ('-ing') from progressive in (14) and *-nte*, which we argue to be habitual aspect, in (15) – for Medeiros (2006), nominals of this kind are (just) imperfective.

(14) (a) vestibulando: "candidate to admission to college"/ *vestibular (as a verb)

(b) mestrando: "who is in his/her way to get a master's degree"/ ??mestrar

(15) (a) lactante ('nursing mother'): "who breastfeeds" / *lactar

(b) comediante ('comedian'): "who entertains with jokes" / *comediar

(c) cliente ('customer'): "who buys" / *cliar / *clier

(d) feirante ('street market seller'): "who sells in a street market" / *feirar

(e) suplente ('laternate'): "who replaces" / ??suplir

Regarding this kind of nominal, we assume that they are not like SNDEs, in the sense of being root marked, for two reasons: (i) despite the lack of occurrence with v°, these roots are involved in other non-eventive formations, as *lactose* ('lactose') for (15a), *comédia* ('comedy') for (15b), *clientela* ('clientele') for (15c), *feira* ('street market') for (15d), and [*ensino*] *supletivo* ('second grade supply education') for (15e); and (ii) these roots accept Asp, which could be seen as some sort of "verbal" projection. With these cases, then, we are in front of event participants that are not "deverbal" but display a morphosemantic marking of aspect. Thus, the structure we propose for nominals as (14) and (15) appears in (16).

(16)

```
        nP
       /  \
      /    \
   n°       \
         /    \
       Asp    √ROOT
```
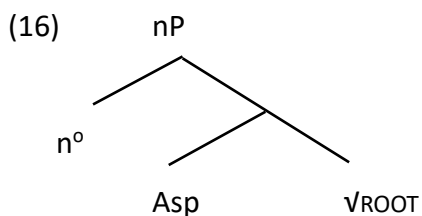
Structurally, these roots will directly merge Asp, whose feature specification can be [HABITUAL] (spelled out as /nt/) or [PROGRESSIVE] (spelled out as /nd/) – see Embick (2004) for independent motivation for directly merging Asp and the root. The final vowel (/e/ and /o/ respectively) can be seen as the nominal theme vowel projected by n°, following Harris (1999). Semantically, it means

that *vestibulando* is a participant of an event that includes the topic time (that is, an ongoing event at a certain topic time), and *lactante* is a participant of an event that occurs in a series of topic times (i.e., potential or actual regularities occurring in a given series of topic times).

In summary, this is an attempt to show that "simple nouns are not that simple." On one hand, both zero nominalizations and SNDEs have the same surface form, namely, root + nominal theme vowel and share the same semantic denotation (that is, events), but they diverge in that SNDEs do not (and, according to our analysis, cannot) merge v°, what would render them verbal structural properties which they do not display. This move allows us to capture the idiosyncratic nature of SNDEs, both intralinguistically and cross-linguistically.

On the other hand, event participant nominals can be typical deverbal formations (despite the null realization of the nominalizer) or can be zero nominals whose formation is not deverbal, but where there is no constraint on merging v°; it is just an independent derivation with an independent meaning. Finally, there are event participants that do not have a verbal counterpart, but have an aspectual layer, with morphophonological realization, which means that they do not have a (purely) verbal counterpart but do appear with some "verbal" projection; that is, AspP.

3. Simple nouns denoting states

One final piece in the puzzle that we would like to address is the difference between events and states in the nominal domain. Semantically, states are different from events because they are usually not dynamic (*be the capital of Brazil*), do not involve agentive participants (*fear*), do not involve changes of state (*stay*), whereas events are dynamic (e*at a pear*), have agentive participants (*run*) and culminate in changes of state (*die*) – see Steward (1997) for an overview and discussion. Despite being non-dynamic entities, states can differ in degree with respect to this property – see Basso & Ilari (2004) for an overview and a typology of state predicates. Additionally, states can be the result of an event (*John broke the glass, then the glass is broken*) and also be non-resultative (*John has green eyes*).

Structurally, we follow Alexiadou (2011, p. 31) in that "there are two classes of state [predicates], one with and one without a Davidsonian argument *e*." The first one will be "dynamic" and the second one "static." For Alexiadou (2011), manner modification is out with static state predicates (what suggests that they do not contain the event argument) as in **Jo owned the house quickly* (p. 32). Another piece of evidence for making a distinction between states has to do with degree modification: modifiers can be interpreted as a degree modifying either the state or the

temporal extension of the event, as in *Carol resembled a little bit her grandmother* versus *Peter has sat a little bit in the garden* respectively. Additionally, one can also find ambiguous sentences between the static and the dynamic reading, such as in *Carol has sweated a little bit yesterday*.

In this scenario, then, applying this reasoning to BP nominals we could expect to find dynamic state predicates that are deverbal, and static state predicates that are root nominalizations. As far as the nominal domain is concerned, we expect manner adjectives to combine with deverbal state nominals, but not with static state predicates, what can be seen in (17). Similarly, in (18), we can see that the degree modifier – the diminutive *-inh*(*o*) – with state predicates renders just a reading of state modification, but not one of temporal extension of the event.

(17) (a) *desejo cuidadoso ('careful wish')

(b) *interesse atento ('attentive interest')

(c) *culpa rápida ('quick blame')

(d) *respeito lento ('slow respect')

(18) (a) fominha ('little hunger') = "hunger in a low degree" / *"hunger for a little time"

(b) raivinha ('little anger') = "anger in a low degree" / *"anger for a little time"

(c) medinho ('little fear') = "fear in a low degree" / *"fear for a little time"

(d) sedinha ('little thirst') = "thirst in a low degree" / *"thirst for a little time"

Morphologically, the data in (17)-(18) are also simple nouns in the sense of being realized just as root + nominal theme vowel. However, the data in (17) have a verbal counterpart – *desejar* ('to wish')*, interessar* ('to interest'), *culpar* ('to blame'), *respeitar* ('to respect') –, whereas the nominals in (18) do not. In any case, given that the nominals in (17) are out with manner modifiers, they could be seen as root nominalizations – see the contrast with *um copo quebrado cuidadosamente* ('a carefully broken glass'), where the state *quebrado* ('broken') accepts manner modification, making reference to the event that caused the break.

On their turn, the state nominals in (18), usually seen (just) as abstract nouns, are prototypically SNDSs in that they are not readily morphologically related to verbs, even though Portuguese has verbs such as *enraivecer* ('enrage') and *amedrontar* ('frighten'). This shows that these SNDSs are not root marked (as we argued SNDEs to be); rather, they are nominalizations of roots that can also participate in verbal formations. This preliminary analysis points to the view

that result states are syntactically more complex than non-result states (in that the latter involve fewer syntactic projections; they lack vᵒ), but also semantically more complex in the sense that some state predicates result from events in the real world, but static events do not; they just describe the state of affairs or signal some inherent property of a given entity.

4. Outlook and conclusion

In this paper, we discussed simple nouns denoting events (SNDEs), some cases of nominals denoting event participants and simple nouns denoting states (SNDSs). Specifically, regarding SNDEs and SNDSs, they are underinvestigated in the literature in relation to other types of nominalization, but they are particularly interesting because they refer to entities that are usually associated to verbal structures (vP/VoiceP), namely, events, but without displaying structural properties associated to these verbal projections.

Additionally, we showed that what is usually referred to as "simples nouns", whose realization is just root + nominal theme vowel is actually the surface form for different structures with different properties, namely, (i) deverbal nominalizations with a null nominalizer; (ii) root nominalizations with independent derivation and meaning from (de)verbal formations of the same root; (iii) root nominalizations where the root is idiosyncratically event marked, which prevents it to merge vᵒ, but assigns it event semantic properties. Moreover, we argued that there are cases of event participants, where they exhibit overt aspectual markings even though these formations do not have a verbal counterpart.

In short, this paper is a first attempt to cast some light on underinvestigated phenomena in both Event Semantics and nominalization domains and also a preliminary analysis of some raised issues. A fine-grained typology of events (for instance, as regards telicity) and states (for example, regarding result versus non-result states) is in order for future research. We also left for further investigation the consequences of the proposal of "semantic" diacritic features in roots and the distinction between "semantic participants" and "syntactic participants" in argument structure discussion, mostly, in DM terms.

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