Differential Object Marking with inanimate objects

Marco García García

Marco.Garcia<at>uni-koeln.de

1. DOM with animate and inanimate objects*

As is well known, in some languages only certain direct objects (DOs) are marked by an object marker, while other DOs remain unmarked. Since Bossong (1985) this phenomenon is known as Differential Object Marking (DOM). According to traditional, as well as to recent approaches, DOM is controlled by individuating features of the object NP such as animacy, definiteness or specificity, i.e. object marking is sensitive to the animacy scale, the definiteness scale or a combination of these scales (cf., for instance, Aissen 2003, Bossong 1985, 1998, von Heusinger & Kaiser 2003, 2005, Laca 2006). With respect to Standard European Spanish, which is the empirical focus of this paper, animacy seems to be the most important factor among these conditioning features. Usually, definite and/or specific DOs are not marked by the Spanish differential object marker, the preposition a, unless the referent is human or at least animate. Consider the following examples:

(1)	(a)	Conozco *a/ø	esta	película.	[+specific], [-animate]
		know-1.SG to	this	film	
		'I know this film	ı.'		
	(b)	Conozco a/*ø	este	actor.	[+specific], [+animate]
		know-1.SG to	this	actor	
		'I know this acto	or.'		

Since the DO in (1a) *esta película* is specific, i.e. referential, but clearly inanimate, it cannot be marked by *a*. In contrast, the DO in (1b) *este actor* is animate and specific. Therefore, *a*marking is required. Given that there is some variation in *a*-marking with animate DOs, it is often assumed that DOs in Spanish can only receive object marking when they are both animate and specific, as it is the case with (1b) (cf. e.g., von Heusinger & Kaiser 2003). However, although the category of specificity might play a certain role with respect to the distribution of object marking in Spanish, it is outranked by animacy. This is shown by comparing the examples in (1) with the following examples (cf. Leonetti 2003: 72-76):

(2)	(a)	No 1	he vi	isto *a/ø	nad	a.	[-specific], [-animate]
		not 1	have 1.sg se	een to	not	hing	
		'I ha	ven't seen a				
	(b)	No	he	visto	a/*ø	nadie.	[-specific], [+animate]
		not	have 1.SG	seen	to	nobody	
		'I ha	ven't seen a	nybody. ³			

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In contrast to (1), in (2a) the absence of *a*-marking is expected since the DO is neither animate nor specific. On the other hand, in (2b), *a*-marking is necessary, although the DO is clearly non-specific. Obviously, object marking can only be due to the animacy-feature of *nadie*. As already seen above, animacy is also the relevant factor in (1a), where *a*-marking is not possible given that the DO is specific but inanimate. In conclusion, the examples (1) and (2) show that the lexical category of animacy is the most important factor controlling *a*-marking of DOs. Therefore, we will generally refrain from considering specificity effects in the following and primarily focus on animacy-related issues.

According to Torrego Salcedo (1999: 1785ff.), *a*-marking does not only require animacy on the DO, but also on the subject. Apparently, *a*-marking seems only possible with verbs that require animate subjects. With verbs that admit animate as well as inanimate subjects, such as *esconder* 'hide', *buscar* 'search' or *conocer* 'know', *a*-marking seems to appear only with animate subjects:

- (3) (a) La diva conoce **a** muchos aficionados. the diva knows to many aficionados 'The diva knows many aficionados.'
 - (b) *La ópera conoce **a** muchos aficionados. the opera knows to many aficionados 'The opera knows many aficionados.'

Torrego Salcedo (1999: 1786)

Despite this general dependency on animacy, we do, however, find *a*-marking with inanimate DOs as well as with inanimate subjects. Consider the examples given in (4) where *a*-marking is obligatory.

- (4) (a) Un adjetivo acompaña / califica a un sustantivo. an adjective accompanies / qualifies to a noun 'An adjective accompanies/qualifies a noun.'
 - (b) Los días siguen **a** las noches. the days follow-3.PL to the nights 'The days come after the nights.'
 - (c) El uno precede **a**l dos. the one precedes to-the two 'The one precedes the two.'
 - (d) En esta receta, la leche puede sustituir **a**l huevo. In this recipe the milk can-3.sG replace to-the egg 'In this recipe, egg can be replaced by milk.'
 - (e) Esta cuesta supera a aquella. this slope outranks to that
 'This slope outranks that one.' Torrego Salcedo (1999: 1788)

Why are these objects *a*-marked? That is the question we will try to answer in this paper. To achieve this, we will focus on lexical and semantic factors, which seem to be the most significant ones, apart from other conditions operating on the syntactic and discourse-pragmatic level (cf. Weissenrieder 1991 among others).

The paper is organised as follows: In section 2, we will briefly look at the lexical level in order to show which verbs are generally attested with inanimate *a*-marked DOs. In section 3, we will discuss some recent approaches to DOM and put forward the hypothesis that inanimate DOs receive *a*-marking when the DO referent is equally or more agentive than the subject referent, whereas the notion of agentivity will be specified on the basis of Dowty

(1991) and Primus (1999a, b, 2006). Finally, section 4 will present some data that seem to confirm this hypothesis.

2. Verb classes

Since *a*-marking has expanded diachronically along the *definiteness* scale, at first being only required with strong pronouns, but later also possible with less prominent DOs, such as (animate) definite and indefinite NPs (cf. von Heusinger & Kaiser 2005), one might assume that the examples in (4) are pointing to an expansion of *a*-marking along the *animacy* scale. This would mean that in modern Spanish, object marking is principally possible not only on human and animate DOs, but also on inanimate DOs, which is obviously not the case (cf. (1a)). As will be shown in this section, *a*-marking with inanimate DO seems to be lexically restricted. Furthermore, *a*-marking of inanimate DOs is attested from the very beginning in medieval Spanish (cf. Laca 2006: 450-454) and has not significantly increased since then. Therefore we cannot simply rely on language change in order to account for object marking in this case.¹

According to Torrego Salcedo (1999: 1788), *a*-marking in cases like those in (4) is independent of the factors usually taken to trigger object marking: the animacy of the DO, the specificity of the DO as well as the thematic role of the subject (i.e. its agency or non-agency) do not seem to be relevant for object marking. Instead, she assumes that object marking is due to verb semantics: "Semánticamente, parece tratarse de verbos cuyo sentido implica relaciones de equiparación y contigüidad lineal o escalar entre el sujeto y el objeto. [...] cabe pensar que se trata de una clase semántica que asigna *a* al complemento en virtud de su sentido" (Torrego Salcedo 1999: 1788). Similar observations are made by Fish (1967) and Weissenrieder (1991: 147), who considers a small corpus based on three grammar books listing the following verbs that most frequently occur with *a*-marked DOs:

(5) modificar 'modify'; llamar 'call'; considerar 'consider'; designar 'designate'; definir 'define'; acompañar 'accompany'; seguir 'follow'; caracterizar 'characterize';concretar 'make specific', preceder 'precede' calificar 'describe'; distinguir 'distinguish'; excluir 'exclude'; especificar 'specify'; implicar 'imply'; contener 'contain'; introducir 'introduce'; situar 'locate'; afectar 'affect'; colocar 'place'; clasificar 'classify'; diferenciar 'differentiate'; explicar 'explain'; encuadrar 'frame'; [...]; integrar 'integrate'; separar 'separate'; ver 'see'

According to Weissenrieder (1991: 148), these verbs form lexical classes. Most of them can be characterised by the notion of 'position' or 'placement':

 (6) verbs of direct placement: *colocar* 'place', *poner* 'put' verbs of separation or placement apart: *distinguir, diferenciar* 'distinguish' verbs of sequencing (placement before or after): *seguir* 'follow', *preceder* 'precede'

To this class we might add verbs of *re*placement like *sustituir* or *reemplazar* ('replace'). Although all these verbs hint at a certain relation between the notion of placement and object

¹ Company (2002), however, points at an explanation based on language change reporting a considerable increase of *a*-marking with inanimate DOs in 20^{th} century Mexican Spanish. From our view, a diachronic account is problematic. It is not very likely that the expansion of DOM in Spanish will ever reach the end of the animacy and definiteness scales, i.e. the point where *a*-marking of inanimate and indefinite DOs would become obligatorily required. Such an expansion would lead to a formal ambiguity of the DO and the indirect object, which is also (categorically) marked by *a*.

marking, this relationship is rather an indirect one. In many cases, verbs of placement involve participants that are on a par with respect to agentivity, as it is the case with *preceder* ('precede') or *seguir* ('follow'). In section 3.2 and section 4, we will show that this is because these verbs often pattern with marked DOs. Moreover, semantic considerations like the notion of placement, as well as the above mentioned relations of equation, linear or scalar contiguity between subject and object pointed out by Torrego Salcedo (1999: 1788), should not be seen as lexical restrictions since - in contrast to what Bello (1847/1951: §897) claimed with respect to *seguir* and *preceder - a*-marking is not obligatory with any of the listed verbs (cf. Weissenrieder 1991: 148, Delbecque 2002: 92f.). This holds also for verbs of naming and singling out such as *llamar* ('call') or *considerar* ('consider'), which often occur with *a*-marked objects, but do not require the preposition obligatorily.

(7) verbs of naming and singling out:

llamar 'call', caracterizar 'characterize', considerar 'consider', etc.

The verb *llamar*, for instance, only occurs with the preposition when it is used in a double object construction such as in *no llaman oración a la secuencia con verbo* ('they do not call the sequence with a verb a sentence'). Other instances of *llamar*, especially those like *llamar la atención* ('to call attention') will never occur with the preposition (cf. Weissenrieder 1991: 148). Constructions of the type *llamar la atención* are known as light verb constructions. They are characterized by a semantically deprived (lexical) verb and an internal object NP, which does not function as a proper participant of the event, but rather as the semantic predicate which denotes the event. This predicative function of the object NP is also found in cognate object constructions such as *vivir una vida escandalosa* ('to live a shocking live') or very similar constructions like *seguir el camino* ('follow the way'). It seems to be the case that neither light verb constructions nor cognate object constructions allow for object marking in Spanish (cf. Delbeque 2002: 107f., García García 2001, 2005a: 87 and section 4 below).²

Given that lexical restrictions do not provide a complete answer to the question of why inanimate DOs are sometimes marked with the preposition, we should look beyond the lexical level.

3. Semantic distinctness

3.1 Distinguishability

It is widely assumed that subjects tend to be cross-linguistically animate, whereas objects are usually inanimate. Empirical evidence of this pattern can be found in corpus studies of Russian (cf. Thomson 1909) or Swedish (cf. Jäger 2004). Given this configurational tendency, traditional as well as more recent approaches rely on to the "unnaturalness" (Comrie 1979, 1989), "markedness" (Aissen 2003) or "rarity" (Haspelmath 2005) of animate DOs in order to account for DOM. Comrie (1989: 128) puts it the following way: "The most natural kind of transitive construction is one where the A is high in animacy and definiteness, and the P is lower in animacy and definiteness; and any deviation from this pattern leads to a more marked construction." As is well known, A and P do not refer to syntactic functions (subject or object), but to the thematic roles of Agent and Patient respectively. In accusative languages such as Spanish A is generally supposed to be linked to the subject and P to the direct object. Comrie's characterisation is also the starting point of Aissen's (2003) influential model of DOM, where thematic roles are, however, not assumed to be relevant. In line with Comrie's

² Note that in languages with (morphological) case marking, such as Latin or German, cognate objects as well as the NP of a light verb construction are categorically marked with accusative case (cf. García García 2001: 36-54, 2005a: 86-90).

iconic view of differential case marking patterns, Aissen (2003: 438) holds that *semantically* marked transitive objects, i.e. atypical objects such as animate and definite ones, are also *morphologically* marked. As a functional motivation for this pattern Aissen (2003: 437) adopts the traditional view (cf. e.g. Müller 1971) that only those objects that resemble typical (i.e. animate and definite) subjects receive object marking. This means that object marking might serve to disambiguate subjects from objects, or at least to maximise the difference between them.³

Aissen formalises her generalisations in an Optimality Theoretic model that implements the animacy and definiteness scales as well as two further constraints (an iconic and an economy-based one). The details of the model, which aims to give a cross-linguistic formalisation of differential case marking patterns, need not concern us here⁴ since its basic assumptions are already contradicted by the data presented in this paper: As pointed out by de Swart (2003: 31ff.), Aissen's model is able to account for object marking of *animate* objects, but not for that of *inanimate* ones. According to Aissen, inanimate (and indefinite) objects, i.e. semantically unmarked objects, should never receive object marking since they resemble in no way typical subjects. This prediction, however, is falsified not only in Spanish, but also in Malayalam (de Swart 2003: 32). One of the principal shortcomings of Aissen's approach to DOM is that it focuses exclusively on the markedness of the DO instead of taking into account the markedness of the whole construction - as, for instance, Comrie (1989), García García (2005b) and, more consequently, Hopper & Thompson (1980) and de Swart (2003) do.

On the basis of the acute observation that object marking is not only found when both subject and object are animate, but also when both are inanimate, de Swart (2003: 31f.) argues that, in the latter cases, object marking is due to the subject's deviation of its typical (i.e. animate) configuration. Consider (8) and one of our initial examples repeated here in (9):

- (8) Pedro ha besado a María. Pedro has kissed to Maria 'Pedro has kissed Maria.'
- (9) En esta receta, la leche puede sustituir **a**l huevo. in this recipe the milk can-3.sG replace to-the egg 'In this recipe, egg can be replaced by milk.'

Whereas in (8) *a*-marking seems to be due to the fact that the *object (María)* resembles the subject (*Pedro*) with respect to its animacy (and definiteness), in (9) *a*-marking might be due to the circumstance that it is the *subject (la leche)* which resembles the object (*al huevo*) by coding an inanimate (and indefinite, generic) referent. Thus, instead of confining to the features of the DO, like Aissen (2003) and most of the traditional approaches do, de Swart (2003) puts the focus on the (feature-)relation of subject and object. He assumes a principle of Minimal Semantic Distinctness, which postulates that the core participants of a transitive predication must be minimally distinct with respect to features such as animacy, specificity and some other parameters taken from Comrie (1979) and Hopper & Thompson (1980). If the core participants are not minimally distinct morphological (or structural) marking is required (cf. de Swart 2003: 71). An alternative formulation of this principle, especially chosen to fit

³ As Aissen (2003: 437), Bossong (1998: 223) and Laca (1995: 70), among others, have pointed out, DOM should not be understood as a strict disambiguating device since object marking is required in many instances where the absence of object marking may not lead to ambiguity. In Spanish and many other languages subject and object might not only be distinguished on the basis of prominence features (animacy and referentiality), but also by means of agreement, thematic restrictions of the verb or word order. Cf. de Hoop & Lamers (2006) for on overview and interplay of different distinguishability constraints.

⁴ Cf. Naess (2004) or de Swart (2003) for a detailed discussion of Aissen (2003).

Spanish, is the distinguishability constraint given in (10), which relies on animacy and specificity as the relevant distinctness parameters (Morimoto & de Swart 2006: 232; cf. also de Hoop & Lamers 2006: 270).

(10) Distinguishability:

Mark objects that are not outranked by the subject in prominence (animacy, specificity).

Given that in all of our initial examples *a*-marking of inanimate DOs co-occurs with inanimate subjects (cf. (4)), the distinguishability constraint seems to be borne out. In principle, de Swart's approach seems very promising since it consequently treats DOM as a relational clausal property, i.e. it emphasises that object marking does not only depend on the semantic and referential properties of the DO, but also on those of the subject. One of the main advantages of this approach is that it gives a *unified* account of DOM with animate as well as inanimate DOs. Hence it seems to provide a straightforward and elegant explanation of the pattern.

Yet, it is not clear whether animacy and specificity principally are the relevant dimensions to which *a*-marking of DOs is sensitive in Spanish. If the distinguishability approach based on these parameters was correct we could expect object marking to always occur with inanimate DOs and subjects.⁵ This does not seem to be case.

(11) El entusiasmo vence (a) la dificultad. the enthusiasm conquers (to) the difficulty 'Enthusiasm conquers difficulties'.

As de Swart (2003: 31) points out, in cases like (11) object marking is optional.⁶ In fact even more variation is found (cf. section 3 and 4). Not only cases in which *a*-marking is rather optional (cf. (11)) or obligatory (cf. (9)) are attested, but also cases in which *a*-marking with inanimate DOs is anomalous or even impossible (cf. e.g. (13a.)). Let us explore the reason for this variation.

As already noted in section 2, *a*-marking with inanimate DOs often occurs with placement verbs such as *preceder*, *seguir*, *sustituir*, *reemplazar*, etc., although object marking is not obligatory with these verbs. In order to prove to which extent the distribution of animacy determines object marking, I have checked these verbs as well as the verbs *vencer* and *superar* in the *Base de Datos Sintácticos del español actual* (BDS), a data based corpus consisting of about 1.450.000 clauses.⁷ The results are given in the following table:

(i) A/*ø la dificultad la vence el entusiasmo to the difficulty_i clitic_i conquers the enthusiasm 'Enthusiasm conquers difficulty'

⁵ Note, however, that 'distinguishability' (10) is understood as a violable Optimality-Theoretic constraint.

⁶ Since *a*-marking is obligatorily required in the alternative construction with object preposing, de Swart (2003: 89f.) considers this syntactic restriction as an additional factor which renders the presence of the preposition obligatory:

Cf. Delbecque (1998: 400f.) as well as examples (23) and (29) below for a discussion of this syntactic restriction.

⁷ The clauses are taken from 34 different texts belonging to different text sorts: narrative texts, essays, drama, journal articles and even some spoken material. About 80 % of the texts are in European Spanish, about 20 % are in American Spanish. Note that I have ignored the tokens in which the DO is cliticised since no variation is found in these cases.

	Subj. [+animate	e], DO [-animate]	Subj. [-animate], DO [-animate]		
	a+DO	DO	a+DO	DO	
vencer	8 (40%)	8 (40%)	1 (5%)	3 (15%)	
('conquer')					
sustituir	0 (0%)	1 (6,66%)	11 (73,33%)	3 (20%)	
('substitute')					
reemplazar	1 (20%)	1 (20%)	2 (40%)	1 (20%)	
('replace')					
preceder	0	0	10 (100%)	0	
('precede')					
seguir	2 (1,31%)	125 (82,23%)	13 (8,55%)	12 (7,89%)	
('follow')					
superar	0	17 (51,51%)	2 (6,06%)	14 (42,42%)	
('surpass')					
TOTAL	11 (4,68%)	152 (64,68%)	39 (16,59%)	33 (14,04%)	
(235 tokens)					

(12) Object marking with inanimate DOs: *vencer, sustituir, reemplazar, preceder, seguir, superar*

As shown in the table, *a*-marking with inanimate DOs is most frequently realised in combination with an inanimate subject (cf. the right column of the table): This is the case with 39 out of 50 *a*-marked tokens (i.e. 78%). We might argue that the distinguishability constraint is roughly confirmed from this perspective, although, of course, we could expect a higher percentage of marked objects. There are, however, two types of counter-evidence, which challenge the distinguishability constraint. First, it should be kept in mind that in the very same configuration, namely the one of inanimate subjects and inanimate objects (right column), there are only 39 out of 72 tokens where the DO is marked with a (i.e. 54%), while 33 of the tokens occur without prepositional marking. Thus, object marking is not categorically attested in cases where we would expect it according to the distinguishability constraint. It only occurs in about half of the cases in which an inanimate DO is realised in combination with an inanimate subject. The second type of - probably more serious - counterevidence to the distinguishability constraint consists in the fact that we also find object marking in the combination of an inanimate DO and an animate subject, i.e. in the semantically natural or unmarked configuration (cf. the left column of the table). Although no apparent distinguishability problem should arise in this configuration, object marking is found in 11 out of 163 tokens (6,75%), which is 22% of the total of 50 tokens that are marked with a. Hence, object marking is attested in cases, where, according to the distinguishability constraint, we would not expect any marking at all. Some of the relevant tokens will be discussed in section 4.

More statistical counter-evidence is found in Buyse's (1998: 385) corpus study, which attested 266 tokens of inanimate subjects and inanimate DOs. Apparently, object marking is realised in only 22 of them (\approx 9%), whereas 240 tokens (\approx 91%) occur without prepositional marking.⁸ We can conclude from this, as well as from the statistical analysis provided above,

⁸ Note that these numbers are not explicitly given in Buyse (1998). They can, however, be deduced from his results (cf. Buyse 1998: 385): Within a corpus of 4750 examples relevant to DOM, a total of 752 tokens *with* object marking are attested, whereas 2,9% (i.e. ≈ 22) of these tokens have an inanimate subject and an inanimate DO. Of the total of 3998 tokens *without* object marking, 6% (i.e. ≈ 240) occur with an inanimate subject and an inanimate DO. Thus, of the total of the 262 examples of inanimate subjects and inanimate DOs, approximately only 9% (i.e. ≈ 22 tokens) occur with prepositional marking.

that object marking cannot be (exclusively) predicted by the distribution of animacy. The distinguishability constraint will not give us the right predictions, at least not, when only the feature of animacy is taken as the relevant distinguishability parameter.

Finally, it should be noted that the distribution of object marking shown in (12) seems to depend on the verb. 36 out of the overall 50 tokens with *a*-marking (i.e. 72%) are with the verbs *sustituir* ('substitute'), *preceder* ('precede') and *seguir* ('follow'). This result is not expected if the verb-independent category of animacy is taken as the trigger for object marking, but may well be expected by considering clausal meaning, i.e. the level of thematic information.

3.2 Thematic distinctness

Consider the following examples taken from Weissenrieder (1991: 149) where object marking can appear in combination of an inanimate object and an *animate* subject:

(13)	(a)	El profesor reemplaza el libro.							
		the professor replaces the book							
		'The professor <i>replaces</i> the book (with something else).'							
	(b)	El profesor reemplaza al libro.							
		the professor replaces to-the book							
	'The professor <i>takes the place of</i> the book.'								

DOM in (13) is challenging. It cannot be explained by the distribution of animacy, since (13a) as well as (13b) show the same distribution of this category: both clauses have an animate subject and an inanimate object. Therefore we should explore a different way of accounting for DOM. As Weissenrieder (1991: 149) correctly points out, there is a subtle, but nevertheless crucial meaning difference between the sentences in (13). Whereas the sentence (13a) without *a*-marking means that it is the professor by himself who *replaces* the book with another book or something else, the sentence (13b) with *a*-marking means that the professor *takes the place of* the book. Thus, (13b) does not entail a proper causation on the part of the subject referent, it does not mean that the professor replaces anything, but rather that he fulfils the didactic, entertaining or whatever function we might attribute to the book.

As often reported in the literature on DOM in Spanish, there are many cases, in which the alternation of *a*-marking is not systematic, but rather optional (cf. e.g. (11)), i.e. where some speakers use the preposition, while others do not use it. Now, this optionality does not hold with respect to (13). In this case object marking correlates systematically with the mentioned meaning alternation, i.e. for a native speaker of Spanish it is not possible to utter sentence (13b) meaning that the professor replaces the book with another book or something else.⁹ 'To take the place of' instead of 'to replace' is also the natural and probably only possible interpretation of our initial example given in (4d) and (9), where object marking is obligatorily required: *En esta receta, la leche puede sustituir al huevo* ('In this recipe egg can take the place of/be replaced by milk').

Although not noticed by Weissenrieder (1991), minimal pairs like the one in (13) challenge most, if not all, of the accounts that relate DOM to common transitivity approaches. Object marking in (13) can neither be predicted by accounts that follow the transitivity approach of Comrie (1979, 1989), as, for instance, Aissen (2003), nor by those that draw on the transitivity account of Hopper & Thompson (1980), as, for instance, Naess (2004). This is due

⁹ On the other hand, (13a) does not seem to be fully restricted to the meaning of 'replace', since it might also be compatible with the interpretation of 'take the place of'. This, however, might be due to the definite article, which also allows a generic reading. By replacing it with an indefinite one, the interpretation of 'take the place of' is ruled out.

to the fact that object marking is not found in (13a), where the DO is inanimate, but, after all, referential and properly affected, but in (13b), where the DO is inanimate, generic and not properly affected. Problematically for Comrie (1979), object marking does not pattern with marked (unnatural), but with unmarked (natural) transitivity; problematically for Hopper & Thompson (1980),¹⁰ object marking does not correlate with high, but with low transitivity.

We should, therefore, look for an alternative way to account for object marking with inanimate objects. According to Weissenrieder (1991), object marking with inanimate DOs is conditioned by the *saliency* of the object NP, which is conditioned by lexical, sentence and discourse factors. With respect to cases such as (13), Weissenrieder (1991: 149) claims that marking occurs "when the activity level of the DO noun [is] equal to or greater than the activity level of the subject noun." From my view, an overall saliency principle, such as proposed by Weissenrieder, is problematic, since the notion of saliency is very vague. According to an overall saliency principle operating on all linguistic levels, we should expect that, for instance, at the discourse level, object marking is related to (prosodically) focused elements, which does not seem to be the case (cf. Delbecque 2002: 85). Yet, as far as the sentence level is concerned, Weissenrieder's proposal seems to be on the right track.

In order to specify Weissenrieder's account and the above-discussed examples more precisely, we can think of the verb *reemplazar* as having two thematic grids, as shown in (14), where the subject is linked to either an agent-like thematic role or to a theme-role. Only in the latter case (14b), where both subject and object are linked to more or less the same thematic role, namely a theme-like, less or equally agentive role, is the preposition required with the DO.

(14) (a)
$$reemplazar_1$$
: REEMPLAZ(x^{AGENT} , y^{THEME}) $y = DO$
(b) $reemplazar_2$: REEMPLAZ(x^{THEME} , y^{THEME}) $y = a + DO$

This representation is only intended to illustrate the main idea (cf. section 4.2 for a refined analysis of (13)). We will not postulate two lexical entries for verbs like *reemplazar*, since the meaning alternations do not seem to be a lexical, but rather a clausal phenomenon, also found with other verbs (cf. section 4). If the meaning alternations can be pragmatically inferred from the context they do not need to be coded lexically. Following Weissenrieder's (1991) approach, on the one hand, and de Swart's (2003) on the other, I would like to put forward the following hypothesis based on thematic distinctness:

(15) Thematic Distinctness: DOM with inanimate direct objects is correlated primarily with the thematic relation between subject and object. When the direct object is equally or more agentive than the subject, *a*-marking is required.

Note that (15) is formulated as a (unilateral) mapping from meaning to form, i.e. from the level of thematic information to the level of the formal realisation of a-marking. The reversal of (15) that maps a-marking to thematic distinctness is, probably, weaker, i.e. there might be cases in which a-marking does not correlate with thematic distinctness, but with independent syntactic or pragmatic conditions, such as object preposing or topicality. We will come back to this issue in section 4.

¹⁰ As is well known, transitivity in Hopper & Thompson (1980) is understood as a clausal multi-factorial and gradual phenomenon. Depending on the value of parameters such as individuation (i.e., [±animate], [±definite], [±specific]), aspect [±telic], degree of agentivity, etc., a given construction is considered more or less transitive. Assuming that DOM in Spanish always correlates with both a high-individuated subject and a high-individuated DO, *a*-marking is seen as an iconic reflection of high transitivity (cf. Hopper & Thompson 1980: 256).

The idea that object marking is somehow related to agentivity is at times mentioned in the literature (cf. Company 1997: 159-162; 2002: 209-211, Laca 1995: 73f.; Torrego Salcedo 1999: 1792,1801), but hardly ever worked out in more detail.¹¹ In the next sections we will elaborate on this idea on the basis of Dowty's (1991) and Primus's (1999a, b, 2006) Proto-Role account.

3.3 Agentivity

Following Dowty (1991), as well as Primus (1999a, b, 2006), the number of thematic roles can be reduced to only two prototypical roles, namely the Agent Proto-Role and the Patient Proto-Role.¹² These roles are defined by sets of basic semantic properties (Dowty 1991: 573):

- (16) Contributing properties for the Agent Proto-Role:
 - (a) volitional involvement in the event or state
 - (b) sentence (and/or perception)
 - (c) causing an event or change of state in another participant
 - (d) movement (relative to the position of another participant)
 - ((e) exists independently of the event named by the verb) 13
- (17) Contributing properties for the Patient Proto-Role:
 - (a) undergoes change of state
 - (b) incremental theme
 - (c) causally affected by another participant
 - (d) stationary relative to the movement of another participant
 - ((e) does not exist independently of the event, or not at all)

According to Dowty's understanding of these cluster concepts, an agentive argument might entail all of the contributing properties listed in (16), as is the case with the first argument of the predicates *murder* or *build*, or only some of them, as is the case with the first argument of observe or hear, traditionally classified as Experiencers rather than Agents. Unlike a murderer or a builder, an observer or a hearer does not cause a change of state (16c) in another participant, they neither need to move (16d) nor to be volitionally involved (16a) in a proper sense. Nevertheless, all these arguments entail the properties 'perception' (16b) and 'independent existence of the event named by the verb' (16e). Thus, they can all be considered agentive arguments, although with different entailments of agentivity. The same holds for the notion of Proto-Patient, whose properties are, according to Dowty, (1991) partly converses to that of the Proto-Agent. Causal affectedness (17c), for instance, is the converse of the 'causation' property (16c) attributed to the Proto-Agent. We will have a closer look at these relations and the Patient Proto-Role in the next paragraph. As is well known, Dowty (1991: 576) assumes an Argument Selection Principle based on the two defined Proto-Roles: "In predicates with grammatical subject and object, the argument for which the predicate entails the greatest number of Proto-Agent properties will be lexicalized as the subject of the predicate; the argument having the greatest number of Proto-Patient properties will be lexicalized as the direct object."

Primus (1999a, b, 2006) has developed Dowty's Proto-Role approach in many aspects. One of these aspects concerns the above-mentioned relation between Proto-Agents and Proto-

¹¹ One exception is the construction grammar approach of Delbecque (1998, 2002). Cf. footnote 20.

¹² Cf. the macrorole approach of the Role and Reference Grammar for an alternative account based on two thematic roles (Van Valin & LaPolla 1997).

¹³ This property - as well as the converse one in (17e) - is taken from Keenan's (1976) list of subject properties and put in parentheses since Dowty is not sure, whether it should be included in the Proto-Role definition or rather be attributed to the discourse associations of subjects (cf. Dowty 1991: 572).

Patients. Primus (1999a, b, 2006) distinguishes two types of thematic information that define Proto-Roles, namely involvement and dependency. Involvement is characterised by the number and content of Proto-properties, which are roughly equivalent to those mentioned by Dowty (1991), although volition is replaced by the more general notion of control, and possession is listed as a further Proto-property. According to the relational nature of Proto-properties, they are modelled as basic thematic predicates. As shown in (18), these predicates might have at least one argument, as indicated by x, or more arguments, as indicated by the dots (Primus 1999b: 141):

- (18) Basic thematic predicates and thematic roles of the Proto-Agent¹⁴
 - (a) CONTROL(x, ...) x controls/controller
 - (b) CAUSE(x, ...)
 - (c) MOVE(x, ...)
 - (d) EXPER(x, ...)
 - (e) POSSESS(x, ...)

x causes/causer x is physically active/mover x perceives/experiencer

x possesses sth./possessor

The second type of thematic information, i.e. the notion of dependency, characterises the dependency relation of the involved thematic roles. According to Primus (1999a: 52, 2006: 56), the Proto-Patient is defined by its dependency on the Proto-Agent (co-argument dependency). Thus, unlike Dowty (1991), Primus does not rely on a list of specific Proto-Patient properties since, on the basis of the mentioned co-argument dependency relation, these properties are derivable from those of the Proto-Agent. Consequently, converse relations, like, for instance, the one that Dowty assumes for the Proto-Agent property causation (16c) and the Proto-Patient property of causal affectedness (17c) - causer / caused - are generalised over all properties: "controller / controlled, mover / moved, experiencer / experienced ('stimulus'), possessor / possessed, etc." (Primus 2006: 56). The co-argument dependency relation has to be understood as the central characteristic that distinguishes the Proto-Agent from the Proto-Patient. Note that in Primus (2006), causation is no longer considered as an additional Protoproperty but as the crucial criterion, which characterises the co-argument dependency. Formally, the co-argument dependency is represented by the relative position of the arguments in the thematic structure. The first argument of a given thematic predicate is always the independent one, i.e. the Proto-Agent, and the second is always the dependent one, i.e. the Proto-Patient (Primus 2006: 59):¹⁵

¹⁴ Note that neither Dowty (1991) nor Primus (1999, 2006) include animacy as a defining Proto-Agent property. Both claim that the assumed Proto-properties are generally independent of each other, although Primus (1999, 2006) argues that some Proto-properties (basic thematic predicates) may unilaterally imply others. Thus, for instance, the basic thematic predicate EXPER implies the predicate ANIMATE, i.e. only an Agent that perceives other participants might be animate, which also holds for Agents that prototypically control an event (Primus 1999b: 142). This means that, unlike the property of cause or control, animacy seems to be a less central property of agentivity. An Agent is prototypically, but not necessarily animate.

¹⁵ Primus (2006) assumes that the two types of thematic information, i.e. *involvement* and *dependency*, are related to distinct linguistic phenomena: Whereas dependency is tied to *structural relations*, such as word order, involvement basically seems to be tied to *case (marking)*. Yet, relying on the usual DOM patterns in Spanish (i.e. object marking depending on animacy and definiteness), Primus (2006: 74) explicitly concedes that *case marking* might also be related to other factors, such as individuation (i.e. animacy and definiteness). Note that the different functions to which case and structure might be sensitive could co-occur, i.e. they do not exclude each other. As far as DOM in Spanish is concerned, it seems that *case* is sensitive to individuation (animacy and definiteness) and agentivity, whereas agentivity can be specified by both types of thematic information: *Involvement* and *dependency* (cf. the discussion of our examples in section 4).

(19) type of involvement of y depends on type of involvement of x = Proto-Patient
|
pred(x,y)
|
independent involvement of x = Proto-Agent

In order to decide whether an argument of a two-placed predication outranks the other argument of this predication with respect to agentivity, we will rely on Dowty (1991) and Primus (1999, 2006) and refer to both co-argument dependency and involvement (i.e. Proto-properties) in the following. Note that, although the question of whether one argument is more agentive than the other is often clear-cut, there are also less obvious cases in which both arguments of a predicate might qualify as Proto-Agents.¹⁶ Following Primus (1999, 2006), in predications of the type *Peter pushed Mary away*, Mary's movement is clearly dependent on Peter's causal involvement in the event; thus, Peter has to be considered as a Proto-Agent and Mary as a Proto-Patient. However, in a case like *Peter follows Mary* both arguments can, in principle, be understood as Proto-Agents for both move and, apart from their spatial or temporal ordering, neither movement is necessarily dependent on that of the other one. We will come back to such examples in section 4.

On the basis of these specifications of agentivity and our thematic distinctness hypothesis about object marking (cf (15)), we might come to a better understanding of the variation found with *a*-marking of inanimate DOs. It seems that this hypothesis can predict object marking in the above discussed examples in (13) with the verb *reemplazar*, as well as in most of our initial examples in (4)¹⁷ and those that will be discussed in section 4. Moreover, it might also account for the optionality of object marking in cases such as (11), repeated here in (20).

(de Swart 2003: 31)

(20) (a) El entusiasmo vence (a) la dificultad.
'Enthusiasm conquers difficulties.'
(b) [CAUSE(x, BECOME(STATE(y)))]

 $(b) \left[e^{A (b)} e^{A (b$

Independently of the non-animacy of the given arguments, the subject NP (*el entusiasmo*) can be interpreted as a Proto-Agent, and the object NP (*la dificultad*) as a Proto-Patient, since in the denoted event the subject argument causes a change of state of the object argument, which turns from 'not-conquered' into 'conquered'. As well as in all the following examples, this is rendered by a rough representation (cf. (20b)), which is based on Primus (1999a, b) formalisation focusing on the thematic structure of the clause. If our interpretation of (20) is correct, the distinguishability problem that might arise as a consequence of having two inanimate referents does not exist on the thematic level and is thus unlikely to cause trouble. This might account for the fact that *a*-marking is optional in this case.

In the next section we will discuss some data that provide more and clearer evidence in favour of the hypothesis of thematic distinctness. Most of the data stems from the abovementioned test corpus research of the *Base de datos sintácticos del español actual* (BDS). Section 4.1 is concerned with tokens in the semantically marked configuration of inanimate subjects and inanimate DOs, section 4.2 discusses examples in the semantically unmarked combination of animate subjects and inanimate DOs.

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¹⁶ Cf. also Primus's (1999b: 145) discussion of the Proto-Recipient, which is characterised by bearing both Proto-Agent and Proto-Patient properties.

¹⁷ Cf. section 4.2 for a refined analysis of (13) and section 4.1 for an analysis of some of the initial examples given in (4).

4. Data

4.1 Examples with [-animate] subjects and [-animate] DOs

Let us look first at examples with the verb *preceder* ('precede'). All of the 10 tokens of *preceder* attested in the BDS-corpus are examples with an inanimate subject and an inanimate DO. Consider the following example:

- (21) (a) Las mañanas que precedieron **a** su muerte (CRONICA 11,18) the mornings which preceded to her/his death 'The mornings which precede/came before her/his death.'
 - (b) [BEFORE(EXIST(x), EXIST(y))]

In (21), as well as in all of the other relevant tokens of the BDS, *preceder* means 'come before', i.e. it expresses a mere temporal relationship between the arguments of the clause. In contrast to the arguments of a predication like, for instance, *Peter precedes Mary*, where both arguments entail the Proto-Agent property of 'movement', the core participants of (21a), do not have this property: 'mornings' and 'deaths' do not move in a proper sense. All we can say is that there is a temporal anteriority between these arguments, as shown in (21b). Crucially, the involvement of these arguments is independent from each other, which is not only the case with (21b) but also with tokens of the type *Peter precedes Mary*. Given this co-argument *in*dependence relation, the subject and object of (21a) can be considered as equally (non-)agentive; according to Primus (2006), we might classify both of them as Proto-Agents. Following our hypothesis, this thematic non-distinctness requires object marking.

Note that the same reasoning can be applied to account for object marking in our initial examples (4b) *Los días siguen a las noches* ('The days follow the nights') and (4c) *El uno precede al dos* ('The one preceded the two'). Both clearly refer to mere ordering relations. This interpretation is consistent with the fact that there is a reversible relation underlying the clausal meaning of the mentioned examples. In the mere temporal or spatial readings *preceder* has the general meaning BEFORE(p[x], q[y]) which involves a reversible relation of the co-arguments since it implies the predication AFTER(p[x], q[y]).¹⁸ The latter meaning is explicitly stated by the examples with *seguir* in (4b) and (23) below.¹⁹

Although no tokens of *preceder* without *a*-marking are attested in the BDS, our analysis is supported by the fact that there is nevertheless a systematic variation of the prepositional marking depending on thematic information. Relying on different corpus data, Delbecque (2002: 92) stresses that *preceder* can appear with or without the preposition. According to her construction grammar approach, "[w]ith *a*, the notion of ordering is understood *linearly* [...]; without *a* the relationship is one of *dependency*" (Delbecque 2002: 92; emphasis M.G.G.).²⁰

¹⁸ A reversible relation is basically a symmetrical relation which is principally defined as follows: R is symmetrical iff $R(x,y) \Rightarrow R(y,x)$. A well-known example is the predicate *marry*: If Peter is married to Anna Anna is married to Peter (cf. Bußmann 2002: 671).

¹⁹ Note that the central meaning difference between *preceder* and *seguir* concerns the perspective of the referred situation. The underlying symmetrical relation is either conceptualised from the perspective of the object argument, as it is the case with *preceder*, or from the perspective of the subject argument, as it is the case with *seguir*.

²⁰ The central claim of Delbecque's (1998, 2002) construction grammar approach to DOM is that Spanish has a double transitive paradigm based on the *a*- vs. ø-alternation of DOs. The presence or absence of the preposition models differences with respect to the subject-object relationship: Whereas the construction without *a* marks the force-dynamics between the subject entity and the object entity as an unidirectional relationship, the construction with *a* marks this relation as a bidirectional one. Consequently, she assumes two different transitive frames: one with a single-role assignment (Actor-Goal), associated with the construction without *a*, and one with a double-role assignment (Actor-Goal; Carrier-Attributor), related to

- (22) (a) La hipótesis de trabajo precede / orienta la verificación empírica the working hypothesis precedes/ orientates the empirical verification 'The working hypothesis precedes / orientates the empirical verification.'
 - (b) [CAUSE(x, BECOME(STATE(y)))]

As shown in the example (22) taken from Delbecque (2002: 92), *preceder* rather means 'orientate' or 'influence' than just 'come before'. In line with Delbecque's, as well as with our own proposal, it seems plausible to analyse this meaning shift in terms of thematic roles. In contrast to (21), in (22) there is an obvious co-argument dependency relation: The 'working hypothesis' influences and, thus, determines somehow the 'empirical verification' implying a causal affectedness, whereas the final state of this causal affectedness is not specified by the verb. This is shown by the representation in (22b). Since causation is a strong Proto-Agent property (cf. (16c), (18b)) linked to the subject argument, the subject clearly outranks the DO in agentivity. Consequently, *a*-marking is not required in (22).

As pointed out by Delbecque (2002: 93), the same patterning is found with *seguir* ('follow'), although even more meaning shifts than those assumed by Delbecque are observable with this verb.

- (23) (a) A la pregunta siguieron otras (JOVENES: 112, 36) to the question followed others 'Other questions followed / came after this question'
 (a) Otras preguntas siguieron a la pregunta
 - (a') Otras preguntas siguieron **a** la pregunta 'Other questions followed / came after this question'
 - (b) [AFTER(EXIST(x), EXIST(y))]

In (23a), which is taken from the BDS, *seguir* clearly means 'follow' in the sense of 'come after'. Thus, as well as in the above-discussed example with *preceder*, a mere temporal relationship is expressed in this clause. In (23a), no question can be considered to be dependent on the other one. Hence there is no co-argument dependency underlying the thematic structure of this example. Subject and object can both be considered as Proto-Agents or, at least, as equally (non-)agentive arguments. Given this lack of thematic distinctness object marking is required. As already mentioned above, the absence of co-argument dependency and thematic distinctness is directly related to the fact that (23) implies a reversible relation between the subject and the object referent.

We might think, however, that *a*-marking in (23a) is really due to object preposing, which, according to the *Diccionario panhispánico de dudas* obligatorily triggers object marking in combination of an inanimate subject and an inanimate DO (cf. also de Swart 2003: 89f.). Note that this syntactic factor does not contradict our semantic reasoning. Firstly, this is the case because the hypothesis of thematic distinctness (15) is basically a unilateral constraint. It postulates that inanimate DOs which are equally or more agentive than the subject must be marked. The reversal does not necessarily hold, i.e. not every (inanimate) DO which is marked by *a* must be equally, or more agentive than the subject. It might well be the case that

the construction with *a*-marking. Although several aspects of Delbecque's account are very enlightening, it is not clear to me how to make use of her thematic analysis. Note that she claims that in predications with *a*-marking the DO generally carries the causal Attributor role, beside the patient-like Goal role. This seems not to be compatible with her interpretation that constructions of *preceder* with *a*-marking code a linear ordering relation. How can the DO *su muerte* in (21) be understood as a causal Attributor role, when it is merely put as an argument which is temporally located after the subject argument *las mañanas*?

object preposing functions as a further constraint favouring the presence of the preposition.²¹ Secondly, we should consider that even without object preposing, *a*-marking is necessary (cf. (23a')), at least, as long as the simple temporal relationship is expressed. If, otherwise, the preposition is missing (*Otras preguntas siguieron la pregunta*), the sentence will not be restricted to the temporal relation, but rather mean that 'the other questions' continued the topic, style or whatever property we might attribute to the preceding question. Assuming that the subject argument controls this continuation event, it clearly outranks the object in agentivity, and, thus, the hypothesis of thematic distinctness will correctly predict no object marking in this case. In the BDS we find several tokens of this type with the verb *seguir*. Consider the following example:

(24) (a) El estado soviético sigue la política exterior del régimen zarista the state soviet follows the policy external of-the government czar (TIEMPO: 74,14)

'The Soviet state follows/continues the foreign policy of the czar government.'

- (a') En cuanto a su política exterior, el estado soviético sigue el/al régimen zarista. 'With respect to its foreign policy, the Soviet state follows the czar government.'
- (b) [CONTROL(x, ACT-LIKE(x, y))]

In (24a), *seguir* means 'follow' in the sense of 'continue'. Supposedly, the Soviet state continues his foreign policy 'volitionally', which is one of Dowty's (1991) Proto-Agent properties (cf. 16a)). Referring to Primus (1999a, b), we might argue that the state at least controls its own foreign policy. This entails that it causes the continuity of its foreign policy, which is another central Proto-Agent property (cf. (18b)). Consequently, the absence of *a*-marking in this example seems to be due to the fact that subject and object argument are thematically well-distinguished participants: The subject is obviously more agentive than the DO.

One might probably object that the absence of *a*-marking is related to the fact that the subject (*the Soviet state*) has a collective reading, and thus rather refers to an animate argument. Since the DO (*la política del régimen zarista*) is inanimate, we could simply rely on the traditional idea that no prepositional marking is required because the subject outranks the DO with respect to animacy. This would, of course, be a much more comfortable explanation. Yet, the objection is not fully convincing. Note that we must rely on metonymy in order to adhere to animacy as the relevant trigger for DOM. This means that animacy cannot be taken as a mere lexical feature, as is usually assumed (cf. von Heusinger & Kaiser 2003), but that it might also be assigned indirectly via metonymy, metaphor, or other means. Following this generally plausible reasoning, we should, however, consider that in (24) not only the subject, but also the DO ('the foreign policy of the *czar government*') might be interpreted as a collective, and thus animate referent. This interpretation is probably more evident in the alternative formulation given in (24a'). On the basis of the resulting animacy conflict, we should expect obligatory object marking. However, *a*-marking is not obligatory, neither in (24a) nor in (24a').

Apart from tokens, where *seguir* means either 'continue' or just 'come after', we also find other uses of *seguir*:

²¹ Note, however, that according to Delbecque (1998: 400f.), neither object preposing nor clitic doubling, which are often taken as formal criteria for topicality (or focality), trigger object marking categorically. Cf. also examples (28) and (29) below.

(25) (a) mientras una comisión especial sigue el desarrollo de las negociaciones while a commission special follows the development of the negotiations (1VOZ: 3,4,1,5,7).

'while a special commission will follow/observe the development of the negotiations'

(b) [EXPER(x, y)]

In (25) *seguir* means 'follow' in the sense of 'observe'. Obviously the commission is the referent that perceives the negotiations. Given that perception is one of the Proto-Agent properties postulated by Dowty (1991) and Primus (1999a, b), it can be concluded that the subject is clearly more agentive than the DO. In line with our hypothesis, we will claim once more that object marking is not required in this case since the subject outranks the DO with respect to agentivity.²²

It should be noted that, as far as *seguir* is concerned, object marking is only found in 13 out of 25 tokens with inanimate subjects and inanimate DOs. In most of the cases, object marking is blocked by a sort of (semi-productive) cognate object construction of the type *seguir el camino* ('follow the way'). Some of these constructions are given in (26):

(26) seguir el camino ('follow the way') seguir los derroteros ('follow the paths'), seguir el trayecto ('follow the trajectory'), seguir su curso ('follow one's course'), seguir un rumbo ('follow a course'), seguir la dirección ('follow the direction'), etc.

As already mentioned in section 2, object marking in cognate object constructions, as well as in light verb constructions, is generally ruled out, since the DO is a predicate rather than an argument, i.e. it does not qualify as a proper participant (cf. Delbecque 2002: 107f.; García García 2001, 2005a: 87).²³ Note that we do not need a further constraint to account for the absence of *a*-marking in these constructions. Although the subject NP might not outrank the (syntactic) object NP with respect to animacy, the thematic distinctness is always warranted in these cases, since there is only one proper participant, namely the subject argument. Once again, the absence of a conflict on the level of thematic relations patterns with the absence of object marking.

Let us review one of our initial examples in (4), repeated here in (27):

- (27) (a) Un adjetivo acompaña / califica **a** un sustantivo 'An adjective accompanies / qualifies a noun.'
 - (b) [NEXT-TO(x, y)]

The sentence in (27a) basically expresses the metalinguistic meaning of 'serve as an adjunct'. It phrases a rough placement relation without specifying a spatial ordering of the coarguments, i.e. a placement before or after: The adjective is *next to* the noun. This meaning might be conveyed by verbs like *acompañar* ('accompany'), *calificar* ('qualify') or even *modificar* ('modify'). As well as in the relevant examples with *seguir* and *preceder* (cf. (21), (23)), the example in (27) is characterised by a reversible relation of the subject and the object referent. The adjective is next to the noun, and the noun is next to the adjective. Since the subject and the object argument are mutually independent, both arguments can be taken as

²² As in the former example in (24), one might object, once again, that the absence of *a*-marking is due to the collective meaning of commission. Probably, the objection is more substantial in this case, since the link to animacy is more evident. Note that, according to Primus (1999b: 142f.), the Proto-property of experience unilaterally implies animacy on the part of the Experiencer.

 ²³ Cf. Jones (1988), MacFarland (1995) and Moltmann (1989) for a discussion on the semantic and syntactic status of cognate objects.

Proto-Agents. According to our proposal of thematic distinctness, *a*-marking is required in this example.

Consider the following example, which is the title of Goya's well-known aquatint etching:

- (28) (a) El sueño de la razón produce monstruos. the dream of the reason produces monsters. 'The sleep of reason produces monsters.'
 - (b) [CAUSE(x, BECOME(EXISTENT(y)))]

Note that in this example the subject is inanimate and the DO is *animate*. Thus, with respect to the distribution of animacy, this token seems to be semantically even more marked than the above discussed cases where both arguments are inanimate. According to traditional approaches as well as to the distinguishability constraint of Morimoto & de Swart (2006), object marking should be required in this configuration. The DO clearly outranks the subject in terms of animacy. However, no prepositional marking is necessary here. Our proposal predicts that this is because the subject outranks the DO in terms of agentivity. The subject argument is clearly a Proto-Agent since it causes the existence of the DO referent. Moreover, the object argument has to be considered as a Proto-Patient: By virtue of its effected nature, it does not exist independently of the event, which referring to Dowty (1991) and Primus (1999, 2006), are characteristic Proto-Patient properties (cf. (17e)).

With effected objects the thematic distinctness between the core participants of the clause is self-evident. This goes hand in hand with the fact that object marking seems to be principally impossible with effected objects.²⁴ Let us consider another example with an effected object from my own data.

- (29) (a) El/*al dolor de cabeza lo provocan las preocupaciones the headache_i pron.3.SG-acc.-masc._i trigger-3.PL the worries 'The headache is caused by worries.'
 - (b) [CAUSE(x, BECOME(EXISTENT(y)))]

In (29) both subject and object are inanimate. Moreover, the object is preposed. As already mentioned discussing (23), object preposing is supposed to trigger *a*-marking obligatorily in the combination of an inanimate subject and an inanimate DO (cf. the *Diccionario Panhispánico de Dudas* and de Swart 2003: 89f.). Yet, object marking is not required and would even yield an ungrammatical sentence in this case. As shown in the former example with an effected object, *a*-marking seems to be ruled out by the fact that the subject clearly outranks the object with respect to agentivity.

4.2 Examples with [+animate] subjects an [-animate] DOs

The vast majority of the tokens checked in the BDS corpus in the semantically unmarked configuration of animate subjects and inanimate DOs contain the verb *seguir* ('follow'). As

- was drawing to a girl '(S)he was portraying a girl'
- (ii) Estaba dibujando una niña.
- was drawing a girl
- '(S)he was drawing a girl'

²⁴ Consider the following examples taken from Leonetti (2003: 80), where both subject and object are animate:
(i) Estaba dibujando **a** una niña

While the alternative with object marking (i) denotes a *portraying*-event and thus entails a referential DO, which exists independently of the event, the alternative without object marking (ii) makes reference to a *drawing*-event. Obviously, only the object referent of the *drawing*-event qualifies as an effected object, since it does not exist independently of the subject's activity.

shown in the table in (12), this is the case with 127 out of 163 tokens. 125 out of the 127 examples with *seguir* show no object marking. Most of them follow the above-mentioned cognate object construction of the type *seguir el camino* ('follow the way'), where no *a*-marking is expected. In order to discuss examples with *a*-marking, let us first focus on the above mentioned examples in (13), repeated here in (29) and (30):

- (30) (a) El profesor reemplaza el libro.
 'The professor *replaces* the book (with something else).'
 (b) [CONTROL(x, BE-INSTEAD(y, z))] z is not specified
- (31) (a) El profesor reemplaza al libro.
 'The professor *takes the place of* the book.'
 (b) [ACT-INSTEAD(x, y)]

As already shown above, DOM in these examples is due to a clausal meaning difference. In (30) there is a clear co-argument dependency relation of the object argument on the subject argument: the professor causes a replacement of the book; the entity with which the book is replaced is not specified. This interpretation, with the subject functioning as a Proto-Agent, and the object as a Proto-Patient, involving control as the central Proto-property is represented in (30b). Since the subject outranks the object in agentivity there is a maximal thematic distinctness of the co-arguments. Consequently no object marking is necessary.

In contrast to (30), in (31) there is no thematic distinctness between the core participants: The professor is interpreted as an entity that takes the place of the book, i.e. as someone who *acts instead* of the book fulfilling its didactic, entertaining or whatever function we might attribute to the book. Crucially, 'act like' is a reversible or symmetrical predicate, since ACT-INSTEAD(x, y) basically implies ACT-INSTEAD(y, x). Therefore (30) does not express a dependency but an *in*dependency relation of the co-arguments. Both the subject and the object argument can be understood as Proto-Agents. As a result of this thematic non-distinctness, *a*-marking is required in (31a).

Note that the latter analysis also holds for our initial example (4d) *En esta receta, la leche puede sustituir al huevo* ('In this recipe egg can take the place of/be replaced by milk'). In this case, however, the reversible predication BE-INSTEAD(x, y) instead of ACT-INSTEAD(y, x) might be a more appropriate one to represent the underlying meaning of the clause.

Let us consider a last example that points to a similar direction:

(Weissenrieder 1991: 149)

- (32) (a) El niño *imitaba* al tren. the boy imitated to-the train 'The boy imitated the train.'
 - (b) [ACT-LIKE(x, y)]

Although in (32) the subject is animate and the object is clearly inanimate the object is again marked with the preposition. Usually, examples of this type are explained on the basis of personification (cf. Real Academia Española 1973: 373f.). Following Weissenrieder (1991: 149), it can be argued that the verb *imitar* requires animacy features to be assigned to the inanimate train. By treating the train as a personified animate-like referent, object marking would be expected, since subject and object both share the feature [+animate].

In line with our argumentation, there is, however, a different way to account for object marking in (32). The child might imitate the train without being in control of this event. It

might unconsciously produce similar sounds and movements like the train.²⁵ Although the event is described from the perspective of the child (and not the other way around) the meaning of this example points, once more, to a symmetrical relation between the core participants of the clause: As represented in (32b), the child *acts like* the train, which basically implies the reversible relation, namely that the train acts like the child (ACT-LIKE(x,y) \Rightarrow ACT-LIKE(y, x)). If we are correct, in (32) no co-argument dependency relation is expressed. The involvement of the child, as well as the one of the train might well be independent from each other. Both arguments can be understood as Proto-Agents. Finally, this agentivity conflict might be the reason for *a*-marking in this example.

5. Conclusion

We have focused on a neglected and particularly problematic area of DOM in Spanish, namely DOM with inanimate DOs, generally understood as semantically unmarked or typical DOs. As shown in this paper, it is not possible to cope with these cases of DOM on the basis of Aissen (2003) and many others, which confine their analyses to the nature of the DO and postulate object marking only for semantically marked (i.e. animate and definite) DOs. As pointed out by Hopper & Thompson (1980) and others (cf. García García 2005b, Delbecque 2002, de Swart (2003), it seems more promising to look at the whole clause or even beyond the clause, and not only at the DO. Nevertheless, object marking of inanimate DOs cannot be accounted for by means of Hopper & Thompson's (1980) transitivity approach since object marking does not pattern with high but with low transitivity.

Following de Swart's (2003) Principle of Semantic Distinctness, we have shown that it is necessary to consider, above all, the semantic relation of subject and object in a given clause. We have, however, rejected Morimoto & de Swart's (2006: 232) distinguishability constraint according to which only those inanimate DOs should be marked which are not outranked by the subject with respect to animacy and specificity. On the basis of Weissenrieder (1991) and a test corpus research we have, instead, argued for a slightly different approach, namely that object marking with inanimate DOs primarily correlates with a conflict on the thematic level. Our central claim is that DOs, which are not outranked by the subject in terms of agentivity, must be marked by *a*. Relying on Dowty's (1991) and Primus's (1999a, b, 2006) Proto-Role accounts the discussion of the data has shown that inanimate DOs marked by *a* often qualify as Proto-Agents, as they show the following property: They are not dependent of the subject's involvement in the event (no co-argument dependency). Crucially, the involved verbal predicates imply a reversible or symmetrical relation between the subject and the object referent:

²⁵ Note that there is even a stronger interpretation in favour of our account, namely that the train functions as the *stimulus* determining the child's sounds and movements, i.e. as the underlying cause and thus, as a sort of counter-agent to the subject argument.

Underlying reversible relation	Examples	
$NEXT-TO(x, y) \Rightarrow NEXT-TO(y, x)$	<i>acompañar</i> ('accompany' <i>calificar</i> ('qualify')	r), cf. (4a), (27)
$BE-INSTEAD(x, y) \Rightarrow BE-INSTEAD(y, x)$	sustituir ('subtitute')	cf. (4d)
$ACT-INSTEAD(x, y) \Rightarrow ACT-INSTEAD(y, x)$	reemplazar ('replace')	cf. (13b), (31)
$ACT-LIKE(x, y) \Rightarrow ACT-LIKE(y, x)$	<i>imitar</i> ('imitate')	cf. (32)
$BEFORE(p[x], q[y]) \Rightarrow AFTER(p[x], q[y])$	<i>preceder</i> ('precede') <i>seguir</i> ('follow')	cf. (4c) (21) cf. (4b), (23)

One of the consequences related to the present analysis is that object marking is impossible with effected objects, cognate objects, and light verb constructions.

It might well be the case that *a*-marking is not only controlled by thematic restrictions, but also by (independent) syntactic and discourse-pragmatic conditions like object preposing or topicality. Note, however, that at least some of the relevant conditions discussed in the literature fit quite well with our proposal. This is the case with double object constructions (e.g. *no consideran oración a/*ø la secuencia con verbo* 'they do not consider the sequence with a verb a sentence), secondary predications (e.g. *tengo *a/ø una secretaria* 'I have a secretary' vs. *tengo a/²' ø una secretaria con pelo azul* 'I have a secretary with blue hair') or A.c.I.-constructions (e.g. *dejar al/*el tiempo hacer de las suyas* 'to let the time do its work'). In all of these cases, the *a*-marked DO can be interpreted as a Proto-Agent, which functions as the logical subject of the embedded predication.

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