

A denotation-driven reanalysis of the Spanish neuter pronominal system

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Abstract

This paper offers an analysis of the Spanish neuter pronominal system that complements the system found in traditional Spanish grammars. A more descriptively and heuristically adequate analysis is proposed that includes pro-forms widely ignored in previous accounts such as phonetically null pronouns and explains a wider range of neuter reference uses, denotations and constructions. I base my analysis on two main basic assumptions. First, I claim that some neuter pronouns can be used either referentially or non-referentially. Following Moltmann's (2013) semantic analysis of presentational pronouns, I argue that the pronoun 'lo' that we find in free relative constructions does not have a referential denotation but only a presentational denotation. Second, all neuter pronouns share a common semantic specification as [–individual] expressions in contrast with non-neuter pronouns, which are unspecified for the same feature. This specification allows us to establish a clear division of labor between the so-called neuter and non-neuter reference in Spanish at the pronominal level. I also claim that neuter pronouns have the ability to shift the type of the entity referred to from individuals to properties or sets of properties. This is particularly evident with neuter demonstrative pronouns in uses such as 'eso es mi coche' (that is my car) or 'eso es una mujer' (that is a woman), which are fairly common in natural discourse. The proposed analysis is framed within a general theory of definiteness (Roberts, 2003) and aligns with the theories of referent accessibility such as the Givenness Hierarchy (Gundel, Hedberg and Zacharski, 1993), which allows an explanation for how semantically similar neuter forms encode the cognitive status of their referents differently.

Keywords: neuter, reference, pronouns, definiteness, anaphora, individuation, givenness

1 Introduction

Modern Spanish does not have a grammatically neuter gender or a category of neuter forms that can be defined in terms of their morphology, and clearly separated from masculine and feminine forms. The strongest evidence supporting this statement is that there are no neuter nouns in Spanish, although they do exist in other languages such as German and Russian. However, the label 'neuter' is commonly used in traditional Spanish grammars for the pronouns *lo*, *ello*, *esto*, *eso*, *aquello*. These pronouns are commonly used to refer to clausal entities, which denote ideas, and concepts characterized vaguely as abstract, unspecific, and not reducible to a single noun. Typical uses of neuter

This is the author's manuscript of the article published in final edited form as:

Zulaica Hernández, I. (2018). A denotation-driven reanalysis of the Spanish neuter pronominal system. *Lingua*, 213, 91–116. <https://doi.org/10.1016/j.lingua.2018.07.003>

pronouns are shown in (1), where different neuter pro-forms (null-pro, *eso*, *lo*) co-refer with the proposition denoted by A's utterance.

- (1) A: Juan ha rechazado el premio.
 John has rejected the prize
 'John rejected the prize.'
- B': **null-pro** es increíble.
 it is unbelievable
 'It/that is unbelievable.'
- B'': ¿Quién te ha dicho **eso**?
 Who to-you has said that
 'Who told you that?'
- B''': ¡No me **lo** puedo creer!
 Not me it I-can to-believe
 'I can't believe it/that!'

Previous accounts of the Spanish neuter (Bello 1860[1981]; Fernández-Ramírez 1951) have claimed that neuter pronouns, unlike masculine/feminine pronouns, cannot co-refer with noun phrases. However, this statement is problematic for an account of co-reference based on strict morphosyntactic agreement between the anaphor and its antecedent. Examples (2) and (3) illustrate strict anaphoric co-reference in Spanish. Note that the antecedent and the anaphor, both marked with a subscript, must agree in gender and number for the sentences to be grammatical.

- (2) [Un hombre]_i entró, pero no lo_i vi.
 a-masc.sg. man-masc.sg. entered but not him-masc.sg. saw-I
 'A man entered, but I did not see him.'
- (3) [Dos mujeres]_i entraron, pero no las_i vi.
 two women-fem.pl. entered but not them-fem.pl. saw-I
 'Two women entered, but I did not see them.'

Surprisingly, co-reference is possible between a neuter demonstrative anaphor and a left-dislocated nominal antecedent marked for gender, as shown in (4).

- (4) [Una casa nueva]_i, eso_i quiero (yo).
 a-fem.sg. house new-fem.sg. that-neut. want-I
 'A new car/a new house/ that you pass the exam. That is what I want.'

The neuter pronoun *lo* can also be found co-referring with noun phrases marked for gender in pseudo-cleft constructions, as in (5).¹

- (5) Lo_i que quiero es [una casa nueva]_i.
 it-neut. that want-I is a-fem.sg. house new-fem.sg.
 'What I want is a new house.'

¹ An anonymous reviewer raises doubts about the coreferential status of *lo* in pseudo-clefts such as (5). I believe this entirely depends on the approach to coreference one is willing to adopt. Under a strict account of anaphoric coreference, which prescribes agreement in gender and number between the antecedent and the anaphor, neuter pronouns can never be coreferential in Spanish since Spanish does not have neuter nouns. In a broader sense, however, any two expressions are coreferential if they refer to the same entity in the world, or in the discourse. In (i), for example, the antecedent expression 'los estudiantes de español' and the anaphor 'el grupo' in the second utterance refer to the same entity, but they do not strictly co-refer.

- (i) Los estudiantes de español querían visitar Barcelona. Esa misma tarde, el grupo entero compró los billetes de tren.
 'The students of Spanish wanted to visit Barcelona. The entire group bought the train tickets that evening.'

This is the approach to coreference that I adopt in this paper. In any case, the status of *lo* in free relative and pseudo-clefts constructions is still controversial. There are two main approaches to the syntactic nature of *lo* in the literature: (i) *lo* is a pronoun, (ii) *lo* is a determiner with a null noun. If one assumes that *lo* is a pronoun then it is safe to assume (at least in principle), that *lo*, as a head, is a referring expression like any other pronoun. Conversely, if one assumes that *lo* is a determiner with a silent nominal head, then it is also safe to assume that the complex [*lo* + silent noun] is a referring expression. Most authors who argue that *lo* is a determiner assume that its null or silent noun should be conceived of as something like *cosa* ('thing') given the neuter nature of the determiner. Under this view, a sentence such as *lo que quiero es una casa nueva* 'what I want is a new house' would be interpreted as *la cosa que quiero es una casa nueva* 'the thing I want is a new house'. But still in this case the silent noun 'cosa' and the NP 'una casa nueva' refer to the same entity. There are solid arguments in favor and against these two approaches, but a detailed discussion on the true syntactic nature of *lo* is beyond the scope of this paper. For the remainder of this paper, I assume that *lo* is always a pronoun.

Another puzzle can be found in pairs such as (6), where a salient, singular feminine entity (camiseta) can be referred to with either a neuter or a feminine demonstrative pronoun.² This use of the neuter to refer to a [+feminine] entity, when a feminine pronoun is also available, needs to be explained so as to provide a complete account of neuter reference.

- (6) [Holding or pointing at a T-shirt someone just gave me for my birthday]
- a. Ooh,**esto** me encanta.
 Wow, this-neut. me likes
 'Wow, I love this.'
- b. Ooh,**esta** me encanta.
 Wow, this-fem. me likes
 'Wow, I love this one.'

Another difficulty for an analysis of neuter reference based on either morphosyntactic features, such as gender and number marking, or based on the lack of individuation properties of the neuter, is the apparent possibility for neuter pronouns to refer to pluralities and collective individuals, as in (7)-(8). Because Spanish neuter pronouns only have a singular form, an anaphoric or coreferential reading should not be expected in these cases.

- (7) **Lo** que necesita tu oficina es/son dos sillas.
 it-neut. that needs your office is/are two chairs-fem.pl.
 'What your office needs is two new chairs.'
- (8) Una mesa y una silla, **eso** necesita tu oficina
 a-fem.sg. table and a-fem.sg. chair, that-neut.needs your office
 'A new desk and a new chair. That's what your office needs.'

In essence, individuation is a semantic notion that is closely related with the mass/count distinction. In short, the morphosyntax of nouns reflects countability, which in turn depends on individuability. For example, count nouns permitting plural markers (chair-

² I want to thank an anonymous reviewer for pointing out this example to me.

s, cat-s); modification by quantifiers that implicate plurality (many chairs, several cats); modification by cardinal quantifiers (two chairs, three cats); and not permitting modification by *much* (*much chair) pick out individuated entities. In principle, neuter forms should behave as mass nouns with regard to individuation properties.³

There have been different attempts at explaining neuter reference in Spanish. Leonetti (1999) argues that the contrast between neuter and non-neuter forms cannot be explained morphologically and he advocates for a semantic analysis instead. For example, he proposes that neuter forms can only denote [–human], [–person] or [–animate] entities. Similarly, Bosque and Moreno (1990) defined neuter *lo* negatively as a pronoun that refers to anything that cannot be referred to with the masculine *él* ‘he’ and feminine *ella* ‘she’ forms. Although this specification is fundamentally correct, it does not explain examples like (5) above, or (9), where a neuter demonstrative pronoun is used for reference to a [+human] [+feminine] individual.

- (9) **Eso** es una mujer, y **lo** demás son tonterías.
that-neut.is a woman and it-neut. rest are nonsense
‘That is a woman, and forget about the others.’

Leonetti also observes the ability of neuter pronouns to only denote uncountable, non-discrete entities. According to this author, this would explain why neuter pronouns lack a plural form and why they can never co-occur with the interrogative pronoun *cuál* ‘which’, which requires the individuation of its referent.

- (10) ¿{Qué/*Cuál} es **lo** que necesita?
what/which is it-neut. that you-need
‘What/Which one do you need?’

Analogously, Pomino and Stark (2009) argue that neuter pronouns are unspecified for the feature [individuation], while non-neuters will be positively specified for that feature. This means that neuter forms can denote from the entire universe of discourse, a view

³ See the work by Mufwene (1984), Bloom (1994) and Vossen (1995), and references therein, for more on individuation and the count-mass distinction from different theoretical perspectives.

shared by Ojeda (1993). Again, examples (4)-(8) pose a problem for analyses of neuter expressions as elements denoting [–**countable**] or [–discrete] entities unless a satisfactory explanation is provided. Likewise, analyses based on the [individuation] properties of neuter expressions such as Pomino and Stark’s cannot explain the motivation behind the use of a neuter pronoun in (6) and (9).

The data presented so far reveal a complex phenomenon calling for a unified treatment that takes into account the denotational and distributional properties of all neuter pro-forms. In this paper, I propose an account that combines both a semantic and a pragmatic analysis of their use. I frame my analysis of Spanish neuter pro-forms following the theory of definite expressions proposed by Roberts (2003) and based on two main assumptions. First, neuter pronouns have referential and non-referential ($NEUT_{ref} \sim NEUT_{non-ref}$) uses, a distinction that allows us to explain the presentational uses of pronoun *lo*. Referential expressions have reference; that is, they refer to participants (objects, events, sets, people, etc.) that are present/available in the discourse regardless of whether they physically exist or not. Conversely, non/referential expressions do not seem to refer to anything in the world, the discourse or to the discourse participants.

Second, all Spanish neuter pro-forms are semantically negatively specified as [–**individual**]; that is, neuter pronouns never denote individuals (entities of semantic type $\langle e \rangle$) in clear contrast with non-neuters, which are unspecified for the same feature.⁴ The semantic neutrality of neuter pronouns will thus be explained as the requirement for neuter pronouns to denote non-discrete, abstract entities of higher types such as propositions, events, properties, or sets of properties. For example, with the use of a neuter pronoun, the speaker is intentionally recategorizing the entity referred to in (4), (6) and (9) as a set of properties. The neuter pronoun can thus be thought of as an operator raising the type of the entity referred to from type $\langle e \rangle$ (individual) to type $\langle e, \langle e, t \rangle \rangle$ (a set of properties). Following Moltmann’s (2013) analysis for English presentational

⁴ In type theory, two basic semantic types are assumed, type e and type t , which are recursively used to define more complex types. Thus, type e is the type of entities in the world (individuals), whereas t is the type of truth values. The categories of syntax will correspond in a one-to-one fashion to semantic types. For example, proper names and definite expressions usually denote individuals (type e); a predicate such as ‘run’ denotes a function from individuals to truth values is of type $\langle e, t \rangle$, and so forth.

pronouns, I argue that the pronoun *lo* in (5) and (7) is a non-referential, presentational pronoun akin to non-referential neutral English ‘this/that’, French ‘ce’ or German ‘das’.

In this paper, I also claim that the Spanish neuter pronominal system should be extended to include a phonetically null neuter pro-form largely ignored in Spanish grammars to date. This null form will share the general specification proposed for all neuter forms. Consider examples (11) and (12). Here, the null pro-forms refer to a salient entity (a proposition or event) that is recovered from the previous discourse, or from the extra-linguistic context (example (11) is from Reig-Alamillo (2015); (12) is a slightly modified version of Depiante’s (2000) example (34)).

- (11) A: Juan ha rechazado el premio.
 John has rejected the prize.
 ‘John rejected the prize.’
 B’: **null-pro** es increíble.
 ∅ is unbelievable
 ‘It/that is unbelievable.’

- (12) [Javier is finally starting to write his final term papers, when Ana says:]
 ¡Yo también empecé **null-pro**!
 I too began ∅
 ‘I’ve started, too!’

The revised neuter pronominal system proposed (shown in Table 1) finds a close parallel in other Spanish personal pronoun paradigms.

	Distribution		Denotation	
	Subject	Object	Individual (type <e>)	Abstract (higher types)
Ello	YES	NO	NO	YES
Lo (referential)	NO	YES	NO	YES
Eso	YES	YES	NO	YES
Null-pro	YES	YES	NO	YES

Table 1. Modern Spanish neuter pronominal system.

Finally, I argue that a combination of the denotational and distributional differences observed, plus the contrast conveyed by some neuter pronouns, align with the hypothesis put forth in the Givenness Hierarchy (Gundel et al. 1993). Since I am dealing with expressions that share the same type of neuter reference and their descriptive and conceptual meaning rarely determines their intended referent, the Givenness Hierarchy will provide us with a theoretical framework to better understand how different neuter expressions differently encode the cognitive status of their referents.

2 Previous analysis on Spanish neuter denotation

There have been different attempts at characterizing neuter meaning across-languages. A good synthesis of these attempts can be found in Ojeda (1993). For example, Brøndal (1928) argues that the neuter is the most abstract of pronominal categories; Priestly (1983) takes impersonality as one of the distinctive traits of the neuter, and Klajn (1985) characterizes neuters as manifestations of indefinite reference stemming from its unmarked [–**fem.**/–**masc.**] nature, where ‘indefinite’ cannot be understood in the traditional sense. Jespersen (1954) proposed the mass-like reference of neuter pronouns, an idea later explored by Ojeda in relation with the Spanish neuter.

In Spanish, Fernández-Ramírez (1951:114), following Bello (1860), points out that the deixis of neuter pronouns is never nominal, and that they reproduce predicates and other neuter pronouns, or allude to facts or situations that have been mentioned in discourse by means of sentences. Bello already recognized the possibility of using a neuter pronoun to refer to a set of things (not people), be it as a unit or as a collective plurality (1860:295). More recent and detailed studies on neuter meaning in Spanish are the aforementioned studies by Bosque and Moreno (1990), Ojeda (1993), and Pomino and Stark (2009), which I discuss in more detail in the following paragraphs. Other studies of a pragmatic nature include those by Author (2008), which focuses on Spanish demonstrative pronouns, and Reig-Alamillo (2015) on propositional anaphora.

2.1 Neuter denotation as a free variable

Bosque and Moreno’s analysis (1990) focuses on neuter */o*. They argue that */o* is always a pronoun that refers to anything that cannot be referred to with the masculine and

feminine pronouns *él* (he) and *ella* (she). The denotation of *lo* is thus negatively defined. They acknowledge that the interpretation of referential expressions marked by *lo* must be inferred from the context or from the discourse participants' common ground, and they argue that *lo* is a free variable whose reference will be contextually determined. Crucially, the range of the variable (the set of values it can assume) represented by *lo* must be of a different category (neuter entities) than that of the variables for *él* (masculine entities) and *ella* (feminine entities). What this means is that the variables represented by neuter *lo* are variables with a restricted range, as proposed by Reichenbach (1980). For Bosque and Moreno there are three different types of *lo*. Hence, the pronoun can be represented by three different variable types: A. Individuating *lo*, B. Qualitative *lo*, C. Quantitative *lo*.

2.1.1 Individuating *lo*

According to Bosque and Moreno (1990), the variable represented by the individuating *lo* pronoun will range over non-human entities. The *lo* in (13) would thus denote a non-human individual or complex entity to which the property denoted by the adjective *malo* ('bad') is predicated. Apparently, this type of *lo* can only be accompanied by adjectives or PP's headed by the preposition *de* 'of', and the adjective or prepositional phrase following the pronoun restricts the range of the variable. For example, the denotation of the expression *lo malo* 'the bad thing' would translate as $\lambda P\lambda x(P(x))$, or the set of properties *P* such that *x* is *P* or, in other words, the entity in the intersection of the set of entities in the range of *lo* and the set of entities denoted by the adjective.

- (13) **Lo** malo es estartristesiempre.
 it-neut. bad is be sad always
 'The bad thing is being sad all the time.'

The combination [*lo* + *adj.* + *PP*] may denote a part, a particular aspect or characteristic of the entity denoted by the noun following the preposition, or a physical portion of it. Thus, *lo mejor de la película* in (14) would refer to a portion of the movie in question, such as the first thirty minutes indicated by the postcopula noun phrase.

- (14) **Lo** mejor de la película es la primera media hora.
 it-neut. mejor of the movie is the first half hour
 'The best part of the movie is the first half hour.'

As Bosque and Moreno point out, when the noun in the prepositional phrase is referential, the restriction imposed by the PP consists of establishing a relationship between the entities denoted by the pronoun and the entities denoted by the noun phrase (a relational denotation). Thus, *lo de Juan* is 'what is related to Juan' in (15).

- (15) **Lo** de Juan es incomprensible.
 it-neut. of John is incomprehensible
 'That (thing) about Peter is incomprehensible.'

The semantic subcategorization of the predicate (and the semantic selection in the case of adjectives) will further restrict the type of individuating *lo*. In (16) (example (15) in Bosque and Moreno (1990)), the predicate *ser posible* 'be possible' selects for facts or events, whereas the predicate *quemarse* 'to burn' selects for nouns that denote physical objects. Thus, *lo del coche es posible* can only receive a reading where it refers to a fact or event that is related with the car, whereas *lo del coche se quemó* can only receive a reading where it refers to some physical part of the car (i.e., the engine or the gas tank).

- (16) **Lo** del coche es posible/ se quemó.
 it-neut. of-the car is possible/ SE burned-it
 'That (thing) about the car is possible/burned.'

Clauses can also follow the preposition in constructions such as the one in (15). Although Bosque and Moreno do not consider them in their analysis, the pronoun in these constructions can never denote a part/portion, aspect or characteristic of the proposition denoted by the clause. Therefore, it appears safe to say that *lo* denotes a complete proposition. Notice that (18), without the pronoun, appears to convey exactly the same meaning as (17).

(17) **Lo** de que vas a llegar temprano me sorprende.
it-neut. of that you-are going to arrive early me surprises
'That you are going to arrive early surprises me.'

(18) Me sorprende que vayas a llegar temprano.
me surprises that are going-you to arrive early
'It surprises me that you are going to arrive early.'

Bosque and Moreno identified other possible denotations within their individuating type such as moments, locations and manners. As they point out, some of these forms are lexicalized. In (19), for example, the range of the variable is a set of times, and the meaning of *lo primero* would be 'the first position in a scale of time'; but we could also interpret this use as scalar in terms of importance, where *lo primero* would be highest point in a scale of importance.

(19) **Lo** primero es **lo** primero.
it-neut. first is it-neut. first
'First things first.'

The meaning of *lo mínimo* 'the minimum' in (20) can be explained along similar lines. For instance, in (18) the expression points to the lowest point in a scale in terms of quantities, though in other contexts it could indicate the lowest degree of importance, as in (21).

(20) **Lo** mínimo que consume un deportista son 3.000 calorías diarias.
it-neut. minimum that consumes a sportsman are 3,000 calories daily
'The least consumed by a sportsman is 3,000 calories daily.'

(21) **Lo** último que necesito es otro problema más.
it-neut. last that I-need is another problem more
'The last thing I need is yet another problem.'

The variable denoted by the pronoun ranges over locations in (22). In this example, the entire world can be understood as a set of geographical locations and the variable denoted by *lo* can be interpreted as ranging over the whole set of locations.

(22) Viajó a lo largo y ancho del mundo.
traveled-he to it-neut. long and wide of-the world
'He travelled around the world.'

The prepositional phrase *a lo grande* in (23) indicates manner of thinking or striving, and the variable denoted by *lo* in this expression would therefore range over ways of thinking or striving with the sense of having big/lofty goals.

(23) Piensa a lo grande y triunfarás.
think-you to it-neut. big and will succeed-you
'Think big and you will succeed.'

Finally, the idiomatic expression *por lo civil o por lo criminal* in (24) literally refers to two types of legal trials or legal actions (civil or criminal courts of justice). Metaphorically, it refers to taking action at all cost or by any means necessary. The *lo* in this expression would range over ways of taking action.

(24) Lo hará por lo civil o por lo criminal
it-neut. will-do by it-neut. civil or by it-neut. criminal
'He will do it by any means necessary/whatever it takes/at all cost.'

2.1.2 Qualitative *lo*

The second type of *lo* identified by Bosque and Moreno (1990) is qualitative *lo*, which is illustrated in (25) below. In cases of qualitative *lo*, the variable represented by the pronoun ranges over sets of properties. More precisely, the pronoun ranges over degrees of properties, and the denotation of *lo* takes the highest degree of that property as value, that is, a single property. The expression *lo difícil* would thus denote a unitary set of properties (a singleton). This set of properties is the result of the intersection of the set of properties denoted by the pronoun and the property denoted by the adjective.

(25) Me asusta **lo** difícil de la empresa.
me scares it-neut. difficult of the enterprise
'It scares me how difficult the enterprise is.'

However, the pronoun *lo* can be ambiguous between an individuating and a qualitative reading, judging from the two possible interpretations of (26). In the first reading, *lo hermoso* is a case of individuating *lo*, where the variable ranges over (non human) entities, and the adjective restricts that range. The expression *lo hermoso* would thus denote the individual part, or aspect, of the novel that is beautiful (for example, the first two chapters). In the qualitative reading, this sentence can be interpreted as denoting that Juan didn't perceive/understand the extent to which the novel was interesting.

(26) Juan no entendió **lo** hermoso de la novela.
Juan not understood it-neut. beautiful-masc.sg. of the novel

'Juan didn't understand what is beautiful about the novel.' → *Individuating reading*
'Juan didn't understand how beautiful the novel was.' → *Qualitative reading*

In summary, individuating *lo* and qualitative *lo* differ in the range of the variable denoted by the pronoun: individuating *lo* would range over non-human entities, whereas qualitative *lo* would range over sets of properties.

2.1.3 Quantitative *lo*

Finally, the variable represented by quantitative *lo* would range over sets of quantities, as in (27).

(27) Juan no trabaja **lo** suficiente.
Johnnot works it-neut. enough
'John doesn't work (hard) enough.'

As Bosque and Moreno (1990) argue, the quantificational force of the pronoun must be understood in a broad sense since it may encompass either quantity, but also degree of

perfectivity, or intensity of an action or process. For instance, the *lo* in (27) is ambiguous as it can be interpreted as indicating that either John does not work the number of hours required to accomplish a particular task, or that he does not work hard enough to accomplish the task.

Quantitative *lo*, like other quantifying neuter pronouns, can function both as an adjunct or as the argument of a predicate, with different denotations based on function. Thus, without further information from the context or the participants' common ground, the pronoun in (28) can receive up to three different interpretations (a-c).

(28) Juan come **lo** necesario.
John eats it-neut. necessary
'John eats what he needs.'

- a. Individuating: John eats the food that he needs (proteins, vitamins, etc.)
- b. Quantitative₁ (as argument): John eats the exact amount of food that he needs.
- c. Quantitative₂ (as adjunct): John eats the number of times he needs.

In the individuating reading (a), the *lo* in (28) denotes a non-human individual that John needs (for example, some spaghetti) of which it is predicated that John eats it. In the first quantitative reading, *lo* denotes the quantity of food that John needs (for example, to keep himself alive) of which it is predicated that John eats it. In other words, the quantity denoted by *lo* is the argument of the verb 'comer'. However, in the second quantitative reading, *lo* is interpreted as an adjunct (or adverbial expression) denoting the number of times that John eats (for example, John eats three times a day, where the argument of 'comer' is inherent).

2.2 The neuter as the most prominent element in the universe of discourse

In his analysis of semantic neutrality, Ojeda argues that the neuter is a category of the universal grammar, most commonly instantiated by pronouns cross-linguistically. In his work, he conceives a domain of discourse with a mereological (i.e., part-to-whole) structural relation where "the individuals in the domain of discourse are related as parts are related to wholes, where the parts are the instances and the wholes are the kinds"

(1993:7). Ojeda claims that the Spanish neuter can denote from E, the entire universe of discourse, whereas non-neuters can only denote from mereological portions of it; that is, their denotation is confined to the homomeric portion and, in some cases, to the atomic portion of the universe.⁵ This crucial difference can be observed if we compare the personal pronouns *él* and *ello*. The pronoun in (29) cannot refer to an heteromeric individual, while reference with neuter *ello* is fine in (30).

(29) $[[\acute{e}l]] = [[\text{the book with missing pages I just bought}]]$

$[[\acute{e}l]] = [[\text{the wine we just drank}]]$

$[[\acute{e}l]] \neq [[\text{the book with missing pages I just bought and the wine we just drank}]]$

(30) $[[\text{ello}]] = [[\text{the book with missing pages I just bought}]]$

$[[\text{ello}]] = [[\text{the wine we just drank}]]$

$[[\text{ello}]] = [[\text{the book with missing pages I just bought and the wine we just drank}]]$

(31) Aquí está [el libro con páginas de menos que acabo de comprar y el vino que acabamos de beber], pero más vale no hablar de **él/ello*].

'Here is the book with missing pages that I just bought and the wine that we just drank, but we'd better not talk about it.'

[From Ojeda 1993:171]

⁵ Ojeda proposes a mereological taxonomy of kinds, where: A is the set of atomic kinds; M is the set of atomistic kinds; H is the set of homomeric kinds and E is the set of all kinds (the universe of discourse); $M-A$ is the set of polyatomic kinds (= the difference between the set of atomistic kinds and the set of atomic kinds); $H-M$ is the set of atomless kinds (= the difference between the set of homomeric kinds and the set of atomistic kinds); $E-H$ is the set of heteromeric kinds (= the difference between the set of kinds and the set of homomeric kinds) (1993:163).

- (i) Homomeric kinds: Let E be a universe. Any $k \in E$ is homomeric if and only if it is either atomistic or atomless.
- (ii) Atomistic kinds: Let E be a universe and let \leq be its relation of instantiation. Any $k \in E$ is atomistic if and only if every $j \in E$ is such that $j \leq k$ implies that there is an atom a of E such that $a \leq j$.
- (iii) Atomless kinds: Let E be a universe and let \leq be its relation of instantiation. Any $k \in E$ is atomless if and only if no $j \in E$ is such that $j \leq k$ implies that there is an atom a of E such that $a \leq j$.

According to his analysis, the unstressed pronoun *lo* denotes the function which selects the greatest element of any subset of E (the entire universe), which has a greatest element (p.172). In other words, *lo* picks up the greatest element of any domain, regardless of the nature of that element. In *lo difícil de la empresa*, for example, the greatest element is that difficult aspect of the enterprise that scares me; in *lo mejor de la novela es el primer capítulo* the greatest element is that specific part the novel, and the greatest amount of food that is necessary in *Juan come lo necesario*. In his analysis, prominence is key for the semantic interpretation of the stressed pronouns. Thus, the stressed pronoun *ello* denotes the most prominent individual of the universe if the context provides such an individual (p.170). In quite the same line, the three demonstrative neuter pronouns denote the function which selects the most prominent (proximal/medial/distal) individual of any subset of E which has a most prominent (proximal/medial/distal) element (p.173). If we applied Ojeda's semantic representation to the combination of the demonstrative pronoun and the relative clause in (32) we would get the denotation in (33): the most prominent element in the set of (medial) propositions (I assume that propositions denote functions from possible worlds to truth values). Following Ojeda, Π is the function which selects the most prominent individual in a set. The double brackets $\llbracket \cdot \rrbracket$ stand for the denotation of the expression; more specifically, a function that maps a linguistic expression to its semantic value.

(32) **Eso** que me dijiste ayer me dolió.
 that-neut.that me said-you yesterday me hurt
 'What you told me yesterday hurt me.'

(33) $\llbracket \textit{eso que me dijiste} \rrbracket = \llbracket \textit{eso} \rrbracket (\llbracket \textit{que me dijiste} \rrbracket) = \Pi (R \cap M)$

Although Ojeda does not elaborate much on contextual prominence he points out two obvious ways in which an individual can be made prominent in a particular discourse: a) by being the individual most recently mentioned in discourse, and b) by being the individual pointed at by the speaker.

2.3 The neuter is unspecified for the feature [individuation]

Pomino and Stark (2009) propose that the feature [individuation] is key to explaining the neuter in Latin and its evolution into Modern Spanish. They focus their study primarily on neuter demonstratives, and argue that negatively defined semantic features such as [–animate], [–human], [–countable], or positively defined ones like [+abstract], [+propositional] are not able to fully account for the differences between the Spanish neuter and the masculine and feminine, an observation I agree with. None of the aforementioned features, individually or combined, can account for the semantic difference between *este* (this-masc.sg.), *esta* (this-fem.sg.), and *esto* (this-neut.) as they all can refer to inanimate or non-human objects. This is shown in (34) (p. 220), where the three demonstratives refer to inanimate or [–human] entities. As shown in (34a-b), the demonstrative can be used either as a determiner or as a pronoun. In the pronominal use, the nouns in parentheses would be left unexpressed by the speaker but referred to in the extralinguistic discourse context.

- (34) a. Este (coche) no me gusta.
this-masc.sg (car) neg. me-dat.1sg. like-pres.ind.3sg
'I don't like this {car/one}.'
- b. Esta (falda) no me gusta.
this-fem.sg. (skirt) neg me-dat.1sg. like-pres.ind.3sg
'I don't like this {skirt/one}.'
- c. Esto no me gusta.
this-neut.sg neg me-dat.1sg. like-pres.ind.3sg
'I don't like this.'

Similarly, as they point out, we can refer to semantic [+abstract] objects with the definite masculine and feminine articles as in *el absoluto* ('absoluteness'), *la nada* ('nothingness'), etc. Based on these examples, they claim that the Spanish neuter is to be identified with the semantic feature [individuation], for which neuter pronouns are simply unspecified, unlike masculine and feminine pronouns. As they define it, all expressions that denote countable and (sets of) discrete entities are positively specified for the feature [+individuated]. According to Pomino and Stark, although individuation is related to countability, "it does not exactly coincide with that concept" (p. 220), and they cite

Ojeda's (1993) definition of [individuation], namely, the denotation of sets (of sets) composed by discrete entities, the set with only one element being included. In their account, the Spanish neuter pronouns would therefore refer to [non-individuated] entities like propositions, and other abstract and uncountable objects. This idea is illustrated with examples (35a-b).

- (35) a. **Lo** que me trajiste. [∅ individuation]
 it-neut.sg that me-dat.1sg. bring-past.ind.2sg
 'What you brought me.'
- b. **El** que me trajiste. [+ individuated]
 the-masc.sg that me-dat.1sg. bring-past.ind.2sg
 'The one you brought me.'

The rationale behind Pomino and Stark's hypothesis is that plurality presupposes individuation. Because neuter pronouns are not morphologically marked for plurality they must be unspecified for [individuation], whereas feminine and masculine ones are always [+ individuated]. Their analysis is primarily morpho-phonological and heavily constrained by conceptual categories by way of a morphosyntax-semantics mapping. In the end, however, they leave the door open to the possibility of reference to discrete and sets of discrete entities via neuter pronouns when they point out: "Spanish 'neuter' pronouns (and maybe also nouns) simply seem to be unspecified for the feature [individuation]. They may, but do not have to, refer to (sets of) discrete individuals, whereas masculine and feminine pronouns always refer to individuals or groups of individuals" (p. 224).

3 Definiteness and the uniqueness effect

Following the work by other authors (Heim 1982; Kadmon 1990) I assume that pronouns are a species of definite descriptions. More precisely, I adopt a slightly modified version of Roberts' (2003) pragmatic theory of pronouns as definites in which pronouns share most of the characteristics with definite descriptions of the type 'The King of France'. For Roberts, the *uniqueness* effect commonly associated with definite expressions is not semantic (a logical entailment or a conventional implicature) but pragmatic

(presupposed); that is, subject to pragmatic inference. Under this view, context is key in processing definite expressions in, for example, definite descriptions without overt NP antecedents, bridging inferences involving definite descriptions, and similar cases that cannot be explained on semantic entailment grounds only. Another crucial point in Roberts' account is that definite NPs also display *familiarity* presuppositions, an idea initially proposed by Heim (1982), and further developed by Roberts.⁶ In short, familiarity means that all definite NPs must have antecedents, understanding antecedents as discourse referents in the discourse context. Familiarity is then split into strong and weak familiarity, of which only weak familiarity is relevant for definite expressions. As Roberts puts it (p. 306): "Weak familiarity only requires that the existence of the relevant entity be entailed by the interlocutors' common ground. Such existence entailments by themselves are sufficient to license introduction of a discourse referent into the discourse context." This idea about familiarity is also particularly important for a pragmatic account of definite expressions as it assumes that these do not need to be strictly anaphoric (strongly familiar), but merely referential, in order to be felicitous.⁷ This is shown in (36), where the neuter demonstrative naturally refers to a salient entity in utterance context and no NP is present in the previous discourse. Of course, neuter pronouns most commonly refer to overt genderless antecedents, such as propositions, as in (37), which is a case of strong familiarity.

(36) [John referring to a loud noise coming from outside]

¿Qué ha sido **eso**?
 what has been that-neut.
 'What was that?'

(37) A: Juan va a terminar su Phd en mayo.

Johngoesto to-finish his Phd in May

B: **Eso** lo dudo.
 that-neut.it-neut. doubt-I
 'THAT I doubt.'

⁶ Familiarity would be the presuppositional equivalent to Russell's (1905) existence entailment.

⁷ See Roberts (2003) for details on her taxonomy of familiarity.

The notion of familiarity led Roberts to propose that the uniqueness presupposition associated with definite expressions is *informational uniqueness*; that is, the requirement that sufficient information has been given to uniquely identify the intended discourse referent antecedent among all those in the common ground of the interlocutors. In the case of definite descriptions, the information is mainly given by the descriptive content of the common noun accompanying the definite article.⁸ Roberts treats pronouns as definites, but she argues that pronouns differ from definite NPs in that the former are subject to a version of informational uniqueness: the antecedent (familiar discourse referent) of a pronoun “must be maximally salient in the context of utterance” (p. 321). The presuppositions of pronouns are shown in (38).

(38) Presuppositions of pronouns (informal) (Roberts 2003:330)

Given a context C , use of a pronoun Pro_i presupposes that it has as antecedent a discourse referent x_i which is:

- a) Weakly familiar in C ,
- b) Salient in C , and
- c) unique in being the most salient discourse referent in C which is contextually entailed to satisfy the descriptive content suggested by the person, number and gender of Pro_i .

Thus, the main contrast between pronouns and definite noun phrases is that the former require a discourse referent that is highly salient while definite NPs do not. This is a widely acknowledged functional contrast in the field of anaphora resolution today (see, for example, Grosz et al.'s [1995] *Centering Theory*). As definite expressions, Spanish neuter pronouns can also be explained along these terms: they presuppose uniqueness, weak familiarity and salience of their referents.

⁸ Informational Existence and Uniqueness of Definite NP's (informal) is defined by Roberts (2003:308) as follows:

Given a context C , use of a definite NP_i presupposes that it has as antecedent a discourse referent x_i which is:

- a) Weakly familiar in C , and
- b) unique among discourse referents in C in being contextually entailed to satisfy the descriptive content of NP_i .

4 Neuter pronominal reference in modern Spanish

This section explores the distributions and general referring properties of the Spanish neuter pro-forms individually. In section 4.1, I argue that the neuter form *lo* is a pronoun with either a referential or a non-referential use. I provide an account of non-referential *lo* that closely follows Moltmann's (2013) previous semantic account on English presentational pronouns. Section 4.2 discusses the different referential uses of neuter demonstrative pronouns. I argue that neuter demonstrative pronouns present the ability to refer to tropes (sets of properties) in the sense of Moltmann (2013); an ability that allows an explanation of some of the puzzling cases of neuter reference with demonstratives presented so far. Finally, in Section 4.3 I discuss the status of null neuter pronouns as vehicles of neuter reference in Spanish, and provide evidence in favor of including null pronouns in any account of the Spanish neuter pronominal system. Following Depiante's work (2000, 2001), I also argue that the null pro-form in Null Complement Anaphora (NCA) is actually a neuter pro-form and that it should be included in the inventory of Spanish neuter pronouns.

4.1 Ello/Lo

The neuter form *lo* has been the subject of intense debate as to whether it should be considered a pronoun (Bello 1860[1981]; Luján 1980; Ojeda 1982, inter alia), or an article (Contreras 1973; Plann 1980). In this paper, I assume, following the most widely accepted view today, that the so-called neuter *lo* is a weak pronoun. I argue that neuter *lo* has two different uses, namely: a referential/anaphoric use and a non-referential use. In its referential use, neuter *lo* can never refer to discrete individuals, only to entities of higher types such as propositions, events, and properties.

Distributionally, referential neuter *lo* can be an accusative pronoun (39), a relative pronoun (40), and a pro-predicative pronoun that reproduces any predicate regardless of gender and number (41).

- (39) Juan ha renunciado al premio. Ya te lo dije.
John has renounced to-the prize. Already to-you it-neut. said-I

'John has rejected the prize. I told you that already.'

- (40) Juan ha renunciado al premio. **Lo** cual es increíble.
John has renounced to-the prize. it-neut. which is incredible
'John has rejected the prize, which is incredible.'

- (41) Dicen que María es muy lista. Y, de hecho, **lo** es.
say-they that Mary is very smart and of fact it-neut. is-she
'They say Mary is very smart. And in fact she is (that).'

However, it cannot appear in subject position (42), an indication of its nature as a weak pronoun with the stressed counterpart third person singular neuter pronoun *ello* ('that'). And although the strong form *ello* is rarely seen in subject position in modern Spanish, it still is used in formal written registers (43). It seems that *ello* has almost been entirely replaced by either demonstrative pronouns or null-proforms in colloquial speech.⁹

- (42) Juan ha renunciado al premio. ***Lo** es increíble.
John has renounced to-the prize. it-neut is incredible
'John has rejected the prize. That is incredible.'

- (43) Juan ha renunciado al premio aunque **ello/eso** no representa
John has renounced to-the prize although it-neut./that-neut. not represent a una
ofensa para la academia.
an offense for the academy
'John has rejected the prize, but that doesn't mean an offence to the academy.'

The non-referential *lo* is the one that we find in structures such as (44).

- (44) a. **Lo** que me pediste fue un/el libro.
b. **Lo** que necesitas es a tu padre.

⁹ Besides subject position, the pronoun *ello* can also be found in other syntactic constructions, where it is more frequent, and mainly competing with the medial neuter demonstrative *eso* 'that'. Thus, *ello* can be found as the object of a preposition *por ello/eso* ('about/because of that'), *de ello/eso* ('of/about that'), *para ello/eso* ('for that'), etc., a context restricted to strong pronouns.

The pronoun in these constructions will be explained following Moltmann's (2013) analysis for English identificational sentences and certain types of specificational sentences, with some differences in my analysis. Moltmann argues for a similar semantic account for the presentational 'that' in (45) and the free relative in (46), which he labels 'exceptionally neuter free relatives' because "they are formed with a neutral wh-pronoun even though they appear to describe a person" (p. 65).

(45) **That** is a beautiful woman.

(46) **What** I saw was Mary.

Presentational pronouns are common in other languages like French 'ce' or German 'das'. The principal characteristic of presentational pronouns is that they are not referential terms; that is, they do not refer to the postcopula NP, and for that reason they must be distinguished from the neutral anaphors 'that/this' and 'it'.¹⁰ Presentational pronouns can be discourse-related, as in (47), or presuppose a perceptual presentation of an individual, as in (45) and (46) but, crucially, they are all neutral with respect to the gender of the individual they appear to pick out (p. 45).

(47) Someone entered. **It** was the same man as had entered yesterday.

Presentational pronouns satisfy the uniqueness condition of definites and, although they pick out a unique individual in the context, that does not mean that they refer to that individual. Moltmann argues that presentational pronouns and exceptionally neuter free relatives, relate to some perceptual feature in the non-linguistic context: a trope. A trope is defined by Moltmann as a concrete entity, an object of perception that depends on a particular bearer (the object bearing the feature), but it can also be defined as a quality

¹⁰ There are several criteria that appear to indicate that presentational pronouns are not referential: coordination, incompatibility with ordinary variables, tag questions, and the interpretation of modals, among others. See Moltmann (2013) for further discussion.

or attribute.¹¹ Although there are differences between presentational and identificational sentences there are many similarities, too, and presentational pronouns and *wh*-clauses in specificational sentences seem to share the same kind of denotation. Like presentational pronouns, the trope described by an exceptionally neuter free relative is not the denotation of the free relative, but it helps identify it. She distinguishes a referential denotation (the trope that is the argument of the perception verb) and a presentational denotation (a function that maps an epistemically possible world to the bearer of the maximal trope, or the sum of bearers of that trope in case the postcopula NP is plural). Using this double semantics, the neutrality of presentational pronouns can be explained as follows: the gender of the pronoun is not interpreted at the stage of its presentational denotation, but at the stage of its referential denotation.

There are, however, some differences between the exceptionally neuter free relatives analyzed by Moltmann and the free relatives with neuter pronouns that I am analyzing for Spanish. Note that in her analysis the verb of exceptionally neuter free relatives is a verb of perception (visual, tactile or auditory) such as 'notice', 'see', 'touch', 'run into', 'perceive', etc. Also, the postcopula NP in exceptionally neuter free relatives refers to a person. This is not necessarily the case with Spanish free relatives with a neuter pronoun, an indication that a trope -conceived of as an object of perception- is not necessarily involved in the referential denotation of the neuter pronoun. My claim is that the neuter pronoun in Spanish free relatives of the identificational type does not have a referential denotation, but only a presentational denotation. Because there is no referent at the time of interpreting the pronoun there are no relevant pronominal features that can be evaluated and the neuter pronoun is chosen by default. The function of the pronoun would thus be just presentational denoting a function mapping a possible world to the argument of the verb in postcopula position, and regardless of the referent in the postcopula (an individual, a collectivity, a proposition), as in (48a-d).¹²

¹¹ See Lowe (2008) for further discussion on tropes.

¹² Following Moltmann's analysis, presentational pronouns pick out an entity although do not refer to that entity in the traditional sense. Based on this assumption, it is difficult to determine whether non-referential *lo*, for example, shares the presuppositions for definite expressions indicated in Section 3, namely,

- (48) a. Lo que necesitas es un amigo.
¿No es **eso**/*ese?
- b. Lo que me pediste fue una silla.
¿No fue **eso**/*esa?
- c. Lo que necesitas es una silla y una mesa.
¿No es/*son **eso**/*esas?
- d. Lo que me pediste es que trajera vino.
¿No fue **eso**?

This proposal follows closely Moltmann's analysis for exceptionally neuter free relatives with a definite expression as in (49a-b) (p. 70)

- (49) a. That is the mayor of Cambridge.
b. What I saw is the mayor of Cambridge.

Note that the Spanish free relatives analyzed here coincide with English exceptionally neuter specificational sentences in various ways. For example, a neuter pronoun in tag questions is normally required for anaphoric reference to the postcopula material in these free relatives. The proposal that the neuter pronoun heading these free relatives does not have reference explains why the postcopula material, regardless of their semantic denotation, does not conflict with the [– individual] semantic feature specification I have proposed for Spanish neuter pronouns. Crucially, the neuter pronoun in the tag questions of (48a-d) does not refer to the postcopula material, but to the proposition denoted by the entire previous sentence, that is [that you need a friend/a chair/a table and a chair].¹³ Furthermore, my claim that *lo* in free relatives is a non-

informational uniqueness, weak familiarity and salience. I think that non-referential *lo* does not carry the presuppositions of referential definite expressions.

¹³ As pointed out by an anonymous reviewer, the tag question in (45b) can also be interpreted as coreferential with the postcopula NP as in, for example, ¿no fue eso lo que me pediste? apparently referring to the postcopula individual. According to my proposal this is not possible since the use of the neuter demonstrative would recategorize the entity referred to as a set of properties. See Section 4.2 for further details.

referential pronoun can be applied to most of the cases identified by Bosque and Moreno in their analysis of neuter *lo*, in particular type 1 ‘individuating *lo*’. Thus, I argue, following my semantic specification for neuters as [– individual] pronouns, that neuter *lo* can never be individuating, and that the pronoun that we find in the alleged individuating examples (13), (14) and (20), repeated here as (50)-(52) is, in fact, the non-referential neuter *lo* with a presentational denotation.

(50) **Lo** malo es estar triste siempre.

it-neut. bad is be sad always

‘The bad thing is being sad all the time.’

(51) **Lo** mejor de la película es la primera media hora.

it-neut. mejor of the movie is the first half hour

‘The best part of the movie is the first half hour.’

(52) **Lo** mínimo que consume un deportista son 3.000 calorías diarias.

it-neut. minimum that consumes a sportsman are 3,000 calories daily

‘The least consumed by a sportsman is 3,000 calories daily.’

Thus, the type of *lo* that Bosque and Moreno analyzed as denoting parts, portions, relations, moments, or locations, is a *lo* in non-referential use that is chosen by the speaker by default because, at the time of utterance, there are no pronominal features that can be evaluated. This, of course, does not mean that non-referential *lo* does not have a function. It is a presentational pronoun that denotes a function mapping a possible world to the postcopula material.

4.2 Neuter demonstrative pronouns

Neuter demonstrative pronouns are typical vehicles of anaphoric reference to propositions, events, properties, etc. However, as deictic words, they have some special properties, both distributionally and referentially (Author 2008).¹⁴ Although neuter

¹⁴ I am using the medial form *eso* ‘that’ in all my examples to simplify the discussion, but any other neuter demonstrative form (proximal *esto* ‘this’ and distal *aquello* ‘that’) can be used in the same contexts.

demonstratives can be subjects, a neuter null proform is preferred in this position, as in (53).

- (53) Juan ha renunciado al premio. ?Eso/null es increíble.
John has renounced to-the prize. that-neut./null is incredible
'John has rejected the prize. It is incredible.'

Neuter demonstrative pronouns can also be direct objects, but referential neuter *lo* is preferred with this function (54).

- (54) Juan ha renunciado al premio. Ya te comenté ?eso/?null.
John has renounced to-the prize. Already to-you commented-I that-neut.
'John has rejected the prize. I told you that already.'

The felicity of the demonstrative as a direct object improves though when it is moved to the left periphery of the sentence as a dislocated element, and it is reduplicated with the referential neuter pronoun *lo*, as in (55). Overall, referential neuter *lo* seems better suited to be the internal argument of verbs.

- (55) Juan ha renunciado al premio. Eso ya te lo
John has renounced to-the prize. that-neut.already to-you it-neut.
comenté.
commented-I
'John has rejected the prize. I told you that already.'

The problematic cases that I presented in the introduction require an explanation that is consistent with the analysis offered for other neuter pronouns. What I propose for the neuter demonstratives in (56) and (57) is that they are referential, but they do not refer to the individual denoted by the postcopula material (53), or to the individual denoted by the left dislocated NP (54). Following Mikkelsen's (2005) treatment of English identificational/equative sentences, I argue that the neuter pronoun in these examples

However, this does not mean to imply that the three neuter demonstrative forms share the same meaning. For reasons of space, I refer to Author (2016) for more on this subject.

refers to a maximal property (or a maximal set of properties) of type $\langle e, \langle e, t \rangle \rangle$, or a trope in the sense of Moltmann (2013).¹⁵

(56) **Eso** es una mujer, y lo demás son tonterías.
that-neut.is a woman and it-neut. rest are nonsense
'That is a woman, and forget about the others.'

(57) Una mala persona, **eso** eres tú.
a-fem.sg. bad-fem.sg. person that-neut.are you
'A bad person, that is what you are.'

This analysis is compatible with the referential behavior of the so-called pro-predicative *lo* in (58), referring to a property.

(58) Soy alto, y tú también **lo** eres.
am-I tall and you too it-neut. are
'I am tall, and so are you.'

When a speaker uses a neuter pronoun for reference to entities marked for gender he is recategorizing the entity referred to as something indeterminate, and not fully individuated; that is, as a property or set of properties. The demonstrative neuter pronoun can thus be conceived of as an operator raising the type of the entity referred to from type $\langle e \rangle$ (individual) to type $\langle e, \langle e, t \rangle \rangle$ (a set of properties). And this is the case for discourse-related (59), and non discourse-related uses of neuter demonstratives (60).¹⁶

¹⁵ The structure in (56) -consisting of a demonstrative subject, equative syntax (and semantics), and a postcopular constituent- is generally analyzed within the larger context of equatives/specificational sentences and their pragmatic constraints. These, and similar structures, have been studied at length and researchers have come up with different classifications based on their claimed properties: predicational, specificational, equative, identificational. There is controversy as to whether the demonstrative pronoun in structures like that should be analyzed as denoting an individual (type e) or a property (type $\langle e, t \rangle$). Lack of space prevents me from elaborating on the discussion, but I suggest the work by Birner, Kaplan and Ward (2007), and references therein, for a detailed analysis.

¹⁶ See Peterson (1997), for whom superficial pronoun-to-antecedent relationships (i.e., syntactic coreference) do not require semantic coreference.

(59) Una/la/mi mochila, **eso** necesito para la excursión.
a-fem.sg./the-fem.sg./my backpack that-neut.need-I for the excursion
'A new backpack, that is what I need for my trip.'

(60) [Holding or pointing at a T-shirt someone just gave me for my birthday]

- a. Ooh,**esto** me encanta.
Wow, this-neut. me likes
- b. Ooh,**esta** me encanta.
Wow, this-fem. me likes
'Wow, I love this (one).'

As deictic elements, demonstratives can be used to refer deictically to any extralinguistic entity (discrete or non-discrete). The use of a demonstrative always implies a contrast (Scott, 2013), and serves to pick and single out an entity in order to make it more prominent; a function that other definites generally lack. Neuter demonstratives also pick and single out entities; however, as neuter pronouns, they shift a discrete entity into an abstract entity such as a perceptual property or group of properties. For example, by pointing at a luxury sports car passing by, a speaker may utter (61) in order to refer to the car's unique set of properties (being sporty, fast, etc.), and make it more prominent.¹⁷

(61) **Eso** es un cochazo.
that-neut.is a car
'That's a flashy car.'

¹⁷ Linguistic prominence (understanding prominence as salience) can be expressed in a variety of ways. We have seen that prominence can be equated with uniqueness (i.e., a referent is prominent by virtue of being the only entity in the context that is entailed to satisfy the descriptive content of a definite expression). But it can also be expressed syntactically. Thus, certain structural positions within the sentence (subject) are considered to be more prominent than others (object). The same can be applied to some specific constructions with regard to information structure articulation (see, for example, Villalba and Bartra-Kaufmann (2010) and Ziv (1994) on salience and discourse anaphora). On the other hand, prominence can be non-linguistic in a variety of ways. Thus, for example, an object can be made salient by pointing to it, as in deixis; by virtue of being a topic of discourse, or by being in the focus of attention of the interlocutors.

Consider a situation where the speaker had to teach new concepts/words in Spanish to a new learner of Spanish as a second language. Holding a book in your hand, for example, he would surely utter (62), but never (63). The speaker would initially refer to the book as a set of perceptual properties, and give it a name afterwards.

(62) **Esto** es un libro.
 this-neut. is a book

(63) **#Este** es un libro.
 this-masc. is a book
 'This is a book.'

4.3 Neuter null pronouns

A close observation of different pronominal paradigms reveals clear distributional parallelisms between neuter and non-neuter systems. As a pro-drop language, Spanish allows for phonetically null pronouns to fill syntactic positions. Compare the use of a null-pro and a full pronoun in subject position in (64) –both referring to the subject in the previous sentence (the individual named 'Juan')- with the null-pro and demonstrative pronoun in subject position in (65) –both referring to the proposition denoted by the previous sentence 'that John rejected the prize.'

(64) Juan ha rechazado el premio. **null-pro/él** no estaba conforme.
 John has rejected the prize. Ø/he not was satisfied
 'John rejected the prize. He was not satisfied.'

(65) Juan ha rechazado el premio. **null-pro/eso** es increíble.
 John has rejected the prize. Ø/that is unbelievable
 'John rejected the prize. It/that is unbelievable.'

Similarly, it seems that the null-pronoun can also be used for reference to events - provided that the infinitival clause in the first conjunct of (66) denotes an event or event-type, and not a proposition. What these examples show is that reference to genderless entities with null-pro's in subject position is common in Spanish.

(66) Juan vio nacer a su hijo. **null-pro/eso/** fue increíble para él.
 John saw be-born to his child. \emptyset -neut. was incredible for him
 'John saw how his child was born. That was incredible to him.'

Although null objects are restricted to mass nouns and bare plurals in standard Spanish (67)-(68), this does not seem to be the case across all Spanish varieties. Recent research has shown that in the Buenos Aires variety, and in some contact varieties such as Ecuador, Basque Spanish, and Paraguay, monolingual and bilingual speakers use null object pronouns with definite reference (see Reig-Alamillo 2015, and references therein).

(67) Me gusta ese vino, pero ya no quiero más **null-pro**.
 me like-I that-masc.sg. wine but already not want-I more \emptyset
 'I like that wine, but I don't want any more.'

(68) Juan necesitaba lápices, pero no encontró **null-pro**.
 John needed pencils but not found-he \emptyset
 'John needed some pencils but he couldn't find any.'

In a similar vein, Reig-Alamillo (2009, 2015) has shown that reference to genderless entities (propositions) with null object pronouns is common in Peninsular and Mexican Spanish. However, as she points out (2015: 964), the phenomenon seems to be lexically restricted to some cognition and communication verbs: "The alternation between the propositional /o and the null pronoun described here is lexically restricted, i.e., not every verb that takes a sentential complement, nor all the cognition and communication verbs in Spanish, allow the null object." An example of a null direct object pronoun co-referring with a proposition that is recoverable from the previous sentence is shown in (69).

(69) Juan ha rechazado el premio. Ya te **null-pro/lo** comenté.
 John has rejected the prize. Already you-DAT \emptyset commented
 'John has rejected the prize. I told you (that) already.'

There are clear parallelisms between the denotational and distributional characteristics of null complement anaphora (NCA, henceforth) and other neuter pro-forms. Based on these similarities, I claim that NCA should be included in the inventory of Spanish neuter pro-forms and, in doing so, I will assume, following Depiante (2000, 2001), that NCA is a null pro-form: the null counterpart of English 'it', or Spanish and Italian *lo*. "In all respects, NCA behaves like a null sentential/clausal pro-form. Sentential pro-forms such as 'it' behave like pronouns in all respects. They are deep anaphors." (2000: 74) Consider (70) where the null pro-form refers to the infinitival complement of the main verb: *pro-form = evitar el accidente*. I also claim, contra Reig-Alamillo, that null direct object pronouns and NCA pro-forms are different manifestations of one and the same null-pronoun.¹⁸

(70) Juan intentó evitar el accidente pero no pudo **null-pro**.
 John tried avoid the accident but not could-he \emptyset
 'Juan tried to avoid the accident but he couldn't.'

Like other referential neuter pronouns, NCA pro-forms presuppose that their referent is unique, salient in the speech situation and entailed by the interlocutors' common ground (weakly familiar), that is, NCA pro-forms are not necessarily anaphoric. Although there is no explicit antecedent in the previous discourse, the reference of the pro-form can be interpreted as *pro-form = to write my final term papers* in (71), and *lo = to complete that puzzle* in (72)

(71) [Javier is finally starting to write his final term papers, when Ana says:]
 ¡Yo también empecé **null-pro**!
 I too began \emptyset
 'I've started, too!'

¹⁸ Reig-Alamillo claims that null objects differ from NCA in that the former: 1) are not complements of the same type of verbs as NCA; 2) they are coded as finite clauses, and 3) they are in variation with the pronoun *lo*. In my view, all null forms (the one that can be found in subject position, the one in object position and NCA) are one and the same pro-form, covering a range of denotational possibilities typical of other neuter pronouns. This neuter null pro-form differs from the non-neuter null form (see (64), which crucially, denote individuals. Whether or not some predicates allow for both null pronouns and the referential neuter *lo* will entirely depend on lexical issues but not on the nature of the pronoun.

(72) [Javier is making an effort to complete a 500-piece puzzle, when Ana says:]

Tú solo no lo conseguirás.
you alone not it-neut. obtain-you will
'You won't complete it on your own.'

Another parallelism between NCA and neuter pronouns lies in their ability to restructure clausal antecedents. Because strict syntactic parallelism is not required, the linguistic antecedent does not have to be identical to what it is actually 'recovered' by the pronoun. In (73), for example, the reference of the pronoun in the second conjunct is not identical to the proposition *que alguien lo explicara*, the propositional antecedent is restructured as the preterite form *hizo*. In (74), the linguistic antecedent of the neuter null-pro is *ser vacunado* 'be vaccinated', but the null complement of the verb *querer* can only be interpreted as *vacunarlo* 'vaccinate the dog'.

(73) Era necesario que alguien lo explicara, y Juan lo hizo.
was-it necessary that someone it-neut. explain and Juan it-neut. did
'Someone needed to explain that, and Juan did it.'

(74) Este perro debe ser vacunado, aunque su dueño no quiera null-pro.
this dog must be vaccinated, although its owner not want-he Ø
'Although its master doesn't want to, this dog must be vaccinated.'

Like other neuter pronouns, NCA pro-forms can refer to a variety of clausal antecedents, including questions as complements of certain predicates, which indicates that the semantic selection properties of the predicate are important in determining the type of reference in NCA. In fact, Bosque (1984) and Bruccart (1999) have identified several classes of predicates that select NCA, namely, modal and aspectual verbs, verbs that express attitude, and causatives. And most important for the purposes of this paper is the observation by Bruccart, later confirmed by Depiante, of an incompatibility between

neuter /o and NCA whereby, generally, predicates tolerating /o do not tolerate NCA, and vice versa.¹⁹

Based on the observed evidence, and the proposed status for NCA as a pro-form, Depiante argues that this null pro-form will semantically behave as a definite pronoun; a free variable, that gets its interpretation in the linguistic or non-linguistic context, which reflects its double nature as a direct and indirect anaphor. Like neuter /o, the free variable that NCA contributes cannot be interpreted nominally, that is, the variable will never be of semantic type ⟨e⟩, but of semantic types ⟨s, ⟨e,t⟩⟩ for properties, ⟨s,t⟩ for propositions, and ⟨⟨s,t⟩, t⟩ for questions, depending on the type of predicate that selects the pronoun (2000:78).

Additionally, I argue that NCA null-pro's may co-refer with groups of propositions and events, as in (75).

- (75) Le pedí a María que regara las plantas y que cogiera el
to-her asked-I to María that watered the plants and that picked the
correo durante mi viaje, pero no quiso **null-pro**.
mail, during my trip but not wanted-she ∅
'I asked Mary to water my plants and pick my mail during my trip, but she didn't want to.'

Collective reference seems possible with all Spanish neuter pronouns. Bello already recognized the possibility of using a neuter pronoun to refer to sets of things but not people, be it as a unit or as a collective plurality (1860:295). I agree with Bello's observation that neuter pronouns may denote sets. Asher (1993) argues that events can be summed to yield new events, but he acknowledges that there are differences with summation in the domain of individuals. For example, a sum of events cannot be referred to with a plural pronoun in the way a sum of individuals can. The pronoun 'they' in (76) can only refer to the group of three individuals that raised the flag, but not to the group of three 'flag-raising' events, whereas the pronoun 'it' can refer to the group of

¹⁹ The cases of alternation {null ~ lo} for propositional referents described in Reig-Alamillo (2015) with some communication and cognition verbs pose a problem for a unitary account of null pronouns in Spanish. In my view, elliptical mechanisms may be at work here, but this is an issue that I will not deal with in this paper.

events. This restriction of plural pronominal reference to sums of events would make event expressions similar to mass nouns.

(76) Three men raised_i the flag of the republic. *They_i/it_i/those events_i took the ruling junta by surprise.

Asher argues that the domain of propositions also has a structure, and he finds striking coincidences between the domain of events and the domain of propositions, which indicates that both domains share similar summation principles. For example, individual sentences in a text may combine to form a proposition that is the anaphoric referent of a neuter pronoun or definite description, as in (77) (From Asher 1993). See also Author (2018) for a detailed analysis of discourse anaphoric reference to groups of higher-order entities.

(77) The liberation of the village had been bloody. [Some of the Marines had gone crazy and killed some innocent villagers. To cover up the “mistake”, the rest of the squad had torched the village, and the lieutenant called in an air strike.]; At first the battalion commander hadn’t believed it.

These summation principles for events and propositions provide a plausible explanation for the observed reference to groups of propositions and events in Spanish. An analogue summation principle, and derived collective reading for the pronoun, can be proposed for examples like (78). If we assume that neuter pronouns allow for mass-like readings, akin to Ojeda’s reference to heteromeric individuals, then reference to the collectivity formed by summing up individual referents is fine provided that these individual referents can be integrated into a coherent whole. In (78), the resulting interpretation of the collective denotation would be something like ‘some camping gear’.

(78) Una cantimplora y una mochila, **eso** necesito para el camping.

Depiante’s proposal on the semantics and referential behavior of NCA is fully compatible with my proposal on Spanish neuter pronouns as definite expressions with a semantic specification as [– individual]. My claim is that there is a neuter null pro-form in Spanish, which can be used in subject and object position, and sharing the same semantic specification as other neuter pronouns. This neuter null pro-form is a definite expression

that presupposes that its referent is salient, weakly familiar and unique. The neuter null pro-form is to be distinguished from the null pro-form that denotes individuals and that generally alternates with the first and third person masculine/feminine full pronouns.²⁰

5 Discussion

Neuter pronouns are typical vehicles of discourse anaphoric reference to entities unmarked for gender, mostly because they are not nominally but clausally introduced in discourse. Also, Spanish neuter pronouns do not have plural forms. Based on these two observations, we may be tempted to define neuter pronouns as words negatively specified for the features [– masc./– fem.] and [– plural], a definition consistent with Roberts' presuppositional definition of pronouns (the underscore is mine).

(79) [The discourse referent of Pro_i is] unique in being the most salient discourse referent in C which is contextually entailed to satisfy the descriptive content suggested by the person, number and gender of Pro_i.

However, the whole picture is not that simple. Superficially at least, neuter pronouns can be nominal anaphors as we have seen in previous sections, hence a definition based on morphosyntactic features does not work, and neuter pronouns are best understood in semantic terms.²¹ Different conceptual specifications have been proposed for neuters. Consider, for example, the conceptual specification [+ abstract], based on denotation of the entities most commonly referred to with neuter pronouns such as properties, propositions, events, etc. The problem with such specification is that it is vaguely defined, and important questions remain unanswered: Does 'abstract' refer to denotations that pertain to the mass domain? Or is it related to individuation properties? But most importantly, the [+ abstract] specification does not make a clear-cut distinction between the denotation of neuter and non-neuter pronouns. For example, only the feminine pronoun *la* can be used to refer to an 'abstract' concept such as 'madness' in (80).

²⁰ See Alonso-Ovalle and D'Introno (2000) for a detailed analysis on the anaphoric properties of Spanish third person full and null pronouns.

²¹ In line with Dowty and Jacobson (1988) I assume that the gender and number features of pronouns have semantic content.

(80) Locura, **la/*lo** percibo en todas partes.
 madness it-acc.fem.sg perceive-I in all places
 'Madness, I perceive it everywhere.'

An alternative semantic specification such as [+ genderless] is also appealing, but it needs to be refined: does 'gender' refer to the natural male/female gender distinction? Or does it refer to grammatical gender? If the former, the concept can surely be applied to describe the denotation of neuter pronouns. As it stands, however, it does not provide a clear-cut distinction between neuters and non-neuters since we can refer to genderless entities with neuter, masculine and feminine pronouns. If gender refers to grammatical gender only, it would not explain many of the examples in this paper where a neuter pronoun anaphorically refers to a noun marked for masculine or feminine gender, as in (81). Other proposed specifications such as [–**animate**] or [–**human**] also fail to provide concise and definite limits for the neuter/non-neuter divide.

(81) Una mochila, **eso** necesito para la excursión.
 a-fem.sg. backpack that-neut.need-I for the excursion
 'A new backpack, that is what I need for my trip.'

While I agree that neuter pronouns cannot refer to human or animate entities, and that referents to neuter pronouns are always abstract, I argue that the semantic feature that best describes the denotation of Spanish neuter pronouns is their inability to denote individuals. And I propose that this denotational characteristic is part of their semantic specification, namely, Spanish neuter pronouns are negatively specified for the feature [–individual]. In other words, neuter pronouns can denote any entity regardless of their semantic type except for individuals. By individual I take any physical, delineated and discrete entity in the world or in the universe of discourse. For example, proper names such as 'Mary' or 'Mick Jagger' denote individuals, entities with existence in the world. But the concept of an individual is not restricted to the domain of humans or even animate entities. Thus, my chihuahua dog 'Fido' is also an individual, as it is the referent of the definite description (the instantiation of a kind) such as 'the Chinese porcelain vase

that my aunt gave me for my birthday'. Following this specification, neuter reference to individuals in (82)-(84) is only apparent. The referential use of the neuter pronoun in these cases recategorizes an individual into an abstract, higher-order, non-discrete entity: a property, or set of properties.

(82) **Eso** es mi jefe.
That-neut. is my boss
'That is my boss.'

(83) ¡**Eso** es un jugador de fútbol!
That-neut. is a player of football
'That is a football player!'

(84) **Eso** es el jarrón chino que me regaló mi abuela.
That-neut. is the vase chinese that me gavemy grandmother
'That is the Chinese vase that my grandmother gave to me.'

What would be the motivation behind the use of a neuter pronoun in the examples above when the language offers the possibility to refer to those entities with masculine and feminine pronouns? It seems clear to me that the neuter pronoun has a special function, that of recategorizing the denotation of the entity referred to with some specific communicative purpose. What this specific communicative purpose can be is unclear to me, but I hypothesize that such recategorization may involve additional meanings such as derogatory connotations (82), positive connotations (83), or unspecificity (84).

In this line, the neuter pronoun would play the role of a type-raising operator lifting an individual denoting expression (type $\langle e \rangle$) to an expression denoting the set of all properties of that individual (type $\langle \langle e, t \rangle, t \rangle$). Domain shifts are not uncommon in semantics. For example, it has been applied in the count-mass domain to explain the use of mass nouns under the scope of the distributive operators 'each' and 'both'. Consider (85a-b). What these two examples indicate is that the rice in the bowl and the rice in the cup can be interpreted as a single mass object that weighs 200 grams in (85a), but also as two count objects, with the distributive operator 'both' distributing the predicate

'contained glucose' to the two objects in (85b). And this is accomplished by shifting the interpretation of the rice from a mass object to a count entity.²²

- (85) a. The rice in the bowl and the rice in the cup weighed 200 grams.
b. Both the rice in the bowl and the rice in the cup contained glucose.

My proposal that neuter pronouns cannot denote individuals is not entirely new. It elaborates on Pomino and Stark's (2009) treatment for the Spanish neuter, although it differs from it in one crucial aspect. As it was explained in Section 2.3, they propose that neuters are unspecified for the feature [individuation], and non-neuters are positively specified for the same feature [+ individuation]. Basically, what this specification means is that masculine and feminine pronouns can only refer to/denote discrete (countable) entities, while neuter pronouns can refer to/denote any entity in the universe. In my view, this semantic specification is too unconstrained. While Pomino and Stark's specification does actually explain reference to higher-order entities such as propositions, events, and other abstract entities, crucially, it does not explain the difference between (86a-b): why is it possible to refer to a discrete entity with both a feminine and a neuter pronoun?

- (86) a. **Esa** es mi camiseta.
that-fem. is my t-shirt
b. **Eso** es mi camiseta.
that-neut is my t-shirt
'That is my t-shirt.'

My semantic specification for neuter pronouns is more advantageous than previous specifications for several reasons. First, it allows us to establish a clear-cut difference between neuter and non-neuter reference whereby neuter pronouns cannot denote individuals, and non-neuters can denote from the entire universe of discourse. This

²² Hegarty (2003) offers a treatment of abstract entities based on type shifting. In many respects, Hegarty's treatment is contrary to mine as he proposes that clausally introduced entities are shifted to type e upon subsequent mention in discourse. His investigation is not centered around the study of the neuter though, but on reference to abstract entities in discourse.

specification can explain the possibility for non-neuters to refer to abstract concepts as in (87), where we refer to the abstract concept 'maturity' with a feminine pronoun.

- (87) Se necesita madurez para criar a los hijos y tú no la tienes.
SE needs maturity to raise to the kids, and you not it-fem. have
'You need maturity to raise your kids, and you don't have any.'

My proposed specification for neuter pronouns as [– individual] can also explain examples like (86) above, where the speaker uses a neuter pronoun for reference to an entity (feminine, singular) that would most naturally be referred to with the corresponding feminine singular pronoun 'esa'. And it also makes sense from a conceptual point of view as it explains neuter reference in simpler terms: we use neuter pronouns to refer to abstract entities directly as such, or to recategorize human, animate, and discrete individuals as higher types for a particular communicative purpose.

Since Pomino and Stark's proposal follows Ojeda's (1993) analysis of the neuter, my critique of the assumption that the neuter can denote from the entire universe of discourse also extends to Ojeda's analysis. I think the example he uses as proof that the neuters can denote from the entire universe is inaccurate. Furthermore, I think that some of the examples that he uses in his analysis are incorrect. In (31), repeated here as (88), the pronoun *ello* does not refer to [the wine that we just drank] or to [the book I just bought] (individuals) but to a proposition, or maybe a fact: *we'd better not talk about [(the fact) that we just drank some wine]*. In my view, this is only a typical use of the pronoun *ello* co-referring with a proposition.

- (88) Aquí está [el libro con páginas de menos que acabo de comprar y el vino que acabamos de beber], pero más vale no hablar de *él/ello.
'Here is the book with missing pages that I just bought and the wine that we just drank, but we'd better not talk about it.'

In his analysis, Ojeda identifies *prominence* as a key characteristic of neuter pronouns. Prominence may, in principle, be identified with the uniqueness effect typical of definite expressions, a uniqueness presupposition in the theoretical framework of definite

expressions that I adopt in this paper. However, since uniqueness is common to all definite expressions ‘prominence as uniqueness’ cannot be the factor that explains the difference between the neuter pronouns in (89).

- (89) **Lo/eso** que te han dicho me alegra mucho.
 it-neut./that-neut. that to-you have-they told me pleases much
 ‘What they told you makes me happy.’

The pronouns in (89) are referential, they co-refer with some entity that is unique in the (extra)linguistic context (most likely a proposition given the semantics of the predicate *decir* in the relative clause). Also, the two neuter pronouns share the same specification as [– individual] pronouns; so the difference must be found elsewhere. I argue that these two pronouns differ in how they encode information about the cognitive status of the speaker’s intended referent: while the referent of the weak referential neuter pronoun *lo* is in focus, the referent of the demonstrative pronoun is only activated (Gundel et al. 1993). The level of activation marked by neuter pronouns will be explained in more detail in Section 6.

Finally, I think that Bosque and Moreno’s analysis gives only a partial view of the Spanish neuter system. They do not take into account other neuter pro-forms besides *lo*, and they even ignore many of their distributions and referential possibilities. For example, no mention is made in their study of the so-called propositional *lo*, of predicative *lo*, or of the range of constructions where the pronoun can be found: *lo* as a relative pronoun, or *lo* in equative/identificational constructions. The proposal that I put forth in this paper provides a more comprehensive view of the neuter pronominal system. I think that the range of denotations that they propose for their type 1 individuating *lo* can be given a uniform explanation based on the assumption that this type of *lo* is non-referential. Consider again (90)-(93).

- (90) **Lo** mejor de la película es la primera media hora.
 it-neut. mejor of the movie is the first half hour
 ‘The best part of the movie is the first half hour.’

- (91) **Lo** mínimo que consume un deportista son 3.000 calorías diarias.
 it-neut. minimum that consumes a sportsman are 3,000 calories daily
 'The least consumed by a sportsman is 3,000 calories daily.'
- (92) **Lo** más interesante del japonés son sus idiogramas.
 it-neut. more interesting of-the Japanese are its idiograms
- (93) **Lo** que no me gusta es que no preparas tus exámenes.
 it-neut. that not me likes is that not you-prepare your exams

If we accepted Bosque and Moreno's proposal, we would end up having as many denotations for *lo* as different denotations that could be found in the postcopula material: a portion (of time) in (90), a quantity or point in a scale in (91), a collectivity of entities in (92), a proposition in (93), and so on. As it was already explained, I argue that the *lo* in these constructions is merely presentational. Therefore, we do not have to propose an infinite number of denotations for a pronoun that is chosen by default given the lack of features to be evaluated at the time of processing the pronoun.

6 Cognitive status of the intended referent

Thus far, I have proposed a semantic specification common to all neuter pronouns, and a revisited and extended neuter pronominal system for Spanish. However, I did not mention how the different pronouns perform differently referentially. Although the pronoun *lo* has a wider range of denotations/referents than the other neuter pro-forms, all neuter pro-forms can denote/refer to propositions, events, and other abstract entities. Their distributions in natural discourse show a neuter pronominal system very similar to the third person singular system, with the only exception of the observed distributions of the neuter null pronoun. Based on these observations, the Spanish neuter pronominal system could be reduced to a general binary opposition between {null-pro/eso} and {lo} based on their distributional possibilities. Thus, the null pro and neuter demonstratives compete for the most prominent position within the sentence (subject), whereas the pronoun *lo* is mostly restricted to object position. As I mentioned, it looks like the neuter demonstrative is replacing the role of the strong neuter pronoun *ello*, which is now very

marginal in modern Spanish. The denotational and distributional properties of Spanish neuter pronouns are shown in Table 2, and they are compared with third person singular pronouns in Table 3.

	Distribution		Denotation
	Subject	Object	Individual (type <e>)
Ello	YES	NO	NO
Lo	NO	YES	NO
Eso	YES	YES	NO
Null-pro	YES	YES	NO

Table 2. Modern Spanish neuter pronominal system (I).

	Distribution		Denotation
	Subject	Object	Individual (type <e>)
Él/Ella	YES	NO	YES
Lo/La	NO	YES	YES
Ese/Esa	YES	YES	YES
Null-pro	YES	NO	YES

Table 3. Modern Spanish Masc./Fem. system (3rd person sg.).

In what follows, I argue that the different neuter pronouns have different functions that can be explained as a combination of their denotational and distributional properties, and the inherent contrast signalled by demonstratives. This explanation aligns well with the hypothesis set forth in the theory of reference and cognitive status proposed by Gundel et al. (1993). The main tenet of this theory is that determiners and pronouns encode information about the assumed cognitive (memory and attention) status of the speaker's intended referent, as part of their conventional meaning. Because different pronouns (and other nominal expressions) can be used with the same reference and their descriptive and conceptual meaning rarely determines the intended referent, the way these forms encode different statuses will help us understand them. Gundel et al. propose a hierarchy of cognitive statuses for English and Spanish (Figure 1): The Givenness Hierarchy. The hierarchy is implicational and unidirectional, which means that the states range from the most restrictive 'in focus' to the least restrictive 'type identifiable'. As Gundel et al. (2003:283) point out: "[B]y being associated with different

statuses as part of their conventional meaning, forms thus serve as processing signals that assist the addressee in restricting possible interpretations.”

in focus	< activated	< familiar	< unique identifiable	<referential	< type identifiable
it	{that/this/this N}	{that N}	{the N}	{indef. this N}	{a N}
{Ø/él}	{ÉL/este/ese/aquel/este N}	{ese/aquel N}	{el N}	{Ø N/un N}	

Figure 1. The givenness hierarchy and associated forms in English and Spanish

The Givenness Hierarchy has been applied to numerous studies cross-linguistically. Spanish is not an exception but, to my knowledge, no study has focused on the full set of neuter pronouns in this language before.²³ In English, different studies have shown that entities introduced in the discourse by clauses and sequences of clauses are less accessible for subsequent reference with the pronoun ‘it’ than with the demonstrative pronoun ‘that’; and that, quantitatively, demonstrative ‘that’ is preferred over ‘it’ for entities not introduced nominally.²⁴ For example, Gundel et al. (2003) explain that the preference for ‘that’ over ‘it’ for reference to abstract entities in English is based on multiple factors. They claim that entities introduced clausally are less accessible upon their introduction in the discourse than entities introduced nominally, therefore making the demonstrative the preferred option (*activated*, but not *in focus*). Other factors include presupposition, prior beliefs of the interlocutors, and background information. Let’s recall: a pronoun that is ‘in focus’ encodes that there is an associate representation of its referent in the focus of attention, whereas activated pronouns encode that there is an associate representation of their referents in working memory. Following these findings in English, I hypothesize that the relevant statuses for the Spanish neuter system are ‘in focus’ and ‘activated’, and that Spanish neuter demonstratives are the only pronouns that signal that their referents are activated in contrast with the neuter null pronoun and *lo*, which are both in focus. Thus, the basic binary distributional opposition {null-pro/eso} ~ {lo} would find a direct correlate in the cognitive statuses proposed in the Givenness Hierarchy (Figure 1). This hypothesis, however, should be tested empirically before it can

²³ See, for example, Blackwell and Quesada (2012).

²⁴ See Webber (1991) and Hegarty et al. (2001), and references therein.

be fully confirmed as there may be several factors affecting the particular cognitive status of a referent.

Finally, contrast also plays an important role in my account of the neuter system. While it is true that neuter demonstratives can appear in object position, therefore competing with *lo*, the demonstrative conveys a contrastive meaning that is not conveyed by other forms. In the case of neuter demonstrative pronouns, such contrastive meaning is inherent or implicit, that is, the contrast involves the antecedent of the pronoun and another implicitly understood entity that is highly salient in the discourse, as in (Mayol 2010). Therefore, I argue that the best way to understand the different neuter pronouns is through a combination of their distribution, signalled cognitive status, and contrastiveness, as in Table 4. Because demonstratives would be the only elements signalling the status activated and the only elements that –by definition– inherently convey a contrast (Scott 2013), the system in Table 4 predicts that activated referents will always show contrast, and that in focus referents will never show contrast. These predictions are, in some sense, compatible with Mayol’s proposal, who investigated the function played by contrast in subject pronoun omission/expression in Catalan, Spanish and Italian. For her, overt subjects convey an additional message or implicature to the listener indicating a contrast in actions or attitudes.

	Distribution		Denotation	Cognitive Status	Contrastive
	Subject	Object	Individual		
Ello	YES	NO	NO	IN FOCUS	NO
Lo	NO	YES	NO	IN FOCUS	NO
Eso	YES	YES	NO	ACTIVATED	YES
Null-pro	YES	YES	NO	IN FOCUS	NO

Table 4. Modern Spanish neuter pronominal system (II)

But a question remains, what is the factor that distinguishes between null and *lo*? (both are in focus, non-contrastive, and can appear in object position). I believe that the lexical semantics of the predicate involved is key since null-pronouns in object position in Spanish seem to be restricted to cognitive, modal and aspectual verbs, and null and *lo* are mostly incompatible, as shown in (94).

- (94) a. Juan terminó el libro, pero María no pudo **null-pro**.
 John finished the book, but Mary not could \emptyset
 'John finished his book, but Mary couldn't.'
- b. Juan terminó el libro, pero María no *lo pudo.
 John finished the book, but Mary not it-neut. could
 'John finished the book, but Mary couldn't.'

Conclusions

Previous analyses of the Spanish neuter have been fragmentary by placing the focus on one pronoun type only, or ignoring the full range of pro-forms that serve as vehicles of neuter denotation. This paper gives a unitary and cohesive analysis of the Spanish neuter pronominal system that addresses most of the important issues left unanswered to date such as the role of *lo* in different configurations, the existence and common use of a neuter null pronoun, the apparent possibility for neuter pronouns to refer to individuals, and the differences among neuter pronouns.

My analysis is based on three main assumptions. First, as definite expressions, all neuter pronouns (except for non-referential *lo*) presuppose that their antecedent/referent is unique, salient, and weakly familiar. Second, the neuter pronoun *lo* can be referential and non-referential. Third, all neuter pronouns are semantically specified as [–**individual**] expressions. In conjunction, these three assumptions allow me to explain a wide range of natural examples, including problematic cases for analysis based on morphosyntactic features alone, or for analysis based on semantic features such as [+abstract] [–**inanimate**] or [–**human**]. I think my analysis of the Spanish neuter is better than previous analyses as it establishes a clear division of labor between neuter pronouns as elements that can never denote individuals, and non-neuter pronouns as elements that can denote from the entire universe of discourse. This specification for neuters as [–**individual**] expressions is also compatible with previous proposals arguing that neuter reference has to be negatively defined as anything that cannot be referred to with the pronouns *él* or *ella*. It is also conceptually plausible as it restricts neuter denotation to non-discrete, abstract entities of types higher than ⟨e⟩.

In my view, there is reason to believe that Spanish has a set of neuter pro-forms with a very specific function, and clearly separated from masculine and feminine forms. Previous analyses have claimed that neuter pronouns can denote from the entire universe of discourse, that is, to any kind of entity regardless of its nature. Examples like (95), and similar ones, seem to favor this analysis.

- (95) **Eso** es un/una perro/coche/mujer/casa...
that-neut.is a-masc./a-fem. dog/car/woman/casa...
'That is a dog/car/woman/house...'

Contra these analyses, I argue that reference to individuals is only apparent. The neuter shifts the type of the entity referred from $\langle e \rangle$ to properties $\langle e, t \rangle$ or sets of properties $\langle e, \langle e, t \rangle \rangle$ with a specific communicative purpose: presenting the entity referred to as unspecific, unknown, or conveying additional positive or negative connotations. But if all neuter pronouns are definite, and semantically specified as [**-individual**], in what aspects are they different? To answer this question, I offer an explanation for the Spanish neuter pronominal system that combines aspects such as contrastiveness and distributional properties, and aligns with the hypothesis of cognitive statuses in the Givenness Hierarchy. I am aware though that various issues pertaining to the Spanish neuter still remain unanswered. For example, further investigation is needed in order to narrow down the derived meanings associated with the uses shown in (82)-(84), and related ones. Another important question is how the semantic type of the entity denoted may affect salience or accessibility to varying degrees. These issues, however, are beyond the scope of this paper.

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