

---

I claim ‘PRO’ to not be so special:  
*de re/de se* readings as a matter of implicatures

Lorenzo Pinton

May 16, 2022

## 1 Introduction

The present squib engages with data that feature *de re* readings of PRO attitude ascriptions, first presented in Pearson and Roeper (2018) and later in Pearson and Roeper (2022). In particular, the squib proposes an alternative analysis that contrasts with the one proposed by Pearson and Roeper (2022), which assumed *de re* interpretations to be ‘not genuinely assigned by the grammar’ but rather a pragmatic product of ‘non-literal language’. The view presented here is in some sense the complete opposite: there is a pragmatic component involved in PRO interpretations, but *de re* readings are part of the meaning of PRO sentences in their own right and *de se* readings are rather what is generated via the pragmatic component, a competition-based process akin to scalar implicatures. The analysis assumed here has both empirical and theoretical repercussions: on the one hand, PRO results to be not so different from overt particles in other languages, like Ewe logophoric pronoun *yè* (Bimpeh, 2019; Pearson, 2015); on the other hand, assuming *de re* readings to be part of the semantics of PRO, challenges the long-standing assumption that PRO is unambiguously and obligatorily *de se* (Chierchia et al., 1989; Morgan, 1970). Other possible contributions of the squib are (i) the acknowledgment that PRO does not require a dedicated *de se* LF as the one proposed in Percus and Sauerland (2003), and (ii) the definition of two different modes of competition for scalar items: *direct* and *indirect*.

We will proceed as follows: in section §2 we will present the data that show *de re* interpretations of PRO, exploiting the well constructed scenario proposed in Pearson and Roeper (2022). From this, we will move to section §3, where we will be introducing the proposal made by Pearson and Roeper: a non-literal analysis of *de re* PRO. In section §4 we will present the two shortcomings such an analysis encounters: difficult compositional analyses and unexpected predictions for question-answer pairs. Then, in section §5, we will present our own proposal, a treatment of PRO interpretations in terms of scalar implicatures via indirect competitions with over pronouns. Finally, in section §6, we will conclude,

---

summarizing the possible contributions of this analysis on the larger research landscape and highlighting an issue that remains open for future research.

## 2 The Data

In this section I will present the data we are dealing with and the previous analysis that was provided by Pearson and Roeper (2022). Across this section and the next one, I will introduce two contexts exactly as they are presented in the aforementioned paper, because I will build on these very same contexts to construct my arguments against an ‘obligatorily-*de se*’ analysis of PRO. Let us then start presenting the context and the sentences that involve *de re* interpretations of PRO ascriptions.

**1. Baking competition.** Mary, Bob and John all like baking. Their teacher, Mr. Smith, wanted to know which of them baked the best cookies. He had an idea. Each of them would bake a batch of cookies, and then one of them would taste them and decide which one he or she thought was the best. Mr. Smith would give a prize to whoever’s cookie was judged the best. Mr. Smith picked Mary to be the judge, and decided that she should wear a blindfold for the tasting so she wouldn’t know whose cookie was whose. When Mary tasted her own cookie, she couldn’t tell that it was hers. She said, ‘This is the best cookie. Whoever baked this cookie deserves the prize’. Sam had been keeping track of who made which cookie, so that he could go and tell the results to Mr. Smith. He went to Mr. Smith and said:

- (1) a. Mary<sub>i</sub> claimed PRO<sub>i</sub> to deserve the prize.
- b. Mary<sub>i</sub> claimed that she<sub>i</sub> deserves the prize.

(Pearson and Roeper, 2022)

As Pearson and Roeper (2022) note, it is usually observed that in these cases of ‘mistaken identity’ (1a) is judged as false, while (1b) is judged as true. The intuition behind this judgment is that Mary claimed indeed something about herself, but without knowing she was doing so. In other words, Mary claimed something about her person *de re*, but she was not aware that she could refer to that person as ‘I’, i.e. the mode of presentation of that entity to Mary was not *de se* (cf. the ‘awareness condition’, in Pearson (2012) and Pearson and Roeper (2018)). In the light of these considerations, the explanation for (1a) being false and (1b) being true in the given context is the traditional assumption that (1a) is obligatorily *de se*, while (1b) is ambiguous between a *de re* and *de se* interpretation. However, Pearson and Roeper (2022) go on presenting examples in which (1a) is made true by the addition of certain modifiers:

- (2) a. Mary unwittingly/unintentionally/unknowingly claimed PRO to deserve the prize.
- b. Without realising it, Mary claimed PRO to deserve the prize.
- c. Mary didn’t realise it, but she claimed PRO to deserve the prize.

(Pearson and Roeper, 2022)

---

As the authors explain, the sentences in (2) receive a high degree of acceptability in the given context (5 to 6 out of 6 speakers judged them as true), precisely because the adverbial and clausal modifications make somehow salient a *de re* interpretation of the PRO ascription. This fact is unexpected and rather mysterious considering, as mentioned few lines above, that PRO has always been considered a pronoun that can only and unambiguously receive *de se* interpretations (Chierchia et al., 1989; Morgan, 1970). In this paper we will try to pursue the idea that this traditional assumption is wrong and we will contend that PRO can indeed receive *de re* interpretations. This idea was immediately discarded by Pearson and Roeper (2022) for the following two reasons:<sup>1</sup>

1. Such an analysis would leave unexplained the widely held intuition that there is a contrast between PRO and ordinary pronouns in mistaken identity scenarios;
2. Not all predicates behave like *claim*, it is very hard to obtain a *de re* reading adding the modifier *unintentionally*, or similar ones, to other ascription predicates like *want*, ‘#*Mary unintentionally wants to win the prize*’.

As we will make clear in the next sections, reason 1 is not a real problem, once we assume that precisely the contrast between PRO and ordinary pronouns is the origin of the common *de se* interpretation PRO, and at the same time the origin of the long-standing literature assumption on this reading. Reason 2 will be provided a direction for a tentative answer in the final section, but an ultimate answer is missing for the moment. Before moving to our analysis let us first introduce Pearson and Roeper’s (2022) analysis and its weaknesses.

### 3 P&R’s analysis

In order to provide a solution to the puzzle raised by (2), Pearson and Roeper (2022) introduce the following scenario, to compare it with the one we reported in the previous section:

**2. Mark’s day off.** Mark’s partner Steve feels that Mark works too hard, and persuades him to take Friday off so that they can spend the day together. Mark does so, but spends most of Friday responding to emails on his phone. Exasperated, Steve says to Mark:

- (3) Steve to Mark: ‘In effect, you did go to the office on Friday, even though you promised not to / even though you didn’t physically go there’.

---

<sup>1</sup>See Pearson and Roeper (2022) for the reasons why we cannot pursue another solution, namely assuming that *de re* readings of PRO are a case of ‘pragmatic slack’ (in the style of Lasnik (1999)), as previously proposed in Pearson and Roeper (2018).

---

The connection is made through the following example proposed on a social media by Wataru Uegaki, and later tested true for the baking competition scenario by Pearson and Roeper (2022):<sup>2</sup>

- (4) In effect, Mary claimed PRO to deserve the prize.

Pearson and Roeper (2022) equate the two scenarios, under the assumption that the truth of the ‘in effect’-sentences in both signals that the phenomenon involved is the same. They then distinguish between *in effect sentences* and *in effect uses*. The former are sentences that explicitly feature *in effect*, while the latter are sentences that do not contain the expression *in effect* but could be understood as modified by it. This is the case of the sentences in (2), according to Pearson and Roeper (2022), in which can understood as *in effect uses* via pragmatics. As a result, in their analysis, *de re* readings of PRO sentences are all instances of the semantics of *in effect*, either via explicit or implicit mechanisms. Defining the meaning of *in effect* is therefore a crucial step for them, and they start defining the ‘outcome set’ of a given proposition. This outcome set, written  $\text{OUTCOME}(p)(w)$  the set of all propositions that are true in  $w$  as a consequence of the truth of  $p$ . Feeding the function with *Mark went to the office on Friday*, we obtain the following set.

- (5)  $\text{OUTCOME}(p)(w) = \lambda w$ . Mark does a day’s work in  $w$ ,  $\lambda w$ . Mark does not spend the day with Steve in  $w$ ,  $\lambda w$ . Mark’s mind is on his work in  $w$ ,  $\lambda w$ . Mark attends the Friday meeting in  $w$ ,  $\lambda w$ . Mark has lunch in the staff canteen in  $w$ ,  $\lambda w$ . Mark goes to the office on Friday in  $w$ ,  $\lambda w$ . Mark goes somewhere on Friday in  $w$ , ...

Once the outcome set has been defined, Pearson and Roeper’s (2022) next step is claiming that *In effect p* is true in  $w_o$  if and only if the outcome set of  $p$ , for every world SIMilar enough in relevant ways to  $w_o$ , results to be the same as the outcome set of a true proposition  $q$  in  $w_o$ . The following are the truth conditions for *In effect, Mark went to the office on Friday*:<sup>3</sup>

- (6)  $[[\text{In effect, Mark went to the office on Friday}]]^{c, w_o} = 1$  iff  $\exists q[q(w_o) = 1 \& \forall w[w \in \text{SIM}(w_o)(\lambda w$ . Mark went to the office on Friday in  $w) \rightarrow \text{OUTCOME}_c(q)(w_o) = \text{OUTCOME}_c(\lambda w$ . Mark went to the office on Friday in  $w)(w)]]$

In a nutshell, the semantics of *In effect p* tells us that, as far as the outcomes we are interested in are concerned, the results we would have obtained if  $p$  were true, are the same we have obtained in the actual world where some other proposition  $q$  holds. This

---

<sup>2</sup>Even though it has to be noted that the acceptability percentage was lower than the one for the sentences in (2). We also want to specify though that this observation might not be salient itself given the discrepancy between the (small) number of speakers that judged the sentences in (2) (namely six) and those that judged (4) (eleven).

<sup>3</sup>In Pearson and Roeper’s (2022) words: ‘This says that *In effect, Mark went to the office on Friday* is true in  $w_o$  just in case there is some proposition  $q$  that is true in  $w_o$  such that for every world  $w$  that is just like  $w_o$  except that in  $w$  Mark went to the office on Friday, the relevant outcomes of  $q$  in  $w_o$  are the same as the relevant outcomes of Mark going to the office on Friday in  $w$ .

---

analysis is then extended through either *in effect sentences* or *in effect uses* to *de re* PRO sentences. The key points of Pearson and Roeper’s (2022) analysis of *de re* readings of PRO can therefore be summarized as follows:

- The literal *de se* meaning of the sentence is false;<sup>4</sup>
- The modifiers signal an *outcome* reading: the relevant outcomes of the expressed proposition *p* are equal/related to the contextually relevant outcomes of some true proposition *q*.

We will now present in section §4 a couple of shortcomings of this analysis that will eventually bring us to a new analysis in section §5 that undermines the idea that the literal meaning of control PRO excludes *de re* interpretations.

## 4 Two shortcomings

We argue that the analysis just presented encounters two undesired shortcomings, one due to the non-compositional design of the explanation proposed by Pearson and Roeper (2022), and the other due to different patterns displayed by *de re* PRO sentences and *in effect* sentences when it comes to question-answer pairs.

### 4.1 Compositionality

A key step in Pearson and Roeper’s (2022) solution is the claim that there are *in effect uses*, sentences not explicitly involving *in effect* which nonetheless express propositions that can be understood as modified by it. This, they claim, is the case of the sentences in (2), which we report down here as (7):

- (7)
- Mary unwittingly/unintentionally/unknowingly claimed PRO to deserve the prize.
  - Without realising it, Mary claimed PRO to deserve the prize.
  - Mary didn’t realise it, but she claimed PRO to deserve the prize.

Whereas the semantics of *in effect* is pretty clear, and quite transparent with regards to the bricks composing the modifier (*in effect p = the resulting effect of some true proposition is that of p*), it is not clear how the semantics of *in effect* can intervene in the compositional derivation of a sentence like (7a). Note, for instance, that the adverb *unintentionally p* usually triggers the opposite presupposition of *in effect p*, namely the fact that the literal meaning of *p* is true:

---

<sup>4</sup>This ingredient is actually not encoded in the semantics of *in effect* defined by Pearson and Roeper (2022), and this would incorrectly predict *In effect p* to be fine even when literal *p* is true. Nevertheless, this component could be easily implemented (maybe as a presupposition) or anyway pragmatically connected to the felicity of the *in effect*-sentences, similarly to what is done in the paper for *in effect uses* with Condition II of pragmatic acceptability (p.14).

- (8) John unintentionally kicked the ball.  
     $\rightsquigarrow$  John kicked the ball.

It is therefore unclear how (7a) can convey the falsity of the literal meaning of *Mary claimed to deserve the prize*. Someone might argue that the adverb *unintentionally* in (8) does not interact with an ‘essential component’ of the meaning of *kicked the ball*, while in (7a) it does. While we don’t have an ultimate reply against this argument, we think there are good reasons to think it doesn’t go through. In fact, we can parallel the baking competition scenario with a scenario in which John is running and, without noticing, he kicks a ball with which some children were playing.

- (9) **Ball kicking scenario.**  
    Alex: You (unintentionally) kicked the ball.  
    John: No, I didn’t.  
    Alex: Yes, look, the ball is rolling over there because you hit it while running.  
    John: Oh, that’s right! I did kick the ball!
- (10) **Baking competition scenario.**  
    Bob: You (unintentionally) claimed to deserve the prize.  
    Mary: No, I didn’t. I just said that the cook of these cookies deserves it.  
    Bob: Yes, but you are that cook.  
    Mary: Oh, that’s right! I did claim to deserve the prize!

In both cases, after a specific fact of the world is brought to the attention of John and Mary, they agree with the sentence uttered at the beginning of the discourse. Note also that the modifier *unintentionally* is not needed anymore at the end of the exchange, once it is clear from the conversation that both John and Mary were not aware of something when the action took place. Again, on the lines of Pearson and Roeper (2022) someone might claim the last utterance in (10) is ‘loose’ and the literal meaning is false. However, we believe it is hard to say where this difference with the case in (9) comes from. The argument just presented is connected to the one we will now present in the next section, where a different pattern in question-answer pairs will make clear that the *de re* readings must be part of the (literal) meaning of PRO constructions.

## 4.2 Question-answer pairs patterns

Consider once again the baking scenario introduced in section §2 and the ‘day off’ scenario described in section §3. We can now imagine two external observers having the dialogues in (11) and (12).

- |      |    |                                        |      |    |                                      |
|------|----|----------------------------------------|------|----|--------------------------------------|
| (11) | a. | Did Mark go to the office?             | (12) | a. | Did Mary claim to deserve the prize? |
|      | b. | No, but in effect (it’s like) he went. |      | b. | Yes, without realizing it.           |

---

We are not claiming that (11b) and (12b) are the only possible replies to the respective questions, but only that they are possible and, probably, the most natural. It is maybe clear what are the difference we are focusing on here. While the natural reply to (11a) would be ‘No’, the natural reply to (12a) would be ‘Yes’. The fact that ‘No’ is the most natural answer to (11a) tells us that (11a) cannot be taken to mean *Did Mark go to the office in effect?*, namely it tells us that the meaning the question targets can only be the literal one. We can indeed imagine other acceptable replies to (11a), but note that a ‘Yes’ answer would never be good without the addition of ‘Well...’ beforehand or the inclusion of something that redefines the meaning of *going to the office*, like ‘If you consider replying to emails the all day ‘going to the office’, then yes’. On the contrary, native speakers reported that answering ‘No, but without realizing she did’ to (12a) would be odd, and our intuition for Italian is the same. Following the path suggested above, if we assume that questions target the literal meanings of sentences, then we have to conclude that *de re* readings are part of the literal meaning of PRO sentences, given that one can answer (12b) to (12a). Now that we have detected a clear difference suggesting that *de re* readings are indeed part of the meaning of PRO sentences, we need to provide an analysis able to account for the fact that *de se* readings are what we get by default most of the times, to the point that the literature has always assumed that those were the only available readings for PRO sentences.

## 5 PRO-sentences as Implicatures

### 5.1 Properties of implicatures, properties of PRO

To give an answer to the main questions of this puzzle, namely where the *de re* readings come from, and why we have *de se* readings most of the times, we have to consider what *de re* and *de se* mean. Traditionally, it is assumed that *de se* interpretations are *de re* interpretations plus an additional component, a very specific relation between the *re* and the attitude holder, namely ‘a first person mode of presentation’, a ‘self’ (Perry, 1993; Recanati, 2009).<sup>5</sup> It follows that *de se* reports are stronger *de re* reports, strengthened by the ‘self-awareness component’. Following this reasoning, we can ask whether the *de re/de se* distinction present similarities with other kind of basic/strengthened meaning. At a closer look, we claim *de se* interpretations of PRO sentences show numerous similarities with scalar implicatures. The two main properties of scalar implicatures that have relevance here are the following:

- they are cancellable when properly targeted;
- they are sensitive to different Questions Under Discussion (QUDs).

---

<sup>5</sup>There are however important exceptions to this view: for example Lewis (1979), which on the contrary reduces *de re* to *de se*, or the quoted paper by Recanati, which argues for two different kinds of *de se*.

As far as cancellability is concerned, we already know that *de se* inferences arising from PRO sentences have this property too. This is shown by the puzzling examples in (2), the main focus of this paper. The examples show that when the ‘self-awareness component’ is explicitly targeted (‘without realizing it’, ‘unintentionally’, ...), *de se* readings are reduced to *de re*. Therefore, we can safely affirm that *de se* inferences in PRO sentences are cancellable.

We can now ask whether different interpretations of PRO sentences are sensitive to different QUDs. We will thus start presenting two scenarios to see how a known scalar implicature behaves, and we will later introduce two other scenarios to show that PRO sentences have a similar behaviour.

- |                                                                                                                                                                                                     |                                                                                                                                                                                                                                                                                                            |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>(13) Let us imagine that, talking about the actions of the government in the past year, you say:</p> <p style="margin-left: 20px;">a. Families with two children have gotten the baby bonus.</p> | <p>(14) Let us imagine that you have to report on the progress of the baby bonus and it is common knowledge that the order in which people receive money is by increasing number of children, and you say:</p> <p style="margin-left: 20px;">a. Families with two children have gotten the baby bonus.</p> |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

(13a) and (14a) are the very same sentence, but in the second case we get an *exactly two children* reading, while in the first case the sentence is ambiguous between an *exactly two children* and an *at least two children* reading - maybe with the latter reading being even preferred. These examples show that different QUDs are responsible for triggering, or not triggering, certain scalar implicatures. The same could be said of PRO interpretations. Imagine a modification of the baking scenario in section §2 in which John also judges the cookies, while not being blindfolded, and says ‘I am the best cook!’. Imagine now the following exchange:

- (15) a. Who claimed to be the best cook?  
b. John did. (True)  
c. John and Mary did. (False)

In a context in which John claimed *de se* to be the best cook, and Mary claimed only *de re* to be the best cook, a question like the one in (15a) restricts its true answers to the stronger meaning.

Let us now imagine that the competition assigns a prize to whoever, intentionally or unintentionally, claimed that the best cookies were the ones made by them.

- (16) a. Who claimed to be the best cook?  
b. John did. (True but not exhaustive)  
c. John and Mary did. (True and exhaustive)

This time, because of the QUD we are interested in, (16a) requires to include both John and Mary in the true exhaustive answer. In some sense, the ‘relevant outcomes’ discussed by Pearson and Roeper (2022) are indeed at play, but only in the sense that they refer to different salient QUDs which might strengthen the meaning of PRO or not.

## 5.2 Direct and indirect competition

Now that we have shown that PRO interpretations share crucial properties of scalar implicatures we want to bring our claim to its extreme consequences. In particular, any theory that aims at explaining the behaviour of PRO as a scalar implicature - or that supports anyway the idea that *de re* interpretations are part of the meaning of PRO sentence - has to face an important meta-theoretical question, as correctly pointed out by Pearson and Roeper (2022). A theory of *de re* PRO should also address why the field has considered PRO obligatorily *de se* for so long. In our case, this question is linked to the question asking why *de se* PRO has not been identified before as a scalar implicature, given that many other scalar implicatures have been recognized and studied well before. Our reply is that PRO as a scalar implicature has a peculiarity that other scalar implicatures don’t have. To see this, consider the fact that other scalar implicatures involve what we might call *direct competition*, i.e. a certain lexical item competes with another one that could be inserted in the very same environment. Observing the well studied cases of *some/every* and *some/all* we see that the semantic competition between these lexical items is also reflected in their syntactic substitutivity for one another.

- |      |                                                                       |      |                                                                         |
|------|-----------------------------------------------------------------------|------|-------------------------------------------------------------------------|
| (17) | a. <i>Some</i> student is happy.<br>b. <i>Every</i> student is happy. | (18) | a. <i>Some</i> students are happy.<br>b. <i>All</i> students are happy. |
|------|-----------------------------------------------------------------------|------|-------------------------------------------------------------------------|

The fact that a stronger item might have been used in the very same position triggers the inference that the negation of that stronger item must hold in the given contexts. When we look at our puzzle, however, we see that the aforementioned substitution property does not hold for PRO and what we claim to be its competitors, overt pronouns:<sup>6</sup>

- |      |                                                                                                 |
|------|-------------------------------------------------------------------------------------------------|
| (19) | a. Mary claimed PRO to deserve the prize.<br>b. *Mary claimed she/herself to deserve the prize. |
| (20) | a. Mary claimed that she deserves the prize.<br>b. *Mary claimed that PRO deserves the prize.   |

As (19) and (20) show, there is no lexical item that can be simply syntactically substituted for PRO. The scalemate of PRO, the pronoun *she* in our case, requires a completely

---

<sup>6</sup>It has to be pointed out, however, that we are here going for the most extreme assumption: namely that PRO and overt pronouns are scalemates. This might be argued against while retaining the scalar implicature analysis of PRO, given that there exists some evidence showing that scalar items might exist even without competitors, see for instance Bowler (2014).

---

different structure. We can define this type of competition *indirect competition*, since the competing items appears in different environment. In some sense, we could even say that the environments themselves are competing, rather than the ‘items’, especially if we adopt a derivation of PRO sentences, for which PRO is the direct product of a certain change in the structure, as for instance the Exfoliation theory proposed in Pesetsky (2016). The argument proposed here makes clear why the competition between (19a) and (20a) is not as obvious as that of other scalar implicatures. Nonetheless, to convince ourselves that pronouns can have competitors, it proves to be useful looking at the following pair of sentences:

- (21)    a. Mary claimed that she deserves the prize.  
           b. Mary claimed that she herself deserves the prize.

Some native speakers claim that there is a contrast between the two sentences, where (21b) is judged as primarily *de se* (and (21a) as ambiguous between *de se* and *de re*, as mentioned in section §2). Before summarizing the proposal of this paper, highlighting the contributions and repercussions of such a theory, let us point out one further difference between PRO and other classic implicatures. In the case of PRO and overt pronouns, the competing items have the very same meaning, they are both ambiguous between *de re* and *de se* readings. They differentiate with regards to the default reading they get in neutral context, but the range of possible meanings is the same for both, in contrast with the semantics of other scalar implicatures. Nonetheless, this is expected if we assume that PRO starts out as a normal pronoun of a fully fledged finite clause, as some theories assume, including, again, Pesetsky (2016).

We will now move to the last section of the squib, in which the proposed theory will be summarized, together with possible directions and issues we leave to future research.

## 6 Conclusions and Future Work

This squib has engaged with *de re* readings of PRO sentences and with the previous theory that was proposed for these readings by Pearson and Roeper (2022). We presented two shortcomings that undermine the previous theory: on a more general level, compositionality seems to be hardly achievable if we assume that *de re* readings of PRO are non-literal; additionally, equating *de re* readings of PRO to *in effect* sentences leaves unexplained the different patterns these sentences display in question-answer pairs. From this criticism we moved on showing that PRO interpretations share core properties of scalar implicatures, and we proposed that PRO sentences are indeed scalar items that indirectly compete with overt pronoun constructions.

On the one hand, our theory contradicts the traditional assumption that PRO is unambiguously and obligatorily *de se* (Chierchia et al., 1989; Morgan, 1970). Once this tenet is discarded, any basis for relegating PRO to a separate *de se* derivation (Percus and Sauerland, 2003) falls. On the other hand, the analysis proposed brings PRO closer to particles

---

in other languages that have been shown to have the twofold behaviour here described. One such particle is Ewe logophoric *yè*, which was initially assumed to be equally *de re* and *de se* (Pearson, 2015), but that has been recently claimed to be mainly *de se* with marginal *de re* readings (Bimpeh, 2019). In the light of the above, the following excerpt from Pearson (2015) sounds particularly interesting, especially because Pearson concludes that Ewe *yè* and other logophoric pronouns cannot be instantiations of PRO because the latter is obligatorily *de se* but the former are not.

In some respects logophoric pronouns like *yè* resemble obligatorily controlled PRO: they can only occur in an embedded clause, and when they do they obligatorily refer to some designated argument of the embedding verb. Consequently, it is tempting to think of logophors as overt instantiations of PRO.

(Pearson, 2015)

Under our new view, we can indeed make the ‘tempting’ claim that logophors are overt instantiations of PRO, or viceversa, as hinted in the title of the squib.

While we have reached an interesting conclusion, we also have to acknowledge that certain issues remain open. The implicature nature of PRO, i.e. its strong association with *de se* readings, has to be better inquired and understood. In particular it seems difficult to account for the fact that *de re* readings of PRO are confined to *plain speaking* verbs. In fact, manner of speaking verbs and other attitude verbs seem to resist the *de re* interpretation even if combined with the modifiers expressed in section §2 in mistaken identity scenarios:

- (22) a. Mary wants PRO to win.  
b. Mary boasts PRO to deserve the prize.
- (23) a. ??Mary unintentionally wants PRO to win.  
b. ??Mary unintentionally boasts PRO to deserve the prize.

We don’t have an ultimate answer to this puzzle, but we have the intuition that here is where the compositional analysis becomes pivotal. In particular, a possible solution might come from the combination of the *de se* theory proposed in Recanati (2009), for which there are two kinds of *de se*, one that originates from *de re* and one that doesn’t, with the assumption that specific verbs can combine with PRO to give rise to the second kind of *de se*, which cannot be reduced to ‘*de re* plus self-awareness’.<sup>7</sup>

Overall, even though it is very far from putting a full stop on the debate, we hope that this squib has shown that an alternative to the traditional assumptions on PRO is possible,

---

<sup>7</sup>As Recanati (2009) points out, this idea was already envisioned in Wittgenstein’s posthumous Blue Book (Wittgenstein, 1958) ‘where he introduces the broken arm example. [He] draws between two types of first-person thought: those that are [...] vulnerable to ‘error through misidentification’ [...] like ‘My arm is broken’ while I’m looking at someone else’s arm ‘and those that are immune to such error. For example, if I feel pain and judge ‘I am in pain’, I cannot be mistaken as to the person who happens to be in pain.’ (Recanati, 2009, p.257).

namely the rather bizarre claim that overt pronouns and covert PRO compete, giving rise to scalar implicatures.

## References

- Bimpeh, A. A. (2019). *Default de se: The interpretation of the Ewe logophor*.
- Bowler, M. (2014). “Conjunction and disjunction in a language without ‘and’”. In: *Semantics and linguistic theory*. Vol. 24, pp. 137–155.
- Chierchia, G. et al. (1989). “Anaphora and attitudes de se”. In: *Semantics and contextual expression* 11, pp. 1–31.
- Lasnik, P. (1999). “Pragmatic halos”. In: *Language*, pp. 522–551.
- Lewis, D. (1979). “Attitudes de dicto and de se”. In: *The philosophical review* 88.4, pp. 513–543.
- Morgan, J. (1970). *On the criterion of identity for noun phrase deletion*.
- Pearson, H. (2012). “The sense of self: Topics in the semantics of de se expressions”. PhD thesis. Harvard University.
- (2015). “The interpretation of the logophoric pronoun in Ewe”. In: *Natural Language Semantics* 23.2, pp. 77–118.
- Pearson, H. and T. Roeper (2018). “Three puzzles about de se”. In: *Making Worlds Accessible*, p. 193.
- (2022). “Excluded entailments and the de se/de re partition”. In: *Inquiry*, pp. 1–29.
- Percus, O. and U. Sauerland (2003). “On the LFs of attitude reports”. In: *Proceedings of Sinn und Bedeutung*. Vol. 7, pp. 228–242.
- Perry, J. (1993). *The problem of the essential indexical: and other essays*. Oxford University Press on Demand.
- Pesetsky, D. (2016). “Exfoliation: towards a derivational theory of clause size”. In: *Shrinking Trees Workshop*, Leipzig. Vol. 10.
- Recanati, F. (2009). “De re and De se”. In: *Dialectica* 63.3, pp. 249–269.
- Wittgenstein, L. (1958). *The blue and brown books*. Vol. 34. Blackwell Oxford.