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Is "a=a" known *a posteriori*?

Resumen: *Stavroula Glezakos ha defendido que los enunciados de la forma a=a (i. e., ejemplares de la así denominada ley de identidad) poseen un estatus epistémico idéntico al de los enunciados de la forma a=b, conocidos como a posteriori. Ella justifica su defensa sobre la base de ciertos usos de nombres empíricamente posibles. Pero, como lo explicamos en este breve artículo, la ley de identidad relevante para los casos de nombres propios considerados por Glezakos es la versión pragmática de esa ley, no la considerada en su artículo. El pretendido objetivo del artículo de Glezakos es la ley de identidad, la cual prescinde de consideraciones pragmáticas. Una vez que consideremos la versión relevante de la ley de identidad, será claro que los casos y ejemplos de Glezakos no poseen en absoluto fuerza y no muestran que las identidades de la forma a=a sean conocidas a posteriori.*

Palabras claves: *Versión pragmática de la ley de identidad. Ley de identidad. Aposterioridad de la ley de identidad. Variable. Stavroula Glezakos.*

Abstract: *Stavroula Glezakos has claimed that statements of the form a=a (i. e., instances of the so called law of identity) are on equal epistemic status as statements of the form a=b, and so known a posteriori. She justifies her claim on the basis of certain empirically possible uses of names. But, as we explain in this brief paper, the law of identity relevant for the cases of proper names considered by Glezakos is the pragmatic version of such a law and not the one considered in her paper. The intended target of Glezakos' paper is the law of identity, in abstraction from pragmatic considerations. Once we take into account the relevant version of the law of identity, it will be clear that Glezakos' cases and examples have no force at all and do not show that identities of the form a=a are known a posteriori.*

Key words: *Pragmatic version of the law of identity. Law of Identity. A posterioricity of the law of identity. Variable. Stavroula Glezakos.*

In "Can Frege pose Frege's Puzzle?", Stavroula Glezakos has claimed that statements of the form a=a (i. e., instances of the so called *law of identity*) are on equal epistemic status as statements of the form a=b. This claim is in opposition to the general belief that statements of the former sort are known *a priori*, while those of the latter are known *a posteriori*. She justifies her claim on the basis of certain empirically possible uses of names. But, as we explain in this brief paper, the law of identity relevant for the cases of proper names considered by Glezakos is the pragmatic version of such a law and not the one considered in her paper. The intended target of Glezakos' paper is the law of identity, in abstraction from pragmatic considerations. Once we take into account the relevant version of the law of identity, it will be clear that Glezakos' cases and examples have no force at all and do not show that identities of the form a=a are known *a posteriori*. Thus, we still have Frege's puzzle.

1. The pragmatic version of the Law of identity

In first-order classical logical systems, the so called *law of identity* is generally formulated

in abstraction from pragmatic considerations. That is, in such a logic, the schema $a=a$ (where 'a' stands for names or individual variables) is assumed without taking into account different contexts of use of the individual terms involved, that is, the so called pragmatic contexts. Under the standard interpretation of the sign of identity, any instance of the axiom in question should be interpreted as stating that the reference of an individual term a is the same as the reference of the individual term a. It is clear that we are dealing here with types of names rather than uses of names; these latter are usually called tokens of names and are concrete particulars.[1] Thus, one takes "Socrates=Socrates" as stating that the proper name 'Socrates' has the same reference as that of the proper name 'Socrates', in abstraction from any possible use of that name. So, the law of identity as assumed by first-order logic does not state that any token of 'Socrates' has the same reference as any other token of that same name.

Now, when tokens of a name are in view, a different formulation of the law of identity is in order. In this case, the law of identity has to be formulated as stating that the reference of a token of a name N is the same as the reference of that same token.

In order to illustrate the pragmatic interpretation of the law of identity, consider the following: suppose that, at the same time and place, someone utters the sentence "John is a philosopher" and somebody else the sentence "John is not a philosopher". One discovers (by asking, for example) that both utterers are not contradicting each other, because what they have in mind when using the name 'John' are two different persons. Thus, the token of the name 'John' in the first utterance refers to a person different from the token of that name in the second utterance. But this does not mean that the law of identity is false. The pragmatic formulation of the law of identity precludes this conclusion. The law of identity still holds: (a) the reference of the token of the name 'John' in the first utterance is the same as the reference of the token of name 'John' in the first utterance. (b) The reference of the token of the name 'John' in the second utterance is the same as the reference of the token of the name 'John' in the second

utterance. No experience or evidence is needed to justify (a) and (b). They are self-evident.

Now, suppose that, three days later, someone utters the sentence "John is 40 years old". Here we have a third token of the name 'John'. We find out that the person referred to by "John" in this sentence is the same as the philosopher referred to by that same name three days earlier. We then have evidence to claim that the third token of the name 'John' has the same reference as the second token of the name 'John'. Is this an instance of the law of identity? Clearly not. This is because different tokens of the name 'John' are involved. In other words, when use of names are involved, for a given identity to be an instance of the law of identity is not sufficient for their left and right terms to include tokens of the same type of name. Rather, both terms should involve the same token. This is a necessary requirement of the pragmatic version of the law of identity.

In the case of the first and third use of the name 'John', we have grounds for asserting an identity of a different sort: the reference of the first token of 'John' is the same as the reference of the second token of 'John'. This is an identity statement of the form a=b, as understood for pragmatic contexts. In these contexts, each token counts as a unique sign, even when the tokens in question are of the same name. So, two tokens of the same name are two different signs.

2. Glezakos' argument

Stravoula Glezakos has developed an argument that purports to show that the law of identity has the same epistemic status as identities of the form "a=b". That is, if Glezakos' argument is correct, identities of the form "a=a" will be known *a posteriori*. Her argument is clearly stated in the following quotation:

> Without making any theoretical commitments, we can say that a sentence has the form "a=a" when the same name flanks the identity sign, and "a=b" when distinct names flank the identity sign. Thus, posed neutrally, the (purported) puzzle is this: what is the source of the epistemic

difference between true identity sentences that contain a single name twice, and those that contain two names? Of course, this formulation immediately raises a further question: what makes for sameness of name? Frege's answer to this question in "On Sinn and Bedeutung" seems to be that we have the same name whenever we have the same sign/referent combination [...] Given this account of name individuation and sentence form, we will not find much to puzzle us when we consider true identity statements. In particular, if an identity sentence's form is determined by sameness or difference in the names that it contains, then there will be no in-principle epistemic divide between sentences of the form "a=a" and "a=b". It is clear that someone may encounter the same name twice and go on to deny the truth of an identity sentence containing that single name, or learn only after empirical investigation that an identity sentence containing that single name twice is indeed true. There is nothing involved in the notion "sameness of name" that ensures that language users –even the most competent– will be able to identify and re-identify names when they encounter them, or take them into their vocabularies. Of course, if a speaker uses or encounters the name "Aristotle" on one occasion, uses or encounters "Aristotle" on a later occasion, and recognizes that the name is the *same* name on both occasions, then (given the characterization of name as a sign/referent combination) she can immediately know that "Aristotle=Aristotle" is true. But notice that the ability to recognize that the name is the same seems to involve the ability to recognize that the *referent* is the same. If this is the case, then an identity sentence of the form "a=a" is not, in principle, recognizable as true in a way that differs from a true sentence of the form "a=b". In both cases: once one knows that the referent is the same, one knows that the sentence is true. If one does *not* know this, or believes the referents to be different, then, whether the sentence is of the form "a=a" or "a=b", one does not know (let alone know *a priori*) that the sentence is true. The end result is that non-Fregeans

should not be puzzled about true identity statements, for they have no reason to accept that there is an epistemic divide between identity sentences of different forms (Glezakos, 2009, 203-7).

Clearly, by the above, the target of Glezakos' argument seems to be the law of identity as formulated in first-order logic, that is, without pragmatic considerations. But the cases and examples of proper names she considers have a pragmatic character. What Glezakos has in mind are concrete particulars that are instances of names, such as the first and second encounters of a speaker with the name Aristotle. Thus, for this sort of situations, the appropriate law of identity should be its pragmatic version. Once we take into account this version, it is clear that Glezakos is not actually showing what she intends to.

Let c be the pragmatic context for the first encounter of the speaker with such a name. It will be absolutely clear to the speaker that the token of 'Aristotle' at c has the same reference as the reference of that same token. The speaker does not need evidence for this; she absolutely knows it. Moreover, the speaker does not even need to know the reference of the token of 'Aristotle' at c. It is just logic that speaker needs to infer the truth of the identity statement in question and, consequently, it is known *a priori*. The same applies to the second encounter with the name 'Aristotle'. The speaker absolutely knows that the law of identity applies to the second use of the name 'Aristotle', without any evidence and without even knowing what is the reference of 'Aristotle' in such an occasion.

Now, the question naturally arises regarding the form of the possible identity statement involving the tokens of the name 'Aristotle' that were encountered in the two occasions. Clearly, since we have two different tokens of the same name 'Aristotle', we cannot know whether or not those tokens have the same reference unless we appeal to experience or knowledge of the actual world. In this case we need to know what the references of both tokens of 'Aristotle' are in order to determine the truth of the identity statement in question. This identity statement is

known *a posteriori*. But this identity statement will not be an instance of the law of identity in its pragmatic formulation. It is rather an identity of the form a=b.

In sum, Glezakos is right in her claim that we know a posteriori that the reference of the first encounter of the name 'Aristotle' is the same as the reference of the second-encounter of the name 'Aristotle'. But this is not an instance of the identity law at the pragmatic level. On the other hand, we know *a priori* that the reference of the first-encounter of the name 'Aristotle' is the same as the reference of the first-encounter of the name 'Aristotle'. The same applies to the second-encounter of the name 'Aristotle'. Both cases are pragmatic instances of the law of identity. Thus, we still have Frege's puzzle, that is, we can still ask what it is the source of the epistemic difference between an identity that contains a single token of the same name and a true identity that contains either two different tokens of the same name or two tokens of different names.

Notes

1. The individuation of a token of a name is determined by different elements. These constitute the so called 'pragmatic parameters'. What should be included in the set of these parameters is quite ample. They might include, for example, the speaker and the space and/or time coordinates of the particular use of the sign. Clearly, there are many others elements, but what is important is that the class of such elements should be sufficiently enough to individuate the use of a name so as to render it a unique individual in the

world. Accordingly, one would invoke as many context elements as needed in order to individuate a given use of the name 'Socrates' in order to speak of a token of that name.

References

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