## Alternative Semantics for the Hebrew Determiner *Eize* (specificity, Alternative Semantics, indefinite NPs)

In this paper, we investigate the semantic properties of the Hebrew indefinite determiner *eize*. The occurrence of this determiner is optional, as is illustrated in (1), and seems not to affect the truth conditions of a sentence. Thus, the truth conditions of (1a) and (1b) seem to be identical: both sentences are true iff there exists at least one student that has been invited by Dani. We argue, however, that *eize* does make a semantic contribution. This is revealed, for example, in such sentences as (2), in which *eize* interacts with a quantity-denoting expression, e.g. a numeral. In these cases, *eize* has a similar semantic effect to that of the adverbial *approximately*. Thus, (2) means that Dani invited approximately ten students. Here, *eize* clearly affects truth conditions: if Dani, in fact, invited exactly eight students, (2) will be true, while its counterpart without *eize* will be false. Another type of sentences whose truth conditions are affected by *eize* are ones in which the determiner interacts with the semantics of a property-denoting constituent (the head noun or N'). This is what happens under one reading of (3). Suppose that Dina is hungry, but the dinner is not yet ready. A vase with different kinds of fruit is standing on the table. Then the speaker may utter (3), meaning that Dina will eat an apple or some other fruit of a relatively similar kind, e.g. a pear. Again, truth conditions of the corresponding sentence without *eize* are different: this sentence will be true only if Dina eats an apple.

We will propose an analysis of *eize* within the framework of Alternative Semantics (Rooth 1985). Following Rooth, we assume that a linguistic expression can have two distinct semantic values, the "ordinary" and the "alternative" one. The alternative interpretation constitutes a set of semantic values "which potentially contrast with the ordinary semantic value" (Rooth 1992:76). For instance, the "alternative" denotation of the proper name *John* is the set of individuals in the domain (which contains the individual John). We argue that *eize* introduces an alternative interpretation of the constituent to which it applies and triggers existential quantification over the alternatives. For instance, in (2), eize affects the interpretation of a numeral. The "alternative" interpretation of a numeral like ten is a set of numbers (the set of values denoted by all number words (Krifka 1999)). (2) entails that there exists a number n that belongs to the set of alternatives of *eser* (ten), such that the proposition Dani invited n students is true. Crucially, however, (2) does not entail that Dani invited any number of students; rather, the number must be close to ten. We propose that *eize* quantifies over a set of *proximal alternatives*, those members of the set of alternatives that count as sufficiently close to the original value (e.g. Penka 2005). In the case of *ten*, these may be values within the deviation of 20% of the original value. The semantics that we are proposing for (2) is formally represented in (4). The contribution of *eize* is analogous in such sentences as (3), but here, *eize* triggers the "alternative" interpretation of a property-denoting constituent. The logical form of (3) is provided in (5). We will address the question of what counts as an alternative and as a proximal alternative of a propertydenoting expression. Finally, we turn to such sentences as (1b). We argue that here, *eize* also triggers existential quantification over alternatives. This time, it is the whole NP that receives an "alternative" semantics. Following Kratzer and Shimoyama (2002), we assume that the "alternative" denotation of an indefinite NP is a set of contextually relevant individuals that satisfy its descriptive content. In (1b), this is the set of all contextually relevant students. The meaning proposed for (1b) is provided in (6). The one substantial difference between (1b) and (2)-(3) is that in the former sentence, *eize* triggers an alternative, rather than proximal alternative interpretation. This results from the fact that the original value of the NP in (1b) is a variable, and the "alternative" denotation is a set of possible values for this variable. In this case, the notion of proximity cannot apply. We therefore propose that *eize* triggers a proximal alternative interpretation whenever the notion of proximity can be applied; otherwise, it quantifies over (any) alternatives. The unifying analysis of *eize* is proposed in (7). The proposed analysis is further supported by the existence of an interrogative usage of *eize* (8). Within Hamblin semantics, a wh-item is analyzed as a set of alternative values. Thus, the interrogative eize triggers an alternative interpretation of an NP, a property that is shared non-interrogative *eize*.

Finally, we compare the properties of *eize* to those of the indefinite determiner *eizešehu* (9). While often behaving like a free variant of *eize* (Borer 2005), *eizešehu* cannot interact semantically with a quantity- or property-denoting constituent in the way *eize* does in (2) and (3). Further, we show that while *eize* can appear in property-denoting NPs, the presence of *eizešehu* tends to force existential quantification over individuals. Thus, (10) may be used to attribute to the addressee childish behavior, whereas (11) can only mean that there is a particular girl such that the addressee behaves like her.

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(1)	a. Dani hizmin student exad.	b. Dani hizmin eize student exad.
	Dani invited student one	Dani invited some student one
	Dani invited a/one student.	Dani invited some student.
(2)	Dani hizmin eize asara studentim.	
	Dani invited some ten students	
	Dani invited about ten students.	
(3)	Dina tuxal' eize tapuax.	
	Dina will-eat some apple	
	Dina will eat an apple (or something	like that).
(4)	$\{\exists n \ [n \in [[asara]]_{PA} \land \exists x \ [n(x) \land student ]\}$	dent (x) $\Lambda$ invited (dani,x)] = 1]}
	where [[asara]] <sub>PA</sub> is the set of proximal alternatives of <i>asara</i> (ten)	
(5)	$\{ \exists P [P \in [[tapuax]]_{PA} \land \exists x [P(x) \land w \} \} \}$	$\operatorname{vill-take}(\operatorname{dina},x)] = 1]$
(6)	$\{\exists x [x \in [[_{NP} \text{ student}]]_A \land \text{ invited } (da)\}$	ni, x) = 1]
	where $[[_{NP} \text{ student}]]_A = \{x: x \text{ is a } x \}$	student} (the "alternative" denotation of the NP student)
(7)	Let p be the propositional content of	the sentence S that contains indefinite <i>eize</i> . Let $\alpha$ be the
	constituent to which eize applies. The	en
	$[[S]] = \{ \exists a [a \in [[\alpha]]_{PA} \land p^a = 1] \}$	
	If $[[\alpha]]_{PA}$ is undefined, then	
	$[[S]] = \{\exists a [a \in [[\alpha]]_A \land p^a = 1]\}$	
	where p <sup>a</sup> is identical to p except for the omitted.	he fact that within $p^a$ , $\alpha$ is substituted by a, and <i>eize</i> is
( <b>0</b> )	aine student himmin at deni?	

- (8) eize student hizmin et dani? some student invited acc Dani Which student invited Dani?
- (9) Dina pagša eizešehu student. Dina met some student
- (10) at mitnaheget kmo eize yalda ktana you behave like some girl little You behave like a little girl. (A possible reading: You exhibit a childish behavior.)
- (11) at mitnaheget kmo eizešehi yalda ktana you behave like some<sub>FEM</sub> girl little You behave like a (particular) little girl.

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