The prosody of rhetorical vs. information-seeking questions in Icelandic*

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Background:

Information-seeking questions (ISQs):

- Polar questions: perform the directive speech act of requesting information; "request an answer that specifies whether the proposition expressed by their sentence radical holds or does not hold" (Krifka 2011)
- Wh-questions: "create an open proposition by leaving parts of the description of the proposition unspecified" (Krifka 2011); in Icelandic, the open parameter is represented by the hv-pronoun (e.g. hver 'who'). The expected answer provides information about the open parameter.

Rhetorical questions (RQs):

are formally interrogatives, but differ from ISQs in discourse function: RQs (1) do not expect an answer, (2) have the feel of an assertion, (3) do not have to but can optionally be answered (Biezma & Rawlins 2017).



Hypotheses:

- 1. ISQs and RQs differ in their prosodic realization.
- 2. Phonologically, the type of nuclear pitch accent does, but the boundary tone does not, contribute to this distinction.
- 3. Phonetically, we generally predict longer durations in RQs than in ISQs (based on, e.g., Wochner et al 2015 for German).

Production experiment:

Materials:

- targets: 21 pairs of wh- and polar interrogatives with contexts; each polar and each wh-question occurred in both an ISQ and an RQ reading
- 34 fillers (mostly exclamatives), 3 practice items

Procedure:

- two experimental lists; each list contained both polar and wh-question and both illocution types; illocution type manipulated within-subjects
- visual display of the context, read carefully by participants, target on b press (self-paced); production as naturally as possible in given contex

Participants:

- 17 native speakers of Icelandic (age: 22-32, Ø = 26.9; 6 male, 11 fem
- Data treatment:
- 645 items analyzed:
 - 313 polar:
 - 156 ISQs, 157 RQs 332 wh:
 - 166 ISQs, 166 RQs



(based on, o	e.g., Wochner et	al 2015 for German).				
	Table 1: Contexts and target polar interrogatives					
	Cor	ntext for ISQ	Context for RQ			
oolar	which co	ty you offer cake ntains limes. You e to know which of	Your aunt offers limes to her guests. However, it is well known that this fruit			
		ts eat this fruit and ney would like to try	is too sour for it to be possible to eat it.			
ns,	the cake.	ley would like to uy	You say to your aunt:			
	You say to	o your guests:				
button	Target Q:					
ext	Bordar einhver límónur? ('Does anybody eat limes?')					
nale)	Table 2: Contexts and target wh-interrogatives					
		ntext for ISQ	Context for RQ			
ering all the second		ty you offer cake	Your aunt offers limes to			
* 81998.446	which contains limes. You would like to know which of		her guests. However, it is well known that this fruit			
	your guests eat this fruit and		is too sour for it to be			
a contraction	whether they would like to try		possible to eat it.			
	the cake.		You say to your aunt:			
	You say to your guests: Target Q: Hver borðar límónur? ('Who eats limes?')					
1.711	Target	Q: Hver bordar limoi	nur? ('Who eats limes?')			
o signal illocution		 3. Duration does signal illocution type: initial word longer in RQs than in ISQs (lexical verb in polar questions, <i>wh</i>-word) 				
l accents		in <i>wh</i> -questions)				
nal vs. bitonal		 Nuclear syllable (onset, rhyme) longer in RQs than in ISQs across guestion types 				
		rtes than in io	as across question types			



In addition: (4.) generally more and stronger prenuclear accents in RQs than in ISQs. (5.) more upstepped nuclear pitch accents in RQs than in ISQs.

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Results and discussion: 1. Boundary tones do not signal illocution

	Table 3: Dist	ribution of fin	al boundary to	ones
	polar questions		wh-questions	
	ISQ	RQ	ISQ	RQ
	(N=156)	(N=157)	(N=166)	(N=166)
L%	149	157	146	166
	(95.5%)	(100%)	(88%)	(100%)
H%	6 (4%)	0	2 (1.2%)	0
M%	1 (0.7%)	0	16 (9.6%)	0
LM%	0	0	2 (1.2%)	0

and most ISO

Polar questions, ISQ (left, L*+H L%) vs. RQ (right, L+H* L%)





- Polar questions:
- timing of the rise in L+H
- Wh-questions: monotona



Table 4: Distribution of nuclear pitch accents