Classroom study on noticing and recast features: Capturing learner noticing with uptake and stimulated recall

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Abstract

Research has shown that various features of recasts, such as length, intonation, and linguistic target, influence learners' ability to notice the recasts. Noticing has typically been measured using a performance (e.g., uptake) or introspective (e.g., stimulated recall) measure, however, little research has examined how these measures compare in their effectiveness in capturing learner noticing. The current study investigated the extent to which uptake and stimulated recall may capture learners' noticing of recasts, and the relationship between recast features (length, form, number of changes, intonation, error type, and directness) and learners' noticing in the form of verbal reporting and of uptake. Twenty-five ESL learners participated in teacher-fronted classroom interactions, which were immediately followed by a stimulated recall interview. During the interview, learners reported their thoughts at the time of interaction while watching recast episodes that occurred during the interaction. The results indicated that the rate of noticing was substantially higher when it was measured by stimulated recall than when was measured by uptake. When noticing was measured by stimulated recall, recasts with rising intonation were the only significant predictor of learners' noticing.
Published by Elsevier Ltd.

Keywords: Noticing; Uptake; Recasts; Stimulated recall; Performance; Introspective protocol; Classroom context

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Recasts are defined as the native speaker's (NS's) corrective reformulation of all or part of the non-native speaker's utterance (Lyster and Ranta, 1997). They occur in the course of communicative interaction in response to the learner's incorrect utterance and provide both positive and negative evidence while retaining the central meaning of the learner's utterance (Long and Robinson, 1998). Some researchers have argued that the developmental benefits of recasts lie in implicit negative evidence (Farrar, 1990; Long et al., 1998; Oliver, 1995; Saxon, 1997), while others have claimed that the learning benefits are attributed to positive evidence (e.g., Leeman, 2003). These arguments, especially the former, seem to rest on the assumption that second language (L2) learners can recognize the corrective intent of recasts (e.g., Carroll, 1995). However, research has suggested that learners' ability to perceive recasts as corrective

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feedback is largely influenced by various characteristics of recasts, including length, number of changes, intonation, and linguistic foci, which make this implicit feedback more or less explicit (e.g., Sheen, 2006). Hence, it is critical that learners' noticing of recasts be examined in relation to their features.

According to the noticing hypothesis (Schmidt, 1990), noticing of a form is a precursor to the learning of the form. In other words, only the part of input that the learner becomes consciously aware of holds the potential for learning. In particular, learners' noticing of the gap between their interlanguage form and the target form is argued to push learning forward (Gass, 1997; Schmidt and Frota, 1986). Resting on this premise, a number of studies have examined L2 learners' noticing of feedback to uncover the processes of interaction-driven learning. This line of research has commonly employed uptake (e.g., Ellis et al., 2001; Lyster and Ranta, 1997; Sheen, 2004) and introspective protocols (e.g., Adams, 2003; Egi, 2007a, 2010; Leow, 1997; Mackey, 2006; Mackey et al., 2000; Swain and Lapkin, 2002) to measure learners' noticing.

Uptake refers to learners' immediate response to feedback that constitutes a reaction to the feedback (Lyster and Ranta, 1997). Introspective protocols are learners' self-reports about their learning experience. A commonly used technique in interaction research is stimulated recall (Gass and Mackey, 2000) where learners retrospectively report on their thoughts at the time of task interactions while viewing a video or audio recording of the interactions. Stimulated recall taps learners' noticing after the exposure to the target input (in this study, feedback), and therefore is an offline noticing measure. Online measures, such as think-aloud protocols, are typically used in research with written input (e.g., Leow, 1997) because speaking activities are generally incompatible with thinking aloud, which also requires an oral channel.

Uptake and stimulated recall, the two most commonly used noticing measures in oral interaction research, provide researchers with somewhat different types of noticing data. When noticing is understood as subjective awareness that arises in the process of rehearsing input in the learner's short-term or working memory (e.g., Robinson, 1995, 2001), uptake may be argued to be a manifestation of noticing. However, when uptake is used to measure learners' noticing of recasts, several issues require careful consideration. First, recasts generally do not require responses from learners. Second, the occurrence of uptake is subject to several discourse constraints; for instance, uptake may not occur simply because there is no opportunity, or because responding to the feedback is contextually awkward (e.g., Mackey et al., 2000; Oliver, 1995, 1998). Also, because uptake is performance data, its interpretation requires researchers' inferences and is not always straightforward. This is particularly true when uptake is unsuccessful, for instance, when it is a simple acknowledgment like 'yes,' whose underlying intension can be ambiguous between an acknowledgment of the feedback or a semantic response to the content (e.g., Egi, 2010).

A laboratory study by Egi (2010) investigated the relationship between uptake and noticing by analyzing stimulated recall comments by learners of Japanese in relation to uptake they produced during communicative activities. Learners who produced uptake after the recast, were significantly more likely to report having perceived the recasts as corrective. This was particularly true when the uptake was target-like (i.e., repair). However, Egi (2010) cautiously notes that the presence of uptake does not always suggest learners' noticing as there were repair cases for which learners did not report noticing of recasts, and vice versa. Also, learners' noticing of a recast may not be the only factor that motivates them to respond to the recast. It is possible that learners produce uptake because they became aware of their errors in the process of initial output production. It is also possible that they repeat the NS's feedback in a parrot-like fashion without true understanding of its corrective message (e.g., Egi, 2010; Gass, 2003). Indeed, interpretation of uptake requires much care, particularly when uptake still requires repair. However, earlier research that employed uptake as a noticing measure generally treated both repair and needs-repair cases as evidence of learner noticing (e.g., Doughty, 1994; Lyster, 1998a, 1998b; Panova and Lyster, 2002; Sheen, 2004, 2006).

Introspective data provides insight into qualitative aspects of learners noticing. It requires little consideration to the aforementioned discoursal constraints uptake is subject to. However, it is of course not without problems. It is argued that the temporal proximity of the recall to the event to be recalled is critical for accurate reports (e.g.,Egi, 2004; Gass, 2001). Compared to uptake, which typically occurs immediately after feedback, the temporal distance between the feedback and recall tends to be much larger for stimulated recall because it is conducted after the completion of a task. Coupled with the memory decay associated with the temporal distance, the presentation of recall stimuli (e.g., videotaped interaction) could facilitate the reconstruction of, rather than retrieval of previous processes (e.g., Leow et al., 2011; Leow and Morgan-Short, 2004). Egi (2010) also pointed out that recall prompts are typically general (e.g., what were you thinking then?), and elicited reports often represented learners' summative comments about a conversational interaction presented in the stimulus video rather than their thoughts about a particular turn in the interaction (e.g., feedback).