Reconsidering the Noticing Hypothesis

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ABSTRACT

In acquiring second language speaking skills, the Noticing Hypothesis claims that the learners need to notice the gap between what learners can say in their inter-language and what they want to say in the target language. This paper deals with three questions which arose from my teaching practice about the hypothesis: At what point during the time of articulation does noticing occur? What conditions allow the learners to notice the gap? Are there any unnoticeable formal elements? The review of the literature shows that learners can notice the gap only when they have sufficient grammar knowledge, enough time to monitor their production, and the intention to review their own production. Second, while phonological and morphological errors are easily noticed, major structures of the utterance are unable to be noticed and are not restructured. Third, content words are more easily attended to than function words. Finally, exactly when the noticing can occur in one articulation is left unmentioned in the Noticing Hypothesis, namely at the onset or in the middle of or after the articulation. Based on these findings it can be concluded that noticing can occur only under certain conditions.

INTRODUCTION

Quite a few SLA theories have been introduced over the past years. Among them is the Noticing Hypothesis (Schmidt, 1990; 1993; 1994; Schmidt & Frota, 1986), which posits that

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noticing the gap in language form between the target language (TL) and inter-language (IL) leads to second language acquisition (SLA), and when the gap is noticed, it becomes intake. In other words, through noticing the gap and then closing it, learners become able to acquire the second language. The notion of the Noticing Hypothesis has been accepted in the community of SLA; however, in applying this theory to classroom practice, three questions arise. First, when do learners notice the gap? Is it before their articulation, in the course of articulation, or after that? Also, are the learners able to notice the gap under any condition? Lastly, are the features of noticed formal elements in the gap noticeable by all learners at every level? This paper reconsiders the Noticing Hypothesis, looking for the answers to the three questions above, in the hope that teachers can better apply the knowledge from the Noticing Hypothesis to our classroom practice.

REVIEW OF THE LITERATURE

The Noticing Hypothesis

The Noticing Hypothesis (Schmidt, 1990; 1993; 1994; Schmidt & Frota, 1986) offers three major claims: "noticing is the necessary and sufficient condition for the conversion of input to intake for learning" (Schmidt, 1994, p.17), "what must be attended to and noticed is not just the input in a global sense but whatever features of the input are relevant for the target system", and "attention is what allows speakers to become aware of a mismatch or gap between what they can produce and what they need to produce, as well as between what they produce and what proficient target language speakers produce" (Schmidt, 2001, p.6). It has been pointed out that the main focus of the Noticing Hypothesis (Schmidt, 1990; 1993; 1994; Schmidt & Frota, 1986) has been on whether conscious attention is necessary or not for the acquisition of the targeted form of input (Robinson, 1995). This is what Schmidt (1990) claims in his own words, "If noticed, it becomes intake" (p.139).

With regard to whether the auditory input processing does or does not require consciousness in one's brain, cognitive studies provide some theories that may help us understand how auditory input and consciousness are connected. According to Anderson (2009) auditory input information first comes into an auditory sensory store called echoic memory only for a brief period of time. Sams, Hari, Rif and Knuutila (1993) note that information in the sensory store is easily lost within 10 seconds unless attended to. According to Baddeley (2002), information in an auditory sensory store then gets into the working

memory, which has a limited capacity with a memory span of four chunks. Here, important information is selected by attention. When the capacity of the working memory is filled, recently input information pushes out old information, which is then lost forever. After being attended to and rehearsed in the working memory, the information is stored in long-term memory, where it remains in reserve and available for the learners' future use of language. Thus, attention promotes learning.

Critical Views on the Noticing Hypothesis

The Noticing Hypothesis has gained positive attention; however, it has received objections as well. The first three are on whether conscious attention is necessary or not for the acquisition of the targeted form of input. As stated in the previous section, Schmidt (1994) claims that input process needs consciousness, while Tomline and Villa (1994) do not agree with that. Also Gass et al. (2003) demonstrate that noticing does not take effect in the SLA process in some areas of language. Furthermore, it shows some diminishing effect on the proficiency of advanced learners. They investigated how focused attention takes effect in three linguistic areas: syntax, morphosyntax, and lexicon, and also on proficiency in different points of language development. The result showed that attention had the greatest effect on syntax and the least on lexicon. With regard to proficiency, attention had the most diminishing effect on advanced level learners and the least on beginner level learners. The third objection is posed by Truscott (1998), who argues that, "the acquisition of metalinguistic knowledge is tied to noticing, while development of competence is not" (p.124). Truscott claims that both conscious and unconscious knowledge play equally important roles in the study of language and not every aspect of second language acquisition needs noticing. This view is also supported by Cross (2002).

The other criticism comes from a cognitive perspective by Tomline and Villa (1994). They express their doubts about the use of a diary study for the purpose of researching how noticing operates during the course of learners' L2 input processing. They point out that the cognitive processing of L2 input occurs in brief spans of time such as seconds or even parts of seconds, while the diary study encompasses a large span of time such as several weeks.

As reviewed, the focus of most of the discussions, either negative or positive, is whether SLA does or does not require conscious processing of incoming information. Three questions still remain: When are learners able to notice the gap? What conditions allow learners to notice the gap? And what language features can be noticed depending on the developmental levels of learners? In order to explore the answers to the questions,

self-monitoring theories will be visited.

Three Questions about the Noticing Hypothesis
At What Point during Articulation does Noticing Take Place?

The self-correction process, as part of closing the gap between the TL and IL, is tied to learners' attention on language form in their own production; however, the time when noticing takes place is left unmentioned in the Noticing Hypothesis (Schmidt, 1990; 1993; 1994; Schmidt & Frota, 1986). With regard to the timing of noticing, there are three levels of monitoring introduced: covert self-correction, overt self-correction, and online planning. Covert self-correction is introduced by Green, and overt self-correction by Hecht (1993), and online planning by Ellis (2005). Covert editing or self-correction occurs in a planning process at the pre-articulatory level, while overt editing or self-correction takes place at the post-articulatory level, and online planning is conducted in the middle of articulation. Ellis more precisely presents two levels of planning: pre-task planning and online planning. The first one consists of actions taken to plan the propositional content and the linguistic formulations of a message, which precedes actual articulation and can be taken as equivalent to covert self-correction, whereas online planning involves the within-task planning, which takes place during the articulation. The Noticing Hypothesis does not clearly tell us which level of monitoring is required to notice the gap in formal elements between the TL and IL.

What Conditions Allow L2 Learners to Notice the Gap?

Noticing, or self-monitoring, requires certain conditions (Krashen, 1985). In order to self-monitor output learners have to have explicit grammatical knowledge. Also conscious linguistic knowledge functions as a monitor and the monitor can take place under certain conditions that are present when there is enough time to reflect and when learners have explicit knowledge of the rule. Morrison and Low (1984) support this view that monitoring occurs only when the communication events allow the speakers to have sufficient time for doing online planning. Another condition for monitoring is that learners monitor their output in terms of how their linguistic forms successfully convey their intended meaning (Izumi and Bigelow, 2000). In other words, monitoring for meaning is a necessary condition for monitoring form. Another significant condition for monitoring is learners' intention to monitor their IL, but unless learners find their IL problematic, they do not attend to their grammatical form while they are exposed to input (Izumi and Bigelow, 2000).

Schmidt says, "noticing is the necessary and sufficient condition for the conversion of input to intake for learning" (Schmidt, 1994, p.17). However, monitor theory suggests that noticing does not always occur to every language learner. Grammatical knowledge is a presupposition, and time, intention to communicate, and intention to improve the IL are necessary to notice the gap between the TL and IL.

Are there Any Unnoticeable Formal Elements?

Learners at different linguistic development levels manage to monitor their own L2 oral output in different ways. The more advanced L2 learners become, the more capable they are of correcting a large percentage of their own errors (Green and Hecht, 1993). Advanced L2 learners monitor and then self-repair discourse-level errors more frequently than pre-intermediate learners. The more advanced learners notice complex errors and then correct as opposed to beginners who focus on simple errors (Van Hest, 1996). Also, L2 learners are unable to notice their own errors in every aspect of linguistic forms in their L2 output. Phonological and morphological errors are easily corrected, while major structures of the utterance cannot be restructured (Lennon, 1994). Content words are easier to attend to than function words (Poulise and Bongaerts, 1994).

Therefore, it can be concluded that there are some conditions which do not allow learners to notice the gap between the TL and Il. Also, there are some aspects of language form and language developmental stages in which learners do not readily notice the gap in form. Namely, noticing does not guarantee a full range of SLA because noticing only occurs under certain conditions. How are these aspects covered in classroom teaching and how can teachers best support learners to promote noticing the gap between the TL and IL?

How grammatical knowledge can be best taught in a classroom is reviewed in the next section.

Implications for Teaching

As previously reviewed, there are certain aspects learners do not notice in practical L2 conversation, especially for learners in the early stages of their language development. Then, learners need to be provided grammatical knowledge in the classroom in order to be able to be aware of formal elements in communicative tasks. On the other hand, advanced learners need to be exposed to more communicative input, as they are more ready to notice formal elements both in their input and output when they have sufficient time and intention to

practice self-monitoring. In order to enhance the learners' noticing of formal elements in the oral production through communicative tasks, learners need to be properly scaffolded in the classroom setting.

One way to provide intermediate level students with scaffolding can be the focus-on-form approach, which helps learners to notice formal elements in their oral production by shifting their attention from meaning to form in the middle of their speech production. Focus-on-form is a method that has been used in recent years to facilitate the learners' noticing of formal elements in the IL. This method entails a focus on meaning with attention to form arising out of the communicative activity (Ellis, 2006). Historically, focus-on-form has arisen from the reflection on and criticism of immersion programs such as those conducted in Canada. The students in immersion programs fail to acquire proper verb tense markings even after many years of study (Swain, 2003). Swain (1995) proposes the need for L2 learners to do more than simply engage in communication, such as attending to form in order to acquire second language competence.

Another way to teach grammatical knowledge to elementary level students is focus-on-forms, which is instruction in activities which are directed intensively at a single grammatical structure (Ellis, 2006). It is a traditional approach based on explicit explanation and drill-like practice, and its drawback is that the focus-on-forms approach if used by itself is unlikely to result in SLA with fluent and accurate communication ability (Ellis, Basturkme, et al., 2002). This approach has much less evidence to show that it results in learning that enables learners to perform the target form in their oral free production (Ellis, Baturkmen, et al., 2002). In other words, declarative knowledge needs to be turned into procedural knowledge in order for L2 learners to use it properly. Teaching grammatical points without a context requires practical application.

There is a third view on how formal elements should be taught in the classroom. DeKeyser (1997) claims that instruction with explicit knowledge followed by communicative practice is more effective on the grounds that grammar knowledge should be taught explicitly and discretely, as it is gradually learned through automatization of explicit knowledge.

As reviewed, knowledge of formal elements needs to be taught explicitly in order for the learners to clearly see the gap between the TL and IL especially for elementary level learners; however, formal knowledge by itself is not sufficient for learners to become fluent speakers. Learners need to be ready to notice the gap between the TL and IL, and further practice is needed in order to acquire fluent speaking skills.

CONCLUSION

This paper has reconsidered whether the Noticing Hypothesis (Schmidt, 1990; 1993;1994; Schmidt & Frota, 1986) is valid for the SLA process and has concluded that it does not guarantee a full range of SLA. Current research shows that there are some aspects of language form and developmental stages in which learners do not readily notice the gap between their IL and the TL. Furthermore, major structures of their utterance tend not to be noticed, although phonological and morphological errors are easily noticed. Also, non-salient features such as function words tend not to be noticed, while salient features such as information words are noticed.

With regard to learners' developmental stages, elementary level students notice few formal elements, while more advanced students are able to notice more complex formal elements, and consequently self-repair when they have sufficient time and intention to do it. The studies reviewed in this paper show that noticing does not always occur in some formal aspects of L2 for some learners at certain language developmental levels. In practice, the noticing does not guarantee that input becomes intake for every L2 learner.

In order to effectively bring formal elements to learners' attention, it may be necessary to provide scaffolding based on the learners' language developmental levels. Instruction with explicit knowledge followed by communicative practice can be effective for elementary level leaners, focus-on-form for intermediate level learners, and maximized exposure to the TL through communicative tasks for advanced level learners.

The noticed formal elements vary depending on the language developmental levels of the learners. Also, there are some formal elements unable to be noticed by the learners at certain developmental levels. The act of noticing the gap between what the learners can say and what they want to say requires considerable time and effort on the part of both students and their teachers.

Future Study

This discussion of the Noticing Hypothesis leads to several areas of future study.

First, since, originally, the Noticing Hypothesis was based on oral output and oral input only, it would be important to expand research to focus on the application of the Noticing Hypothesis to the gap between written output and visual input. For example, the role of time available to learners needs to be explored since some findings say that learners self-monitor their own production when they have sufficient time.

Second, task-based learning activities which employ the Noticing Hypothesis that students find fun and enjoyable need to be developed, especially for those who already have substantial grammatical knowledge. Intermediate and advanced-level learners more effectively notice the gap in formal elements than elementary level learners. If learners enjoy working on finding and closing the gap between the IL and TL, they are likely to learn their L2 more effectively both inside and outside the classroom.

Finally, new learning activities based on the Noticing Hypothesis need to be developed not only for students but also for their teachers. L2 teachers who become familiar with and enjoy the learning method and who improve their language fluency are more likely to become better role models and teachers for their students.

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