The Impact of Input Modifications on Listening Comprehension: A Study of Learner Perceptions

Chloé Gallien
University of Abertay Dundee

Sabine Hotho
University of Abertay Dundee

Harry Staines
University of Abertay Dundee

This paper investigates the impact of modified and authentic aural input on the perceptions of language learners in the classroom. The study is premised on the assumption that research perspectives need to differentiate between the conditions of second language learning in naturalistic and instructed or foreign language (FL) contexts. It is proposed that research into the role of input in foreign language learning must include the study of learner perceptions of, or attitudes to, different types of input as this is one of the crucial classroom variables which influences the process and outcome of learning. This article describes a study which was carried out over a period of eight weeks to explore the frequently made claim that authentic listening comprehension materials elicit more favorable attitudes from FL learners than mechanically or linguistically simplified—and supposedly more comprehensible—input. The subjects were university students of French and German. The findings of this limited study indicate that learners differentiate in their perception of input depending on the nature and presentation of input modifications. This has implications for the FL classroom and for future research in the field.


271
Over the past twenty years, the impact of input on comprehension and acquisition has become one of the main areas of study in second/foreign language acquisition (SLA/FLA) research (Gass, 1997). While it is hardly possible to argue against Gass’s provocatively simple conclusion that “second language acquisition is shaped by the input one receives...” (Gass, 1997, p. 161), our understanding of the precise role of input in second/foreign language acquisition (SLA/FLA) is still at an early stage (Ellis, 1993). Although the importance of input in SLA/FLA is fully recognized, very little is actually known about the physical and mental operations taking place when learners receive and process input, or about the relationships among comprehension, intake and acquisition. Nor is there much certainty concerning the respective merits of different types of input.

Input research is multi-dimensional and multi-disciplinary. It is concerned with: (1) the perception, decoding and identification of sounds, with the selection and recognition of strings of sounds as symbols of the target language; and (2) the interaction between new input and existing knowledge of L1 and L2 structures, syntax and lexis, discourse schemata (Rost, 1990) of situational knowledge, contextual clues and general world knowledge (Sharwood Smith, 1986, 1993). No single research paradigm can fully address these issues, and contributions from speech recognition scientists, cognitive psychologists, psycholinguists, and educators are needed to develop a fuller understanding of the effects of input on language learning and acquisition than exists today (Chaudron, 1985a; Sharwood Smith, 1993; Rost, 1990).

Types of Input

The types of input which have been examined are broadly organized into three categories, namely input generated by native speakers (NSs) for communication with other NSs (this traditionally referred to as “authentic input”), speed-modified or controlled input, and linguistically modified input. The third category can be subdivided into premodified
and interactionally modified input, with the former typically represented in language teaching materials prepared for classroom teaching, such as graded materials, and the latter a feature of direct NS/non-NS communication. Premodified input has also been referred to as pedagogically simplified or planned input (Ellis, 1993) and is characterized by simplification devices such as shorter sentences, reduction in subordination, avoidance of idiomatic expression, and replacement of low by high frequency vocabulary. Interactionally modified input has been appropriately characterized as elaborative input (Long & Ross, 1993) as it would typically contain elaborative linguistic and conversational adjustments (Long & Ross, 1993, p. 31 in particular). To date input research has been mostly concerned with the impact of these different types of input on comprehension and, to a lesser extent and with even less tangible results, on acquisition of language structures and, more recently, vocabulary in foreign language settings (Ellis, 1993, 1995).

Common sense seems to suggest that speed-controlled input and linguistically simplified language containing features such as reduced information, shorter sentences, high frequency vocabulary and other features of traditional "premodified input" should significantly enhance comprehension. Early studies have concentrated on comparisons between mechanical simplifications such as speed control and premodified input containing linguistic simplification (Long, 1985; Kelch, 1985; Griffiths, 1990). But while these studies have supported the facilitating impact of slower speech on comprehension, they have not provided unambiguous evidence for the comprehension-enhancing qualities of linguistically premodified input. It seems by no means certain that traditional linguistic simplification leads to cognitive simplification. In fact, evidence suggests that linguistic simplification can lead to a significant reduction in the contextual clues and redundancy which are normally present in natural speech, thus making linguistically simplified input at times more difficult to understand than other types of modified input (Long & Ross, 1993; Goodman & Freeman, 1993; Ellis, 1995; Gass, 1997). Regarding interactionally modified input, Pica, Young & Doughty (1987) point out that interactional modifications might contribute more significantly to comprehension than premodified non-interactional input, a claim put forward in 1983 by Long (1983), and, to some extent, supported by Loschky (1994) and Gass & Varonis (1994). Long & Ross' study (1993) takes the debate a decisive step further by pointing towards a qualitative difference between comprehension of premodified input compared with elaborative input. While both types of modified input lead to higher comprehension scores than non-modified input, premodified input is not consistently superior to elaborative input. More-
However, while premodified input seems to improve the comprehension of surface level content, elaborative input seems to facilitate deeper-level processing of content.

### Input and Second/Foreign Language Acquisition

The relationship between input or input modification and SL/FL acquisition presents a similarly complex picture. One of the most widely debated models of second language acquisition is Krashen's seminal Input Hypothesis (Krashen, 1985; see Ellis, 1990 for an overview) which states that language learners progress along a natural order of acquisition by being exposed to and understanding input that is structurally "a little bit beyond" them (the "i + 1" hypothesis). Although the model has been subjected to review and has attracted significant criticism, it has nevertheless provided focus for a large body of empirical research. But direct evidence for Krashen's hypothesis that "i+1" actually causes acquisition has remained limited (Chaudron, 1985a & b; White, 1984; Leow, 1993; Loschky, 1994). Initially, much work concentrated on the quantity of input of grammatical form and acquisition (Larsen-Freeman, 1985; Wagner-Gough & Hatch, 1975). Some studies have established a link between the frequency of morphemes in teacher input and morpheme acquisition by learners (Chaudron, 1986b) but overall the evidence for such a "mechanical" relation between input and acquisition is not strong.

Other studies concentrate on qualitative distinctions between input types and their respective impact on acquisition, leading also to a review and expansion of Krashen's concept of "i + 1." While Krashen focused more on the structural properties of input, Long, Loschky, Ellis and others place increasing emphasis on interactional input and the relation between the properties of this input and acquisition. Results, however, are either ambiguous or require further empirical substantiation. Loschky (1994), for instance, while arguing the case of interactional or negotiated input over premodified input, was not able to provide proof that greater L2 comprehension facilitated by interactional input led to greater acquisition of L2. Similarly Leow could not support the hypothesis that learners exposed to simplified written input would take in significantly more linguistic items than learners exposed to unmodified input (Leow, 1993), thus casting further doubt on the claim that simplified input facilitates intake and acquisition. Ellis (1993, 1995) has shifted the focus from acquisition of form to acquisition of vocabulary by investigating the impact of premodified and interactionally modified input. While there is some evidence that interactionally modified input facilitates acquisition and leads to acquisition of more words than
premodified input, Ellis also points out that exposure to interactionally modified input takes more time than exposure to premodified input, thus raising questions concerning the efficiency of interactional over premodified input in the context of incidental vocabulary learning.

To summarize, research into how input, comprehension and second language acquisition are linked is at an early stage (Ellis 1993; 1995), and there is consensus that a "direct relation between input and acquisition" still awaits to be proven (Loschky, 1994, p. 304; also, and much earlier, Chaudron, 1985a, 1986a).

What Constitutes Optimum Material?

Finally, input research has a strong applied dimension as the issues it raises overlap with the debate in foreign language education on what constitutes optimum language learning material. Some studies have made the point that either authentic (i.e., unedited) materials or interactionally modified discourse should form the core of language classroom input. Goodman & Freeman, for instance, strongly recommend "authentic language events" (1993) and urge the teacher to create a context-rich language environment. Similarly, Leow briefly discusses the pedagogical implications of his findings (1993), and concludes that in the language classroom authentic materials are preferable to modified materials. These conclusions echo the findings of pedagogically oriented studies more specifically concerned with premodified input as a classroom variable. In their concern for language learning materials all these studies touch on the "authenticity debate" which has accompanied the communicative approach ever since it first entered the language classroom (for a recent discussion of the debate see Gallien, 1998).

Support of authentic materials as a function of a pedagogical strategy comes from several studies investigating text difficulty and the level and improvement of comprehension performance (Gallien, 1998; Allen, Bernhardt, Berry, & Demel, 1988; Yi, 1994; Kienbaum, Barrow, Russell, & Welty, 1986). Herron & Seay's study (1991) supports the claim that exposure to authentic materials has significant impact on the development of listening skills. Duquette, Dunnett, & Papalia (1989) provide evidence that even in children the use of authentic materials can have a positive impact on the development of lexis and linguistic structures. Yet other studies modify the inclusive value of authentic materials in classroom use. Suggestions to adopt a more gradual approach abound and have been debated both in theoretical papers and empirical studies (Davies, 1984; Lynch, 1988; Griffiths, 1990). Peacock investigates the relation between input and motivation and shows that while observed motivation increased significantly when authentic materials were used, learners nevertheless consid-
tered non-authentic materials significantly more interesting (Peacock, 1997). The need for a more differentiated approach to the use of authentic materials is also suggested by Bacon & Finneman's exploration of learner dispositions towards authentic input (Bacon & Finneman, 1990). The detailed factor analysis in their study demonstrates that learner differences must be included in any study of input and its effects on the learning process. And Ellis (1995) even goes so far as to suggest that using premodified input may be more efficient than interactionally modified input, a proposal with clear implications for classroom practice.

Input research needs to provide further clarification of the relationships among input, comprehension and acquisition of a second language. In addition, we need more empirical studies on classroom variables affecting learner responses to input, and on the affective dimension of learner-input interaction, a field that has so far received little attention (Bacon & Finneman, 1990, p. 459). Input research can indeed make a significant pedagogical contribution, as the pros and cons of input modifications lie so much at the heart of the debate on what constitutes successful language teaching and classroom language learning. It is therefore more than appropriate and timely to suggest that the inclusion of classroom-related and affective variables must be viewed as a key issue for input research and as a prerequisite for a fuller understanding of the effect of input in FLA. The present study aims to contribute towards bridging the gap between linguistic and pedagogic issues pertinent to the domain of input research by focusing on learner perceptions of authentic and modified types of input.

"Testing the Water"—Input in the Foreign Language Classroom

If we agree with Skehan that "classrooms and materials can be postulated as having a direct effect upon learning" (Skehan, 1989, p. 119; also Entwistle, 1988, p. 248), it becomes crucial to explore learner responses to, or perceptions of, input as these may play a significant role in the learner's overall disposition towards the language class and the language learning process.

Research Focus

Research into the impact of input in the language classroom needs to differentiate between teacher input in presentation and interaction mode, input provided by other learners and, importantly, input, either modified or authentic, provided by printed or recorded sources. These types of input constitute the linguistic environment of the foreign language classroom which facilitates learning. The present study concentrates on
input provided by recorded sources typically used for listening comprehension activities. In line with the argument developed in the preceding section, the concern of the study is not to explore further the relation between input and acquisition, but rather to contribute to the discussion of the relation between input and learner responses.

Research Questions

The research questions addressed in this report are:
1. Does the type of input impact significantly on learner performance?
2. Does the type of input impact significantly on learner perceptions regarding the source or text in question and its function in the learning content?

Regarding student belief we ask:
1. Do students believe simplified texts to be easier than authentic texts?
2. Do students believe simplified texts to be richer in content than authentic texts?
3. Do students believe simplified texts to be more appealing than authentic texts?
4. Do students believe simplified texts to be more suitable for language learning than authentic texts?

Method

Participants

While most studies in SLA/FLA choose groups of participants learning one particular language, the present study is based on a convenience sample of two different learner groups, one learning French and the other learning German. Both learner groups were exposed to identical procedures to enable us to make cross-language comparisons.

The subjects were UK university students between 18 and 21 years old who were studying French and German. A total of 48 students participated in the study (French: 19; German: 29). The gender distribution was as follows: French: five male, 14 female; German: seven male, 22 female. The French group was composed of an intact French class at Abertay University; the German group consisted of members of a class at St. Andrews University. The French students listened and answered questionnaires as part of their class routine. The German students were volunteers. All participants had studied the target language (TL) for four to five years at secondary school level and for at least one semester at university. The German group was more advanced than the French
group, having achieved higher grades at the final stage of secondary school, and having embarked on a full-time language and literature course. The French group had entered university with lower grades, and was studying the language in a less intensively language-focused course. Scores achieved on listening comprehension during the test period formed part of the French group’s assessment; however this was not the case for the volunteer students from the German group.

**Materials**

Studies contrasting authentic and non-authentic input often tend to expose subjects to two separate sets of documents, namely to a set of authentic documents and to a set of didactic documents as found in course books, without ensuring that there are textual or thematic similarities between the two sets (Herron & Seay, 1991; Peacock, 1997). This procedure reduces the internal validity of the study.

To eliminate this flaw and to enhance the robustness of our study, eight authentic texts per language were chosen from the cassettes accompanying the language learning magazine *Authentik* and were presented to the respective groups in either the original “authentic” version or one of two modified versions (“slowed” or “linguistically simplified”). The texts were news reports and interviews, with or without background noise, from radio or TV and none exceeded three minutes. The themes were varied, as were the deliveries. The chosen texts introduced topics of general interest and were at a level of difficulty which we researchers, as experienced teachers, considered to be adequately challenging to the participants.

Four of the eight chosen documents per language were then re-recorded by the researchers at a reduced speech rate, using the transcripts given in *Authentik*. The German students were familiar with the recorders’ voices for this set of materials, but the recorders for the French material were unknown to the students.

The re-recorded texts were on average one third longer than the original version. These four texts per language constituted the set of “slowed input.” The remaining four texts per language, the “simplified input” set, were rewritten and linguistically simplified by applying commonly used devices of linguistic simplification (see below). At the same time all efforts were made in this process to avoid some of the typical pitfalls of linguistic simplification such as overt simplification or stilted language (for a discussion of this dilemma see, for instance, Long & Ross, 1993).

**Simplification Procedures**

For both languages, syntactic and grammatical structures were modified by reducing the degree of subordination, the number of infinite clauses
and pronominal references; lexis was either simplified, explained or exemplified. These modifications yielded texts which had a higher number of T units and a lower word count than the original (see Tables 1a and 1b), thus avoiding one of the problems posed by traditional linguistic simplification, reduced content. Text logic and coherence were preserved in two different ways: in German, the simplified versions followed the original source closely and cohesive devices were observed or made more explicit, while for French, all content information was extracted from the authentic source and texts were then rewritten using simplification techniques as described above, and by changing the text chronology of the original source to enhance text coherence. In both languages, the content of the texts was not simplified, nor were implicit references to extra-textual knowledge or background knowledge made more explicit. These documents were then re-recorded by native speakers in a mode which was as close to the original as possible, that is, which retained the speed and prosodic features of natural speech. By simplifying in the manner described, by recording at almost original speed, and by presenting the texts in "near-authentic mode" we produced "simplified" versions which retained much of the naturalness of the original. In particular the main pitfall of simplification, highly artificial speech, was avoided.

In the case of the German texts, the participants were aware that their texts had been manipulated; in the case of the French texts, this was not transparent. Details of text modification for the authentic-simplified pairs are summarized in Table 1.

<table>
<thead>
<tr>
<th>Table 1a: Text Modifications for French Material</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Text Type</strong></td>
</tr>
<tr>
<td>Authentic</td>
</tr>
<tr>
<td>Simplified</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Table 1b: Text Modifications for German Material</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Text Type</strong></td>
</tr>
<tr>
<td>Authentic</td>
</tr>
<tr>
<td>Simplified</td>
</tr>
</tbody>
</table>
Procedures

For listening passage and comprehension test administration purposes participants for each language were divided into two groups, French Groups A and B and German Groups A and B. The eight listening passages and their tests (see Appendix 1 for a sample comprehension test) were administered to both language groups over a period of four to eight weeks. In Stage 1 each group listened either to the authentic or to the slower version of a document, and were then given a comprehension test which asked from five to eight questions about the content of the passage. In Stage 2 each group listened either to the authentic or to the linguistically simplified version of a document and again took a simple comprehension test about the content of the passage. Exposure to different input types alternated from test to test. All participants thus listened to the same number of authentic, slow and simplified documents (see Figure 1). Informal interviews and feedback sessions also took place during and after the experiment.

Figure 1: Test Design

<table>
<thead>
<tr>
<th>Text</th>
<th>Input type</th>
<th>Group A*</th>
<th>Group B*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stage 1: Authentic/Slow</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>auth - slow</td>
<td>authentic</td>
<td>slow</td>
</tr>
<tr>
<td>2</td>
<td>auth - slow</td>
<td>slow</td>
<td>authentic</td>
</tr>
<tr>
<td>3</td>
<td>auth - slow</td>
<td>authentic</td>
<td>slow</td>
</tr>
<tr>
<td>4</td>
<td>auth - slow</td>
<td>slow</td>
<td>authentic</td>
</tr>
<tr>
<td>Stage 2: Authentic/Simplified</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>auth - simpl</td>
<td>authentic</td>
<td>simplified</td>
</tr>
<tr>
<td>6</td>
<td>auth - simpl</td>
<td>simplified</td>
<td>authentic</td>
</tr>
<tr>
<td>7</td>
<td>auth - simpl</td>
<td>authentic</td>
<td>simplified</td>
</tr>
<tr>
<td>8</td>
<td>auth - simpl</td>
<td>simplified</td>
<td>authentic</td>
</tr>
</tbody>
</table>

*= identical for French and German

Administration of Comprehension Tests

Each comprehension test followed the same pattern of administration:

1. Prior to listening, participants received from about five to eight comprehension questions (also referred to as "comprehension test") about the content of the document they were about to hear (see Appendix 1 for a sample test). They were asked to read the questions carefully before listening to the document.
2. The participants listened to the document for the first time. They were not told whether they were listening to the authentic or a modified version of the document. They were asked to take notes while listening. After a short break the document was presented for the second time, and participants added to or completed their notes.

3. The participants then answered the comprehension questions in English and were then asked to indicate how difficult they had found the passage and how much they thought they had understood, using percentages (i.e., 50% = “I have understood about half of the content”). This is referred to below as the perceived comprehension score.

4. The participants then completed a questionnaire (see Appendix 2) in which they were asked to indicate their interest in the topic of the passage. They were asked to record their view regarding the appeal of the content and the relevance of the passage for language learning and skills training purposes on a 7-point Likert scale. The items in the questionnaire matched the research questions identified above. Students were told explicitly to complete the questionnaire as spontaneously as possible.

5. We then scored the comprehension tests, using percentages to measure the participants’ performance (50% = the participant answered half of the comprehension questions correctly). This is referred to below as the real comprehension score.

Statistical Analysis

The perceived and real comprehension tests scores for both groups were then subjected to two-way analysis of variance (ANOVA) to establish whether and to what extent significant differences existed between (1) the two input variables “authentic speed” and “slow speed” and (2) the two input variables “authentic” and “linguistically simplified.” Text differences were taken into account in the analysis of input differences. The French and German groups’ Likert scale responses to the questionnaire items were also examined using two-way analysis of variance (ANOVA) to examine their attitudes towards the listening material and to investigate whether the two groups shared similar reactions.

Results

The first part of this section concentrates on the analysis of the questionnaire results and comprehension test performance data (actual performance and perceived performance). For clearer presentation of results,
the variables examined are grouped together as follows:
1. Perceived and real comprehension scores;
2. Speed and perceived difficulty of the listening text;
3. Language learning variables: useful for language learning, useful for listening comprehension training;
4. Content appeal variables: interest, information value, helpful for learning about topic, enjoyment.

The data for the input pair "authentic/linguistically simplified" showed a number of statistically significant differences between the two input types, and, importantly, with similar trends apparent for both languages. The "authentic speed/slower speed" input pair, on the other hand, led to very few statistically significant results. Not surprisingly, participants in both languages clearly perceived the speed-modified input as slower and as less difficult and also assumed that they had performed better on the slower input. This was confirmed by their actual performance. But they did not differentiate at a statistically significant level between these two input types as far as "usefulness for language learning" or "content appeal" was concerned. The texts presented at slower speed seemed linguistically easier to the participants and it seemed easier to achieve better performance scores on them, but this did not make them more "attractive" to the participants than the technically more difficult authentic texts.

As the findings for the slow/authentic pair were statistically significant only in the categories "difficulty" and "speed," a summarized presentation of data for this input pair shall suffice here (Table 2).

Table 2: Summary of ANOVA Results for Input Variables "Authentic" and "Slow"

<table>
<thead>
<tr>
<th></th>
<th>French auth/slow</th>
<th>German auth/slow</th>
</tr>
</thead>
<tbody>
<tr>
<td>Perceived perform.</td>
<td>slow higher*</td>
<td>slow higher*</td>
</tr>
<tr>
<td>Real performance</td>
<td>slow higher*</td>
<td>slow higher*</td>
</tr>
<tr>
<td>Speed</td>
<td>auth higher*</td>
<td>auth higher*</td>
</tr>
<tr>
<td>Text difficulty</td>
<td>slow easier*</td>
<td>slow easier*</td>
</tr>
<tr>
<td>Language learning</td>
<td>NS</td>
<td>NS</td>
</tr>
<tr>
<td>List.comp. training</td>
<td>NS</td>
<td>NS</td>
</tr>
<tr>
<td>Interest</td>
<td>NS</td>
<td>NS</td>
</tr>
<tr>
<td>Information value</td>
<td>NS</td>
<td>NS</td>
</tr>
<tr>
<td>Helpful for topic</td>
<td>NS</td>
<td>NS</td>
</tr>
<tr>
<td>Enjoyment</td>
<td>NS</td>
<td>NS</td>
</tr>
</tbody>
</table>

* significant at p < 0.05; NS= not significant
The remainder of this section will focus on the data for the input pair “authentic/simplified.” The issue to address first was whether and to what extent the linguistic modifications increased the comprehensibility of the texts, both in terms of participants’ perception and in terms of actual performance. To establish this, participants were asked to indicate how much they thought they had understood, and then answered the comprehension questions which accompanied each text. We then evaluated this comprehension test, using percentage points, comparing their real scores with their perceived scores. The students’ mean perceived comprehension score (as indicated by themselves) and their real comprehension score (as measured by us) are shown in Table 3 below.

Table 3: Comparison of Comprehension Test Scores for Authentic and Linguistically Simplified Input (mean ± sd)

<table>
<thead>
<tr>
<th></th>
<th>French Perceived</th>
<th>French Real</th>
<th>German Perceived</th>
<th>German Real</th>
</tr>
</thead>
<tbody>
<tr>
<td>Authentic</td>
<td>47.94 ± 12.12</td>
<td>29.91 ± 9.61</td>
<td>55.91 ± 20.21</td>
<td>53.16 ± 19.17</td>
</tr>
<tr>
<td>Linguistically simplified</td>
<td>59.47 ± 10.39</td>
<td>39.74 ± 12.10</td>
<td>72.15 ± 13.81</td>
<td>77.09 ± 14.15</td>
</tr>
<tr>
<td>Significance</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
</tr>
</tbody>
</table>

* significant at $p < 0.05$

Two-way analysis of variance for each language shows that there were significant differences between the two input types, with “linguistically simplified” having a higher mean for both perceived and real comprehension score in both languages after controlling for variation among the texts. For German, differences were significant for both the perceived comprehension score ($F[1, 105] = 22.93; p < 0.01$) and the real comprehension score ($F[1, 83] = 43.82; p < 0.01$). For French, the trend was similar (perceived comprehension score: $F[1, 37] = 11.06; p < 0.01$; real comprehension score: $F[1, 37] = 9.70; p < 0.01$). The considerable difference in real comprehension scores between the French and German groups was due to the fact that the German group was more advanced than the French group. These differences notwithstanding, the perceived comprehension scores show that participants felt they had done better on the tests for simplified input than on the tests for authentic input. Their real comprehension scores confirm this, and show that the linguistic modifications carried out on the original sources made the texts easier to understand. As students were able to provide fuller an-
swers to comprehension questions on the simplified texts, we can conclude that the simplifications increased the accessibility of the content of the passage.

While the setup of the study does not allow conclusions regarding the respective impact of grammatical and lexical modifications—an important issue which clearly needs to be explored—some conclusions can be drawn regarding the relative impact of linguistic modifications. As passages were recorded at nearly original speed, our findings suggest that linguistic modifications can increase the accessibility of content even if the delivery speed remains almost the same as in authentic speech.

Participants were then asked to indicate how fast (1 = slow, 7 = fast) and difficult (1 = not difficult, 7 = difficult) they found the passages. For German, differences were significant for speed ($F[1, 105] = 25.21; p < 0.01$) and difficulty ($F[1, 105] = 41.00; p < 0.01$). For French, the trend was similar (speed: $F[1, 37] = 24.93; p < 0.01$; difficulty: $F[1, 37] = 17.70; p < 0.01$) although the mean values for both input types were higher than for German. This mirrors the performance data.

Table 4: Perception of Speed and Text Difficulty (mean ± sd)

<table>
<thead>
<tr>
<th></th>
<th>French Speed</th>
<th>French Text difficulty</th>
<th>German Speed</th>
<th>German Text difficulty</th>
</tr>
</thead>
<tbody>
<tr>
<td>Authentic</td>
<td>6.09 ± 0.85</td>
<td>5.65 ± 0.93</td>
<td>5.35 ± 1.32</td>
<td>4.94 ± 1.41</td>
</tr>
<tr>
<td>Linguistically simplified</td>
<td>4.84 ± 1.01</td>
<td>4.42 ± 1.02</td>
<td>4.07 ± 1.26</td>
<td>3.29 ± 1.32</td>
</tr>
<tr>
<td>Significance</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
</tr>
</tbody>
</table>

* significant at $p < 0.05$

As Table 4 shows, the simplified passages were perceived as significantly slower than the authentic passages, yet the data in Tables 1a and 1b show that the actual differences, such as the words per minute count, were almost negligible. This discrepancy between actual and perceived speed might, for the German group, be due to the fact that participants recognized the speakers as their own teachers. This, however, was not the case for the French group where speakers unknown to the participants were used. We can tentatively conclude that the exposure to and processing of simpler speech and, in the case of the German students, in combination with speaker familiarity, had a significant impact on participants’ perception of the speed at which the passages were presented.
Participants in both language groups considered the simplified input to be more easily understandable than the authentic input, and they also achieved higher test scores using this type of input. This leads to the question of whether they would differentiate in a similarly consistent fashion regarding the "language learning" and "content appeal" of the two input types. Thus, the participants were asked to indicate on seven-point scales how useful they found the passages for language learning and for the training of listening comprehension skills (1 = not useful, 7 = useful), and the results are shown in Table 5.

Table 5: Useful for Language Learning and for Listening Comprehension Training (mean ± sd)

<table>
<thead>
<tr>
<th></th>
<th>French Language learning</th>
<th>Listening comprehension</th>
<th>German Language learning</th>
<th>Listening comprehension</th>
</tr>
</thead>
<tbody>
<tr>
<td>Authentic</td>
<td>4.87 ± 1.06</td>
<td>5.39 ± 0.89</td>
<td>4.91 ± 1.51</td>
<td>4.96 ± 1.52</td>
</tr>
<tr>
<td>Linguistically simplified</td>
<td>5.53 ± 0.84</td>
<td>5.58 ± 0.96</td>
<td>5.23 ± 1.26</td>
<td>5.36 ± 1.16</td>
</tr>
<tr>
<td>Significance</td>
<td>*</td>
<td>NS</td>
<td>NS</td>
<td>NS</td>
</tr>
</tbody>
</table>

*significant at $p < 0.05$; NS = not significant

Two-way analysis of variance for each language shows that for the German group there were no significant differences between the two input types after controlling for differences among texts (German: "language learning": $F[1, 105] = 1.59; p > 0.05$, "listening comprehension": $F[1, 102] = 2.63; p > 0.05$). In French, there was also no significant difference between the two input types for perception of the usefulness for training listening comprehension, ($F[1, 37] = 0.41; p > 0.05$). There was a significant difference in the students' perception of the usefulness of the input for language learning ($F[1, 37] = 4.90; p < 0.05$), but the difference was only narrowly significant. While simplified input obtained consistently higher means for "language learning" value than authentic input, these differences reached statistical significance in only one instance. It can therefore not be concluded that learners automatically attribute higher "learning value" to a type of input that they find easier to understand. Scores show an above average rating across the matrix, that is, across both input types. This suggests that learners are appreciative of both types of input as generally useful for language learning purposes.
A different picture, however, emerges when we turn to the content dimension. As Sharwood Smith (1986) and Færch & Kasper (1986) emphasize, learners process for meaning or comprehension and for learning or acquisition. But little is known about the relationship between the two types of processing, whether these occur simultaneously or not, or what mental processes are involved. Sharwood Smith and others, for instance, suggest that learners tend to focus on meaning even in contexts where they are explicitly asked to concentrate on form (Sharwood Smith, 1986, p. 243, p. 254; Van Patten, 1990; also Derwing, 1996), but further empirical data is required to gain a clearer picture. While this limited study was not designed to shed light on the cognitive processes involved in input processing, it can nonetheless provide some insight into learner preferences. Participants were asked to rate how interesting (1 = boring, 7 = interesting), and enjoyable (1 = not enjoyable, 7 = enjoyable) they found a passage. In addition they were asked to evaluate the information value of the passage (1 = not informative, 7 = informative) and whether it was helpful to understand the topic (1 = not helpful, 7 = helpful). As shown in Tables 6a and 6b, simplified input scored significantly higher on these items than authentic input.

### Table 6a: Content Appeal: Interest and Enjoyment (mean ± sd)

<table>
<thead>
<tr>
<th></th>
<th>French Interest</th>
<th>Enjoymen</th>
<th>German Interest</th>
<th>Enjoyment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Authentic</td>
<td>4.48 ± 1.08</td>
<td>4.22 ± 1.09</td>
<td>4.60 ± 1.35</td>
<td>4.11 ± 1.51</td>
</tr>
<tr>
<td>Linguistically simplified</td>
<td>5.47 ± 1.07</td>
<td>5.11 ± 1.05</td>
<td>5.71 ± 0.85</td>
<td>4.88 ± 1.49</td>
</tr>
<tr>
<td>Significance level</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
</tr>
</tbody>
</table>

### Table 6b: Content Appeal: Information Value and Helpful for Learning about Topic (mean ± sd)

<table>
<thead>
<tr>
<th></th>
<th>French Infor. value</th>
<th>Helpful</th>
<th>German Infor. value</th>
<th>Helpful</th>
</tr>
</thead>
<tbody>
<tr>
<td>Authentic</td>
<td>4.70 ± 0.93</td>
<td>4.61 ± 0.94</td>
<td>4.96 ± 1.40</td>
<td>4.73 ± 1.40</td>
</tr>
<tr>
<td>Linguistically simplified</td>
<td>5.58 ± 1.02</td>
<td>5.26 ± 1.05</td>
<td>5.77 ± 0.87</td>
<td>5.56 ± 1.25</td>
</tr>
<tr>
<td>Significance</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
</tr>
</tbody>
</table>

* significant at *p* < 0.05
Two way analysis of variance of the data for each language shows that there were significant differences between the two input types, after controlling for differences among texts, with simplified input consistently achieving the higher mean for all four content-related items (Tables 6a and 6b). For the German group, differences were significant for interest \( (F[1, 104]=28.86; p < 0.01) \), information value \( (F[1, 104] = 15.83; p < 0.01) \), “helpful for learning about the topic” \( (F(1,100) = 9.84; p < 0.01) \) and for enjoyment \( (F[1, 104] = 8.20; p < 0.01) \). The French group mirrored the trend. Significant differences were observed for interest \( (F[1, 37] = 8.83; p < 0.01) \), enjoyment \( (F[1, 37] = 7.13; p < 0.05) \), “helpful for learning about the topic” \( (F[1, 37] = 4.49; p < 0.05) \) and for information value \( (F[1, 37] = 8.17; p < 0.01) \).

The fact that the participants differentiated more markedly between authentic and simplified input when asked to comment on content than when asked about language and skills training lends limited support to the hypothesis that learners tend to process input more explicitly for meaning and content and only implicitly for acquisition. Learners, so it seems, want to know first and foremost what a passage is about, and this makes them more discriminating in their judgement of the “content value” than in their judgement of the language learning or skills learning value of the two types of input.

This summary of our results shows consistency across the two languages for the input pair “authentic” and “linguistically simplified.” Despite the differences in simplification procedures and learner levels, and despite the fact that the real comprehension scores for French were used for the participants' course assessment, while this was not the case for German, the responses obtained from the two groups of participants were very similar. This enables us to make some observations about language learner responses to and perception of input, and to draw some conclusions for teaching practice.

Discussion

In this limited pilot study the degree of real or perceived success on a listening comprehension test did not have a significant influence on participant responses to the different input types. Although the participants performed significantly better on the simplified and slower versions of the texts and were obviously aware of this difference in their performance, neither the French group (whose performance was part of their assessment) nor the German group (whose performance was not assessed) opted for the input types on which they performed best.

The participants also perceived little difference between authentic and modified types of listening input and their respective values for
language learning. Most participants did not differentiate significantly between the respective contributions of authentic, slow or simplified input to their language learning efforts or to their listening comprehension training. Instead they were favorably disposed towards all input. This, in our view, is largely due to the fact that FL learners, unlike SL learners, have limited access to target language input. Even within the FL classroom, aural input is only available on a limited basis. Thus, the quantity of their exposure to appropriate texts may be more important in this context than whether the input is authentic or not.

Statistically significant differences between authentic and modified input occurred only for those questionnaire items which related to the "appeal" and degree of thematic interest of the passage in question, in other words for items which were content-oriented, rather than language learning-oriented, and significant differences occurred only for the authentic-simplified input pair, with linguistically modified sources receiving higher scores than authentic sources. For content-related items, students differentiated significantly between linguistically simplified and authentic passages, but not between slow and authentic input. Participants, so it seems, had a strong preference for the "authentic-sounding" versions, where lexical and syntactic comprehension barriers which might have blocked access to the content of the passage had been removed without eliminating the authentic "feel" of the passage (e.g., speed, prosody, and thematic complexity).

This suggests that even when FL learners process input primarily for meaning they do not simply favor the passage which presents the fewest comprehension hurdles. If this were the case, participants would also have indicated a marked preference for the slower passages that were mechanically modified and, as performance data show, provided obviously easier input than the authentic input. Yet this did not happen. Participants favored linguistically simplified input, but not slow input over authentic input, despite the fact that speed modification, at least in this study, increased the comprehensibility of a passage markedly.

This paradox suggests that FL learners respond sensitively to input modifications. The ease with which a text can be understood (referred to here as "content accessibility") may not automatically lead to an overall favorable response to the text as a source of content. Instead, the findings of this study suggest, as far as content appreciation is concerned learners operate on a continuum with a maximum and a minimum threshold of accessibility or ease of understanding beyond or below which they, as adult learners, prefer not to be taken.

This conclusion was supported also in subsequent informal feedback sessions where participants reported "overload" symptoms in their dis-
cussion of listening comprehension in the authentic mode, but where they also labeled the slower versions “boring,” “patronizing” and perhaps only useful for learners at a very early stage of their language studies. Authentic speed was recognized as a crucial comprehension barrier but this did not make slower versions more popular. Such comments suggest that both slow and authentic input can remind learners too obviously of the fact that they are not listening for real purposes, but rather for learning purposes. Authentic sources act as a reminder of the learners’ limitations, partly because of the genuine difficulty of a text, and partly because FL learners tend to have unrealistic expectations about comprehension, “believing that in order to have understood something completely they need to decode each and every linguistic element in the input” (Færch & Kasper, 1986, p. 265). The slow input sources, on the other hand, are so obviously adjusted to the restricted competence of the FL learner that they come across as condescending—thus perhaps blocking the development of interest.

**Pedagogical Implications**

Findings from motivation research could be drawn on to provide some explanation for these responses. Experiments based on attribution theory in particular, which is concerned with the way individuals attribute events such as learning or performance success and failure to causes such as ability, effort, task difficulty or luck (Skehan, 1989; Heckhausen, 1989), could provide useful insight. Although limited, this pilot study raises some considerations for the development of FL listening exercises and future research.

The results here suggest that teachers should beware of using material that is too easy. Learners, so it seems, appreciate a challenge. But how much of a challenge? The often-made claim that authentic input, however difficult, is more interesting, motivating and appealing than modified materials, needs to be revisited through further research. “Authentic” input was well received by participants in this study, but did not score significantly better than slower versions and, notably, not as well as linguistically simplified versions. This result suggests that what may matter most to the learner is not whether a text is authentic but whether it is “accessible enough” without sounding non-genuine. These qualities, rather than merely the undiluted authenticity of a text or source, seem to promote learners’ positive reception of the material. Even though the authentic sources were judged by us to be an adequate challenge for the respective learner levels, and even though the comprehension questions provided some implicit comprehension aid, the participants nevertheless preferred a more comfortable accessibility level. This en-
abled them to focus on the content of the message since they were not unduly distracted by linguistic challenges.

Unlike the authentic or slow versions, the authentic-sounding linguistically modified passages enabled participants to listen to a passage without being reminded of their limitations as language learners. This, so it seems, supported their interest in, or involvement with, the content of the passage, and has some implications for listening material design. If, indeed, the linguistically simplified texts described here provide an interest-enhancing source of classroom materials, teachers can choose to draw on this type of input to enhance their otherwise limited supply of thematically relevant texts without fear of adversely affecting their students' motivation.

But while the reinstatement of linguistically simplified input as a useful classroom resource offers one solution to the recurrent problem of finding the right material for the language classroom, it poses a considerable challenge as well. Participants in this study saw the linguistically modified input as "just right" and in a genuine classroom environment such input can result in higher levels of motivated behavior than the non-modified source. But this is not to say that language acquisition would necessarily follow. As has already been pointed out it is still very much open to debate how and to what extent a specific type of input facilitates, leads to or hinders the acquisition of linguistic structures and lexical items or of comprehension strategies. Van Patten, for instance, claims that "only when input is easily understood can learners attend to form as part of the intake process" (1990, p. 296), thus highlighting ease of access as a prerequisite for acquisition. Faerch & Kasper, on the other hand, proposed that "if input is to function as intake to the learning of higher-level L2 materials, learners need to experience comprehension problems" (1986, p. 270).

**Conclusion**

In the absence of clear and unambiguous empirical data it is undoubtedly safer for the teacher to adopt a more eclectic approach, in line with Sharwood Smith, who puts forward the notion of a "rich communicative environment" (1986, p. 252) where the "total input is communicatively complex or 'diversified'" (ibid., p. 242) because diversified input seems "normal and conducive to acquisition" (ibid., p. 252). But how to achieve an optimum balance between input which learners find "just right" to engage with and input which challenges their comprehension sufficiently for language acquisition to occur can only be established when more empirical evidence becomes available.
Input research needs to examine more specifically the linguistic qualities of different input types. Why the level of accessibility realized in the linguistically simplified yet authentic-sounding passages in this study constituted the most favorably received level of accessibility requires further and more precise analysis in both quantitative and qualitative terms. We need to get a clearer picture of the factors, lexical or structural, which constitute text difficulty and of the critical thresholds at which input becomes either too easy or too difficult for learners to maintain their interest or so challenging that their interest disappears. This could, for instance, be measured in the ratio of known/comprehensible to unknown/incomprehensible data in the text. Matching these ratios against learner perceptions should provide valuable insight into the notion of text difficulty.

Finally and most importantly the relation between accessibility of input and learner perceptions must be mapped against the acquisition of language structures and lexical items. This, of course, remains the most important and the most elusive challenge empirical and theoretical input researchers have to address.

Notes
1. *Authentik* is a language learning magazine published bi-monthly by Authentik Language Learning Resources Ltd, a campus company associated with Trinity College Dublin. The magazine and accompanying cassette feature a wide range of authentic texts on current issues taken from newspapers, magazines and radio broadcasts, and are suitable for first year university students. Materials are graded according to level of difficulty, and for this study only texts rating at the highest level of difficulty were selected.

Chloë Gallien is a lecturer in the Division of Languages, Communication and International Studies at the University of Abertay. Her main research is in applied linguistics, particularly the use of authentic materials and tasks in language teaching, and she has co-authored five language courses.

Dr. Sabine Hotho is a senior lecturer in the Division of Languages, Communication and International Studies, University of Abertay. Her research is in literary studies and applied linguistics and she is interested in L2 motivation in the foreign language classroom and in classroom factors such as task and input.

Dr. Harry Staines is a senior lecturer in Statistics in the School of Computing, University of Abertay. He has taken part in numerous research projects in the biological sciences and management areas, and his particular interests are sample survey techniques, analysis of experiments and multivariate statistical methods.
References


(Received October 3, 1999; revised July 8, 2000)

---

**Appendix 1: Sample Listening Comprehension Test**

**Name:**

**Date:**

**Procedure:**

1. Read the following questions carefully before listening to the recording.
2. Listen to the recording for the first time, without stopping the tape, and take notes in the space provided (Notes). Continue over the page if you need to do so. You may choose to take notes in whichever language you prefer.
3. Listen to the recording a second time, without stopping the tape, and add to your notes in a differently coloured pen.
4. Write your answers in English.
5. Complete the attached questionnaire.

In this news item the reporter talks about student demonstrations in Germany.

**Questions:**

1. How many students are gathering in Bonn and what are they protesting against?
2. How do students describe the conditions under which they are studying? Give details.
3. What is planned in Göttingen?
4. What are students at the University of Kiel planning?
5. What is the situation in Flensburg? What are students doing/not doing here?
6. What is the situation in Mecklenburg-Vorpommern (Universities of Rostock, Greifswald, Wismar, Stralsund)?

**Notes:**
Appendix 2: Questionnaire

What did you think of this listening passage?

The purpose of this questionnaire is to assess the value of the listening passage used in class today. This is not a test, and there are therefore no correct or wrong answers. We are interested in your impressions and spontaneous reactions.

How to complete the questionnaire

Please mark ONE ‘X’ on each scale to indicate how you would rate the passage against the respective concept.

EXAMPLES:

If the word at either end of the passage very strongly describes your views, you would place your ‘X’ as shown below:

fascinating _X/__/___/__/__/__/__/__/ mild
or
fascinating __/__/__/__/__/__/__/__/__/ mild

If the word at either end of the passage somewhat describes your views, you would place your ‘X’ as shown below:

fascinating __/__/__/__/__/__/__/__/__/ mild
fascinating __/__/__/__/__/__/__/__/__/ mild

If the word at either end of the passage slightly describes your views, you would place your ‘X’ as shown below:

fascinating __/__/__/__/__/__/__/__/__/ mild
fascinating __/__/__/__/__/__/__/__/__/ mild

If your view is neutral, place your ‘X’ in the middle.

Now over to you:

I found this passage:

interesting __/__/__/__/__/__/__/__/__/ boring
not helpful for topic __/__/__/__/__/__/__/__/__/ helpful for topic
not informative __/__/__/__/__/__/__/__/__/ informative
enjoyable __/__/__/__/__/__/__/__/__/ not enjoyable
useful for lang learning __/__/__/__/__/__/__/__/__/ not useful for lang learning
difficult __/__/__/__/__/__/__/__/__/ not difficult
useful for training listening comp __/__/__/__/__/__/__/__/__/ not useful for training listening comp
slow __/__/__/__/__/__/__/__/__/ fast

Would you be interested in listening to the second half of the passage or not?

interested __/__/__/__/__/__/__/__/__/ not interested