



PERGAMON

System 28 (2000) 217–228

SYSTEM
www.elsevier.com/locate/system

The value of teletext subtitling as a medium for language learning

Helen Williams *, David Thorne

Department of Welsh, University of Wales Lampeter, Lampeter, Ceredigion SA48 7ED, UK

Received 19 August 1999; received in revised form 29 November 1999; accepted 8 December 1999

Abstract

This article describes a pilot study which aimed at gaining insights into how language learners benefit from training in interlingual subtitling. With the growth in digital broadcasting which will allow for TV and film productions to be shown with a wide choice of subtitles in many languages, there is considerable demand for skilled subtitlers, working in various language combinations, in this specialised medium. Even for students who have no desire to work in the media, the combination of aural, visual and written elements required in order to subtitle competently makes it unique as a language-learning tool. This study showed that students' communication competence in both L1 and L2 improved while they simultaneously mastered transferable skills. The use of subtitling is limited, however, mainly due to the cost and time-consuming nature of the training. It is proposed that more practically based and vocationally orientated courses, similar to subtitling, would be of benefit to language undergraduates and would contribute to increase motivation in second language acquisition. © 2000 Elsevier Science Ltd. All rights reserved.

Keywords: Subtitling; Subtitling as a language-learning device; Screen translation; Listening skills; Vocational courses; Welsh; Dialect linguistic forms; Authentic materials; Television; Video

1. Background

In 1990, Saint David's University College Lampeter, with the support of S4C (the Welsh language Fourth Channel) and a translation agency, TROSOL, launched a training programme in interlingual subtitling. The course was developed after many years' experience by the Department of Welsh in addressing the needs of linguists

* Corresponding author. Tel.: +44-1570-424861; fax: +44-1570-423874.

E-mail address: h.williams@lamp.ac.uk (H. Williams).

and the media industry in Wales. Since 1990, professional subtitlers from various European and Far Eastern countries have been trained at Lampeter, in the only dedicated subtitling suite of its kind in Britain, which has the technical facilities and qualified staff to provide full professional training and an undergraduate and post-graduate university qualification in subtitling. The Department is also a founder member of the Wales Subtitling Forum and the European Association for Studies in Screen Translation, which was created under the auspices of the European Commission. The Association brings together teachers, researchers, students, practitioners and trainees with an interest in screen translation from Europe and beyond. Its main aims are to facilitate contact, exchange experience and promote Higher Education training in the field.

The Department of Welsh's subtitling module is available to students with a thorough knowledge of spoken and written Welsh and English and who have an interest in the media. The aim of the course is to provide training in the overall principles of screen translation, embracing both linguistic and technical skills. The course is entirely practical. A series of 10 4–5-min excerpts of various types of television programmes are required to be subtitled and synchronised to the sound track. Students gain 40 credits towards their degree programme and those who reach a high enough standard in their course work are entered for the University of Wales Certificate in Screen Translation, which is verified and assessed by S4C and testifies to a professional competence, recognised by the media industry in Britain and beyond. As a result of the enhanced status enjoyed by the Welsh language in recent years and the growth in digital broadcasting, there is an increasing demand for skilled subtitlers.

2. Language acquisition skills and subtitling training

The subtitling module at Lampeter is considered a valuable course in its own right. By combining traditional linguistic studies with a more 'hands on', technical course, it provides students with practical and vocational skills training in a rapidly developing field. However, it has become apparent to trainers that there are added language acquisition benefits to be gained simultaneously.

3. Related work in the field

Research on subtitling as a medium for language learning is almost non-existent. The topic is, however, not unrelated to several other fields. These include translation and interpreting, the use of television and video for language learning and language teaching, the use of subtitles as an aid to second language acquisition and language learning and acquisition theory.

The role of translation as a tool in language acquisition at an advanced level is discussed by Newmark (1991). Savage (1994, in Jung and Vanderplank, 1994) summarises the growth of the use of video in language classrooms over the last three

decades. The benefits of using television broadcasts and subtitles as an aid to second language acquisition have been well documented by Vanderplank (1988, 1990, 1994, 1996, 1999), Neuman and Koskinen (1990) and Smith (1990). However, it is apparent that the value of subtitling as opposed to using subtitles to improve linguistic skills has yet to be fully appreciated, at least in published research. Interlingual subtitling encompasses all of the benefits of using video and television, subtitles, translation and more. The combination of aural, visual and written elements required to subtitle competently makes it unique as a language-learning tool.

Subtitling can be either *interlingual*, where the language of the television programme appears translated into the target language on the screen, or it can be *intralingual*, where it is usually targeted at a deaf audience, where the source language production is also used for the subtitles. The element of translation, which is present in interlingual and absent in intralingual distinguishes the two *genres*. Both, however, can be used successfully for language learning. Various combinations of language transfer may be practised during subtitling, depending on the requirements of the particular students. All make different demands on the students' linguistic skills and are equally as valuable.

1. L2 → L1
2. L1 → L2
3. L2 → L2
4. L1 → L1

This paper deals specifically with interlingual subtitling, i.e. L2 > L1 or L1 > L2.

4. Language skills practised during interlingual subtitling

Interlingual subtitling encompasses numerous actions, each requiring different linguistic processes. The specific skills required are listed in the order of progression:

1. *Listen attentively, recognise and fully absorb* the content of the programme/film in the L2. Many language courses have underestimated the importance of developing listening skills as an essential and integral element of language learning, preferring to focus on gist listening or listening for key words. If accurate, detailed listening skills are neglected, learners are deprived of an essential stage in their learning. Vanderplank (1999) refers to the low level of mental effort usually required to view television, which often appeals to emotions and contrasts this with the higher level of decoding skill which is required for processing printed materials. The intense nature of the listening skills required of subtitlers is considerably higher than the usual superficial level used for viewing television in the normal way and focuses attention on form as well as content.
2. *Read/view* the screen for visual clues which place the language into meaningful context. The age, social background, appearance and paralinguistic aspects such as gestures and facial expressions of the characters provide valuable

information. The learner also has to be aware of and sensitive to national characteristics and cultural nuances. By having to consider all of these elements, the learner becomes aware that communication in another language is considerably more than merely stringing together a series of words.

3. *Translate*, or more precisely, *interpret* all of the above, in an effective and natural manner, into the target language, using words, expressions and a style which accurately represents the original. Different characters and elements, in particular programme *genres*, demand different linguistic styles. Unlike straightforward translating, the learner is exposed to more of the context of the excerpt, because of the visual and oral nature of the medium. These considerations have to be integrated coherently into the subtitle text.
4. With regard to the technical considerations imposed by the medium, the subtitler has to *edit* the content in such a way that the original meaning will remain intact, but will allow for comfortable reading by the audience. Bearing in mind that most people watch television as a recreational activity, the subtitler aims to accommodate a reading speed of not more than 120/140 words per min. Unfortunately, very few people speak this slowly, so a certain amount of summarising is usually necessary. As a result, spoken speech often has to be condensed by up to one third to allow for comfortable reading by viewers. The amount of contraction varies depending on the nature of the programme. In response to pressure from pressure groups representing the deaf and hearing impaired, who fear censorship, news programmes are usually subtitled verbatim. This large volume of words is less appropriate for drama or films where the viewer depends more on visual elements and so the subtitle text is kept to a minimum.
5. *Consider the register* of the language of the subtitles. Subtitling involves transferring *spoken* language into *written* language and this aspect needs particular consideration. The subtitler needs to have a wide repertoire of writing styles to be able to accurately reflect the intended programme style. For example, whereas abbreviated verbal forms such as *isn't* or *aren't* are acceptable in dramas or soap operas, their use would be discouraged in more formal documentaries. If one accepts that subtitles should be a model of literacy, one needs to consider whether dubious linguistic forms should be reproduced verbatim. Other considerations which come in to play are the representation of swearing, taboo forms, dialect forms, jokes and puns which play on words for their humorous effect.
6. *Create* easy-to-read subtitles which enable the viewer to absorb the programme's meaning as effortlessly as possible whilst ensuring total comprehension.
7. *Display* the target language version in an aesthetically pleasing, accessible and consistent way on the screen, whilst keeping the syntactical units intact and respecting punctuation conventions. It is also important that the subtitles appear in a smooth and rhythmical manner as jerky or flashing subtitles distract from the content.
8. *Review* subtitles with tutor and *discuss* the choices made. This may be conducted in the target language, which gives the student an opportunity to use

the language acquired during the subtitling exercises in a meaningful context. It inevitably involves being critical about one's own speech and writing, editing, proof reading and checking skills. It is during this stage that much of the language learning is conducted, as students justify their choices.

9. *Respect technical conventions*: these include not allowing subtitles to overrun cuts in the film, allowing at least $\frac{1}{4}$ second between each subtitle, locating individual subtitles at least three to four frames from cuts and adhering to the rules regarding the acceptable number of lines and 'add-ons'.

In addition to the linguistic and technical skills described above, subtitling demands a proficiency in IT skills. Files of subtitles, synchronised with screen images, are created on a word processor for each programme and need to be stored securely. The files are later retrieved and the subtitles are displayed on the video screen. The technology element can be a motivating experience for those students who have a basic knowledge but for students with limited IT skills, this element of the course can be daunting. Within a short time, however, the technology ceases to be the focus of the activity and becomes the user's tool to accomplish the task of creating subtitles which the viewer can assimilate as easily and as rapidly as psychological and technological constraints allow. Indeed, to some students the IT element of the course provides a welcome contrast on a degree programme which is based heavily on literature.

Learning to subtitle interlingually is a complicated process, just as learning a second language is complicated. Both demand integrating numerous facets and skills and combining them to create a coherent and cohesive final product. Language instructors have often been accused of not demanding enough of their learners. Interlingual subtitling certainly demands perseverance, commitment and a high standard of linguistic skills.

The element of choice is an important aspect of the training. During the assessed course work, a student may choose to concentrate on a *genre* with which s/he feels more confident. However, in the final 3-h examination, students are required to choose both a drama, which might include comedy or a soap opera, and a documentary which would be in a more formal register.

5. Intralingual subtitling (L1 > L1 and/or L2 > L2)

Intralingual subtitling provides a different set of challenges for second language students. One would expect students to feel more at ease subtitling from L2 to L2, because the element of translating is absent. However, students usually feel more confident working from their L2 to L1 as their linguistic repertoire in a wide variety of *genres* is more sophisticated. Any benefits gained from having the vocabulary available, are offset by the task of creating the target text in a concise, grammatically correct, well-punctuated and unambiguous written form, from what may have been an inconcise, unwieldy and rambling, oral source.

6. Lampeter pilot study

Whilst teaching subtitling to second language students of Welsh, several problems became apparent. These were mainly concerned with:

1. Difficulties in understanding the spoken register in dramas, soap operas and comedy programmes: second language students of Welsh are usually more familiar with literary linguistic forms, as a formal register is used for course assignments and lectures. The emphasis of the degree programme, as in the majority of modern language degree courses, is on discussing literature in formal, academic surroundings. As the compilation of programme excerpts included examples of speech from linguistically diverse areas of the country, difficulties arose in understanding dialectal forms of the language and strong regional accents.
2. Gaps in vocabulary: as the students were required to generate subtitles for up to 10 television programmes across a wide range of programme *genres*, including soap operas, drama, documentaries, plays, films, children's programmes, satire, comedy and current affairs, the range of vocabulary required is exceptionally wide. Students whose main contact with the language has been literary encounter difficulties with vocabulary from such diverse areas.
3. Difficulties in summarising content of the target language into the L1: in order to conform to an acceptable words per min reading rate, rather than simply omit individual words or phrases, speech often has to be reworded completely in a more economic and succinct fashion. Students were often tempted to translate word for word and as result, run out of space and time.

Rather than consider these issues as a hindrance to the subtitling training, it was decided to use the subtitling process as a medium for improving language skills. Indeed, it was considered as an added bonus that learners would enrich their linguistic repertoire and at the same time, accumulate a portfolio of transferable skills. With growing emphasis on providing students with personal and relevant skills which will help them to obtain work, Coleman (1992, p. 35) maintains that language students should be able to combine a practical element with the more conventionally intellectual and solitary academic activities. Since employers tend to view language graduates as experts in communication, he argues "it seems appropriate to acquaint students with some of the tools of the professional communicator".

In practice, increasing the emphasis on language instruction meant more resources had to be allocated, to allow for proper attention to problematic linguistic forms.

7. Method of teaching

1. A 2-day intensive induction course was held at the beginning of the academic session, during which the students acquired basic subtitling techniques.
2. Thereafter, group sessions were held on a weekly basis over two terms. During these sessions problems relating to vocabulary, idioms, proverbs, and dialectal

forms were discussed as the students worked through the programmes. Strategies on how to decipher unintelligible and inaudible dialogue were discussed. Students were encouraged to take notes on newly acquired expressions and succinct ways of conveying meaning, e.g. using ‘*many*’ or ‘*much*’ instead of ‘*a lot of*’, and ‘*we/us*’ rather than ‘*me and you*’, thereby creating a personal directory of useful, concise phrases for future reference. The subtitling trainer had expertise in second language acquisition and could deal with problems as if they had arisen in a language class.

3. Tutorial sessions on a one-to-one basis allowed the tutor to discuss linguistic issues and technical considerations with individual students and assessed work was returned and reviewed.
4. During independent study periods of approximately 3–4 h per week, students implemented the listening strategies and developed their own critical faculties. These new skills were then integrated into their own language competency and were used in their screen translation assignments.

8. Course content and assessment

The course consisted of four main elements:

1. A practice tape, which was not part of the assessed course work, contained television clips which were viewed by the whole group to discuss potential linguistic problems.
2. Tape 1, which was internally assessed, consisted of four set pieces — soap opera, comedy, drama and documentary. No choice was available so students acquired experience of four different *genres*. Assistance was given with interpreting unfamiliar language, with condensing content and with technical skills. The tutor acted as a ‘sounding board’ and a careful balance had to be found between encouraging students’ progress and at the same time not providing translations, for what was assessed course work.
3. From Tape 2, which was externally assessed, students were required to select four out of eight excerpts. In the past, these have included drama series, documentaries, comedies, soap opera, films, entertainment, satire, current affairs, DIY, cookery and children’s programmes. Having experimented with various programme types on Tape 1, they were able to select a *genre* which appealed to them, so that expertise could be gained in a particular field of screen translation. At this stage, the students worked more independently of the tutor but were encouraged to discuss possible interpretations with fellow students. This reflects the workplace environment situation of professional subtitlers, where one would not be expected to work in complete isolation. The tutor assisted by explaining difficult constructions in the L2 but did not provide L1 translations.
4. Students who were considered to have achieved the required level of competency necessary for public broadcast subtitlers were entered for the University of Wales Certificate in Screen Translation. This entailed a 3-h examination, set

by the external assessors (S4C). Two short excerpts (one drama and one documentary) were required to be chosen from four programmes. The examination conditions are intended to simulate realistic working environment of subtitling under pressure.

9. The role of the tutor

Apart from the initial training in producing subtitles and the ongoing assistance in helping students to develop strategies to decipher unfamiliar speech, the main role of the tutor was to encourage students to develop autonomous methods of working and to develop the confidence to make decisions under pressure of time restraints and technical constraints. Inevitably, working with computer technology meant that problems arose. When the tutor was unable to deal with these, access to technical support was fortunately available.

Above all, the tutor provided encouragement when a task seemed impossible.

10. Questionnaire

At the end of the course, students were requested to complete a questionnaire on whether or not they believed learning to subtitle had improved their Welsh language skills. They were asked which aspects of their language competence they believed had improved. The results below are based on the replies to both these questions. The general response was positive and, indeed, no negative comments were made. This is probably explained by the fact that students soon realise whether subtitling is suitable for them — usually after the intensive course. Out of the group surveyed, one student out of the group of eight left the course after experiencing difficulties with the technical aspects.

1. The most significant result was in students reporting a considerable improvement in their listening skills. Increased confidence in dealing with material in unfamiliar dialects and accents became apparent and strategies for dealing with difficult-to-understand dialogues were developed. This occasionally meant no more than discussing the excerpt with fellow students. However, because of the existence in Welsh of the mutation system and regional variations in pronunciation, certain guidelines were followed to decipher unintelligible speech. Mutation of the initial letters of words mean that if the word is unfamiliar *and* is mutated, a difficulty arises when the student looks for the meaning in a dictionary. Once aware that the word might be mutated and when the word is changed to its unmutated form, the student is more likely to successfully find a definition. An example which combines both problems arose in ‘i weu’ ‘tho’ [i w iθ θo] (to tell him), which is suspiciously similar phonetically to ‘i waith ddoe’ [i w iθ o] (to work yesterday). Students also gained confidence when, on occasions, certain phrases were so inaudible or unintelligible, even native

speakers were unable to understand. In such a situation, students were taught to interpret and evaluate the wider context of the speech act under review and to look for additional possible visual clues on the screen.

2. Students felt that their working vocabulary increased due to the diverse array of programme *genres* studied. They reported being able to extract language from the programmes, adapt it for their own purposes and build new phrases into their own language competence, e.g. ‘cadw ci a chyfarth fy hun’ (keep a dog and bark oneself) and ‘gwynt teg ar ei ôl’ (good riddance). As in Vanderplank’s (1990) study of subtitle viewers, students began to appreciate the dialectal and accentual features in the speech of characters. Due to constant exposure and replay, subjects were able to mimic characters successfully.
3. Students became more aware of their competence (or lack of competence, in some cases) in their L1. It is often taken for granted that second language students’ first language skills are of a high standard and are often not questioned. During this pilot study, it became apparent that translating into L2 from L1 also brought benefits to students’ L1 abilities. On occasions, students were forced to seek synonyms for their first choice of vocabulary, as their preferred choice was unsuitable to fit into the time allocated for the particular subtitle by the computer programme. This meant reconsidering the sentence structure, recreating the subtitle, but still retaining the meaning. Students’ working vocabulary and knowledge of grammatical structures in both languages improved. This was probably due to the fact that they had to refer constantly to a Thesaurus and to reference grammars. As the majority of language graduates would expect to be able to work in a bilingual rather than monolingual environment, it is essential that their L1 skills are as highly developed as their L2 skills. However, instructors need to adapt a sensitive approach to commenting on the shortcomings of students’ first language competence, as unguarded criticism can elicit an emotional response. It is important to show respect for students’ own dialectal forms whilst, at the same time, suggesting more standard, widely understood forms.
4. Students reported that their punctuation skills had improved. Correct punctuation is of immense importance in subtitles, since viewers have so little time to absorb the text and are unable, unless watching a video cassette, to return and reconsider or redigest subtitles they may have missed. For example, in sentences such as, ‘Come in, June’ the comma is essential to convey the correct meaning. The use of exclamation marks can be used to denote irony or sarcasm, which may otherwise be lost. Previously, students had had limited experience of various writing styles and of the punctuation conventions which are associated with writing dialogue.
5. The prolonged exposure to another language and different cultural values and the repetitive nature of the subtitling task, as they experimented with synchronisation and timing, meant that the linguistic forms and, indeed, whole sentences were drilled without the students being aware of the process, at the time of learning. However, after completing assignments, students reported the ability to repeat long passages of speech, word for word.

11. Observations made by the subtitling trainer

1. Rather than being a passive exercise of viewing television, the trainee subtitlers appeared to assume a proactive role, by interpreting and evaluating the material to make it accessible to another audience. Students developed confidence in making decisions and justifying their choices. Indeed, on many occasions the tutor's suggestions were politely rejected.
2. Students displayed an improved versatility in their writing styles. Previously, students' styles of expression were limited to the more formal, academic register. The language registers required for subtitling the various genres of programmes, however, provided an opportunity to experiment with forms of speech across the board. Students were encouraged to tailor their choice of vocabulary to the intended viewing audience, to correspond to the original version.
3. Students developed their research skills. Aware that the need for accuracy in place and personal names, when displayed on the television screen is of paramount importance, students became familiar with referring to reference works such as atlases and the Bible, to verify the spelling of unfamiliar names and words. Perfection in conveying verifiable information was aimed for.
4. Increased cultural and historical awareness was gained as a result of the content of the documentary type programmes, e.g. Celtic Radicalism, History of Non-conformity and Arthurian Legend.

12. Unanticipated benefits

Positive feedback flowed from the students as the usefulness of this kind of translation appealed to them. Not only were they mastering a valuable skill which might lead to employment, but their linguistic skills, in both source and target languages, were improving simultaneously. Students put in considerably more than the required hours of study. Once they had acquired the basic skills of subtitling, the majority began to enjoy the module. The programmes were current, real and meaningful and had a relevance which transcended the immediate needs of language learning. The gap between work and leisure narrowed. After completing a subtitling assignment, one student stated that she was "off to do some work", implying that she did not consider subtitling, with its complex variety of skills, as 'work', but enjoyment. On many occasions, peals of laughter could be heard from the subtitling suite as students attempted to subtitle comedy or satire. This increased enjoyment of viewing was partly due to enhanced listening skills. Vanderplank believes that the low anxiety level, connected to a familiar activity, such as watching television, combined with a large amount of comprehensible input just above the students' level of competence, is conducive to successful language acquisition. This study seems to confirm Vanderplank's observation. I would suggest that any language learning activity which is generally considered as enjoyable by students, is worth serious consideration.

A more positive and favourable attitude to Welsh language television soon became apparent. This increased respect towards Welsh programmes led to a cultural reappraisal for several students who had previously regarded Welsh language television output as parochial and trivial. Some students became aware, for the first time, of the variety of programmes and stated that they intended to watch the complete programme and even read the accompanying books where they were available. Increased motivation towards communicating in Welsh ensued and the language which was previously linked to literature was now seen as an issue which could be relevant to many areas of their lives.

13. Problems

1. Subtitling training is time consuming and makes considerable demands on both staff and students. A single 5-min excerpt may take many hours for a novice to complete.
2. In spite of much effort to select excerpts which form a whole, working on short excerpts can contribute to a lack of sense of wholeness, although this is often the case with translation assignments in general.
3. The initial cost of entry level of equipment can be prohibitive, but the economic use of machines can reduce costs. One machine may be sufficient, if students work in pairs or small groups. Indeed, as the cost of computer hardware falls, the acquisition of the necessary equipment may become more feasible. Even considering the initial outlay in cost, attracting more students by offering novel and vocationally orientated courses could repay in the long term.
4. Technical support is important if the tutor is to be available for language tuition.
5. Although the issue of copyright is no longer a problem in the UK since the Educational Recording Agency began issuing licences, the restrictions on the use of broadcast material for educational purposes vary from country to country. It is therefore advisable to check individual countries' regulations.

14. Conclusions

Paul Meara (1993) studied the kinds of activities in which modern language students engage. One of the main points to emerge from his study was how little time the majority of students spent on activities which are specifically designed to help them learn their second language effectively. In a further study (Meara, 1994) Meara notes that less than 10% of modern language students, when asked what language graduates should be able to do, rated highly "the ability to discuss the arts in a formal social setting", which is surprising, as most modern language degree programmes place a high emphasis on exactly this. Meara suggests that there is a serious discrepancy between the types of courses provided by the majority of Higher Education language departments and what language students expect.

Lampeter's experience in providing subtitling training for modern language students suggests that a more relevant, vocationally orientated language course, using a familiar medium, may contribute to solving the dilemma of how to motivate language students and encourage them to invest the long hours required to master a foreign language, whilst simultaneously gaining other valuable and transferable skills.

Acknowledgements

The continual support of the Department of Teletext and Interactive Services of S4C and Heulwen James of Cwmni Testun is gratefully acknowledged.

References

- Coleman, J.A., 1992. Project-based learning, transferable skills, information technology and video. *Language Learning Journal* 5, 35–37.
- Jung, H., Vanderplank, R. (Eds.), 1994. *Barriers and Bridges: Media Technology in Language Learning. Proceedings of the 1993 CETaLL Symposium on the Occasion of the 10th AILA World Congress in Amsterdam*, Peter Lang, Frankfurt.
- Meara, P., 1993. What do students do on a language course? *Language Learning Journal* 8, 26–31.
- Meara, P., 1994. What should language graduates be able to do? *Language Learning Journal* 9, 36–40.
- Neuman, S., Koskinen, P., 1990. *Using Captioned Television to Improve the Reading Proficiency of Language Minority Students*. National Captioning Institute, Falls Church, VA, USA.
- Newmark, P., 1991. *About Translation*. Multilingual Matters Ltd, Clevedon.
- Smith, J., 1990. *Closed Captioned Television and Adult Students of English as a Second Language*. Arlington Refugee Education and Employment Program, VA, USA.
- Vanderplank, R., 1988. The value of Teletext sub-titles in language learning. *ELT Journal* 42, 272–281.
- Vanderplank, R., 1990. Paying attention to the words: practical and theoretical problems in watching television programmes with uni-lingual (Ceefax) sub-titles. *System* 18 (2), 221–234.
- Vanderplank, R., 1994. Resolving inherent conflicts: autonomous language learning from popular broadcast television. In: Jung, H., Vanderplank, R. (Eds.), *Barriers and Bridges: Media Technology in Language Learning, Proceedings of the 1993 CETaLL Symposium on the Occasion of the 10th AILA World Congress in Amsterdam*, Peter Lang, Frankfurt, pp. 119–134.
- Vanderplank, R., 1996. Really active viewing with Teletext subtitles and closed captions. *Modern English Teacher* 5 (2), 32–37.
- Vanderplank, R., 1999. Global medium – global resource? Perspectives and paradoxes in using authentic broadcast material for teaching and learning English. In: Gnutzmann (Ed.), *Teaching and Learning English as a Global Language. Native and Non-native Perspectives*. Stauffenberg, Tübingen, 253–266.

Further reading

- Vanderplank, R., 1992. Non-native speakers viewers' use of Teletext subtitles in English: some exploratory studies. In: Davies, G., Hussey, M. (Eds.), *New Technologies in Language Learning*. Peter Lang, Frankfurt, pp. 89–102.
- Vanderplank, R., 1993. A very verbal medium — language learning through closed captions. *Tesol* 3 (1), 10–14.
- Vanderplank, R., 1997. Television, teletext subtitles and British studies. *British Studies Now* 8, 15–16.