

TEACHING ENGLISH TO DEAF ADULTS WITHIN AN ESOL CURRICULUM FRAMEWORK AT AUT: ISSUES AND STRATEGIES

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Abstract

Recent literature on deaf literacy has highlighted the importance of acknowledging that English is not the first language of Deaf people, and some have concluded that ESOL methodology and materials may be more suitable for teaching deaf adults to read and write in English. In the light of data from a teacher survey and some teacher reflections, this article explores the AUT experience in 2000 and 2001 of teaching English to deaf adults in two contexts: in mainstreamed classes with hearing adult migrants; and in a deaf only class, with a hearing teacher and a New Zealand Sign Language interpreter. The strategies used to address the issues which arose are discussed, and recommendations are made for future practice.

Background

In this article the term 'deaf' is used to refer to someone who is wholly or partially unable to hear. It is conventional to use 'Deaf' to refer to deaf people who identify with the Deaf culture.

Levels of literacy amongst deaf adults vary but international research shows that deaf people leave school with literacy levels well below their peers, and with low or no qualifications. Workbridge data 1994-5 quoted in Butler (2000) shows that 63% of all Deaf and hearing-impaired adults in New Zealand have no qualifications. Walker and Richards (1992) quoted in Duffy et al (1993) found that even in the best environment, only 29.9% perform at their age level or above and in the worst environment, 4.3%. Conrad quoted in Leigh (1992) cites studies conducted in Denmark, Sweden and NZ that reported performances of deaf school leavers at levels less than that of an average 10 year old. Other studies quoted in Leigh and Cummins 1992 show similar results.

Research into the teaching of English to deaf people has until relatively recently been focussed on school programmes in the USA. However some recent studies carried out in Australia, sometimes building on the research from the USA, have focussed on adults. A section of the literature in both countries has asserted that English is not the first language of profoundly and severely deaf adults. Their hearing impairment is such that they have very little or no aural access to English at a time when most children acquire their first language. Lip reading and oral skills can be taught but this is at best difficult, humiliating for the deaf person and inaccurate. Severely and profoundly deaf

people are very visual and their most natural, fullest and most culturally appropriate way of communicating is through a natural sign language. The majority of these adults therefore have a natural sign language as their first language, and might best be taught English through an ESOL curriculum (defined as one that is specifically designed to teach English to Speakers of Other Languages – that is people whose first language is not English). (Duffy et alii, 1993; Quigley and Paul 1984; Holcomb and Peyton, 1992; Wilbur, 2000; Leigh, 1992). Furthermore adults are best taught using a student centred approach and whole language methodology in line with current adult education practice (Duffy et alii, 1993), though the top-down approach for deaf learners is disputed in some recent literature, (Mayer and Akamatsu, 1999; Mayer and Wells, 2000; Power and Leigh 2000). A bilingual/bicultural model has also been advocated because severely and profoundly deaf people are a linguistic and cultural minority learning the majority language, (Paul, 1987; Duffy et alii, 1993; Wilbur 2000; Leigh 1992; Cresdee 1997).

Three Australian studies are particularly interesting with respect to this project. In 1992 Robert Cummins and Greg Leigh carried out a survey of the Adult Literacy and Basic Education network in Victoria to find out about provision for deaf literacy. They found that enrolment in literacy programmes by deaf and hearing-impaired adults had declined, in spite of the obvious urgent and growing need of deaf people for literacy skills in English. Some of the reasons were related to inadequate teacher skills and resourcing for the needs of deaf. In particular poor communication due to the lack of sign language interpreters and sign language skills on the part of the teachers, and a lack of appropriate technology (for example telephone typewriters) were mentioned. They also found that deaf adults prefer to learn in small classes with other deaf. The following year the research of the team led by Duffy for the Deaf Education Network was published. Their research, consisting of an extensive literature review and interviews with members of the deaf community and hearing and mainstream professionals, again found that the use of sign language and special classes for deaf with a teacher having knowledge of Deaf culture (preferably a Deaf person) was favoured for severely and profoundly deaf. This report also recommended that ESOL methodology and student centred whole language models of literacy education be adopted. In 1997 Donovan Cresdee published the result of his research into ESOL provision for deaf migrants in Australia. Again he found that teacher skills and resourcing for deaf adults was inadequate in most migrant programmes. He commended the work of the Deaf Education Network who had put into practice the recommendations of the Duffy report (Duffy et alii, 1993) and advocated AUSLAN (the Australian natural sign language) as a language of instruction, deaf teachers as role models and bilingual methodology.

The situation at Auckland University of Technology (AUT)

A Deaf teacher with ESOL training and fluent in New Zealand Sign Language (NZSL) would thus be the ideal for the New Zealand situation, but in the absence of Deaf trained in ESOL methodology a hearing ESOL teacher with a New Zealand Sign Language interpreter, and more recently a Deaf support tutor has been the compromise at AUT.

AUT has had deaf adults in ESOL classes with a New Zealand Sign Language interpreter and note-taker now for more than two years. The NZSL interpreter's role is to interpret what is said in class by a hearing teacher and hearing learners in English to the deaf students and to interpret back to the hearing teacher and students what is signed by the deaf learners. The note-taker's role is to take notes on the lesson so that deaf students are free to watch the interpreter and sign when necessary. In 2000 and 2001 first one (at elementary level) then three deaf adults (post beginner to post intermediate) were enrolled in hearing adult migrant English classes. In these classes students progressed to the next level after six months fulltime study if they passed the assessments.

The hearing classes consisted of adult permanent migrants learning English as an alternative language. The majority of hearing migrant students were from Mainland China, but there were a number of students from other Asian, African and South American countries. In addition since semester 1 2001 there have been between 6 and 11 deaf adults enrolled in a multi-level deaf only part-time reading and writing class.

All of the deaf students enrolled in 2001 were New Zealand born except for three, one of whom was from Korea, one from Hong Kong and one from the Middle East. Two had considerable knowledge of spoken English, two had some knowledge and the rest had none. Most were fluent in NZSL or had adequate NZSL to follow the interpreter and two had weak or limited proficiency in NZSL. The students who were born outside NZ had had to learn NZSL after arrival in New Zealand. It was uncertain how much natural sign from their own country any of these three had. Educational background varied considerably. Two had done or were doing degree studies. The others had secondary education and two had some vocational short courses at tertiary level. Goals and reasons for enrolling in English classes also ranged from general improvement for community purposes through work focused goals to goals related to further study.

Teacher education has been vital. Before their first teaching assignment with deaf students, teachers were given a short introduction to Deaf culture and guidelines for working with an interpreter. A series of meetings involving the teachers, the students, the Programme Leader and the Resource Coordinator for Deaf Students were held to review the progress of the deaf students in mainstream ESOL hearing classes and discuss any issues which arise. Since the deaf only class was set up in 2001, the teacher has had a number of meetings and discussions with the Programme Leader to discuss issues and strategies and also for general support.

The study

In early 2001 it was decided that some research into the issues and the strategies which teachers employed to address them would be beneficial to the future development of the ESOL curriculum and methodology for deaf students, as well as useful data on which to base training sessions for teachers with deaf students in their classes.

The research questions were:

1. What are the issues, which arise for teachers when deaf students are taught by a hearing teacher with a NZSL interpreter in an ESOL curriculum framework?
2. What strategies do teachers in the English Section of the School of Languages, AUT employ to address these issues?

Three teachers recorded their reflections, one in the deaf only class over two semesters (semesters 1 and 2 2001) and two teachers in hearing classes, one in each semester of 2001. Ten teachers (including those who had provided the reflections) filled in the teacher questionnaire. The quantitative data from the teacher questionnaire was collated and tabulated. The comments from the teacher questionnaire and the teacher reflections, which fell into seven broad topic areas, was collated and categorised according to topic area. The number of comments from the teacher questionnaire in each category was noted. The reflections were used mainly to elucidate the responses in the teacher questionnaire. A summary of the number of teachers responding and the classes they taught is in Table 1.

	2000	S1 2001	S2 2001	Total
Beginnner	0	1	0	1
Elementary	3	0	1	4

Intermediate **	0	4	1	5
Post Intermediate	0	0	3	3
Cert 2	1	0	0	1
Diploma	1	0	0	1
	5	5	5	15*

* Note: Two teachers were involved in teaching classes with Deaf students at two different levels in 2000 and S1 2001.

**Note: One class listed as 'Intermediate' in both semesters (the Deaf only class) was in fact multilevel - Post Beginner to Post Intermediate.

Table 1: Number of Teachers with Deaf Students in their Classes at Each Level

Only one teacher has been involved in teaching the deaf only class. The other respondents were teaching deaf in hearing classes.

Findings

Perceived usefulness of the classes for Deaf students - teacher and student perspective

A clear majority of teachers saw the classes as useful or very useful for deaf learners (see Table 2). Affective as well as linguistic benefits were mentioned by some respondents. The ratings were more positive for semester 1 2001 and 2000 courses most of which either focussed on reading and writing or were lower level classes (See Table1). In the case of the reading and writing classes this was probably because the skills taught and assessed were those that deaf people needed to learn. In lower level classes the students experienced more success than in the higher level general focus class. The teachers of the latter commented that students had a long way to go to reach the exit standard.

It is interesting to note that teachers report learner feedback in course evaluations is generally more positive than they expected. It is probable, judging by feedback from learners in the deaf only class, that affective as well as linguistic benefits are a factor. Learners in the deaf only class have indicated that learning with other Deaf is very important to them. Teacher comment on rating the usefulness of the classes for deaf learners shows that the teachers are also aware of the affective factor:

More useful for social self-esteem than for language learning. Two factors involved here are: Language outcomes vs. non-language outcomes and proficiency level of each student in the class.

When asked about the proportion of class teaching suitable for Deaf students in the classes they taught, teachers selected proportions ranging from 40% to 80%. Semester 1 2001 and 2000 classes, which consisted of courses focussed on reading and writing and lower level classes, were rated as more suitable (See Tables 1 and 3). Two out of the three responses in the 60% - 80% bracket and the one response in the 'all' bracket related to courses where reading and writing were paramount.

Numbers of Responses

	2001 and S1 2001	S2 2001	Total
Very useful	3	0	4
Useful	5	4	9
Not very useful	8	1	1
	8	5	13

Table 2: Teachers' Perception of the Usefulness of the Class for Deaf Students

Note: One respondent ticked more than one box so this person's data not included.

	2001 and S1 2001	S2 2001	Total
All	1	0	1
Over 80% but not all	0	0	0
60% - 79%	3	0	3
40% - 59%	4	3	7
Less than 40%	0	1	1
	8	4	12

Table 3: Proportion of the Class Teaching Seen by Teachers as Suitable for Deaf students

Perceived areas of weakness of Deaf learners

Overall there was perceived weakness in reading, writing, grammar and vocabulary with reading and grammar being mentioned slightly more often by teachers. (See Table 4). The lower rating for writing and vocabulary in semester 1 is probably due to the fact that writing and vocabulary were less of a focus and less demanding in the lower level classes, which predominated in these semesters.

Number of teachers identifying each skill as a weakness

	2001 and S1 2001	S2 2001	Total
Reading	7	5	12
Writing	5	4	9
Grammar	6	4	10
Vocabulary	5	3	8

Table 4: Teachers Perceptions of the main areas of weakness of the Deaf students

In reading, weak vocabulary level or range as well as difficulty in reading and interpreting questions and relating them to the text were the areas of greatest concern. This probably is at least partly due to their weaknesses in grammar. Question forms may be particularly difficult for severely and profoundly deaf people to acquire as question forms are rarely seen in authentic written texts, which provide all of their English input. Interpreting instructions, for which a range in vocabulary would be important, numeracy skills (for reading and interpreting graphs), writing appropriate answers and background general knowledge were also weaknesses mentioned more than once. At least some of these could be the result of the limited education opportunities from which many deaf people suffer (Butler, 2000).

In writing, the difficulties were also seen to be a direct result of the weaknesses in grammar and vocabulary. Coherence was specifically mentioned by one respondent as presenting difficulty for deaf students.

With regard to grammar, question forms, sentence structure, word order and verb tenses presented most difficulty for the deaf students. The contrast between the structure of English and a natural sign language could be a factor here. In addition some teachers reported that it appeared to be hard for learners to grasp abstract concepts explained through an interpreter.

In vocabulary, a lack of range was mentioned. Particularly noticeable was difficulty in understanding words involving abstractions.

Challenges for the teacher

The seven broad areas in which teachers found challenge were: working with interpreters and note-takers, catering to the special learning needs of the deaf learners, course design and planning, catering to affective needs, assessment, levels of learners, and methodology.

Working with interpreters and note-takers

Learning to work with interpreters and note-takers (and sometimes their absence) appeared to raise the greatest anxiety for class teachers (14 comments). The following excerpts summarise the main concerns – getting used to the role of the interpreter, and the impact on planning and communication strategies:

There were initial challenges of knowing how to work with an interpreter and of realising the limitations and boundaries of the interpreter's role.

Practical challenge of planning when the interpreter could take the breaks required (i.e. at a suitable break in the lesson).

The main challenge for me was not overcoming my feeling of frustration at not being able to communicate directly with the two students. I found it difficult working through a third person particularly as there was no eye contact with the students. I felt at times I was going too quickly and the students were missing things. I missed the feedback.

Remembering to speak directly at them and not the interpreter.

However these issues seemed to become less prominent as teachers developed a relationship with learners and interpreters, gained more experience with the role of the interpreter, learned to plan for the breaks, and got used to speaking directly to the learners without eye contact:

Concentrate on the students at hand - but even so a good working relationship with the interpreter is vital.

This [communication with the students] became easier as time went on and tended not to disrupt the class too much.

One teacher also found it helpful to speak more slowly and use repetition so that the interpreter had more time to interpret and students time to absorb important points. Meeting with students, teachers, programme leaders and the Disability Resource Office personnel to review progress and sort out communication problems was also important.

Catering to the special needs of deaf students and its impact on course design

The next greatest area of concern (12 mentions) was the challenge of catering to the special learning needs of the Deaf. This area overlapped with planning challenges (5 mentions) as providing for their needs impacted directly on planning. Catering for a variety of needs and interests arose in both hearing and Deaf classes.

- Hearing classes

In hearing classes the needs and interests of Deaf students (particularly those who are not migrants) were often very different from those of migrants. This was not only because of the difference in educational background, world knowledge and cultural perspective but also due to the fact that their need was exclusively for reading and writing tuition whereas the hearing migrants had a (often urgent) need for a greater amount of time focussing on listening and speaking skills. Teachers often put together alternative material for deaf learners to use but this was not a wholly satisfactory solution.

Building enough reading and writing into class time because a wholly oral/aural lesson was not really suitable. The usual focus of class work at elementary level is on oral work. R and W are usually done for homework.

Ensuring that the input was visual as much as possible. This conflicted with the hearing students' need to practice listening amap [as much as possible].

Very difficult had to plan ahead. Alternative material [provided for the deaf students to do when the class activity was not suitable for them] meant that they [the deaf students] sometimes lost the thread of the current topic, didn't get feedback from previous work/assessments.

Teachers also tried to cater to the special needs by making time for one on one help with the deaf students (e.g. when hearing students were in the language lab or doing independent oral work). This time, though severely limited, could be spent on beginning to address their unique difficulties with grammar and vocabulary and doing more reading and writing practice.

In addition input which was important for hearing learners, for example video and audio recordings used in the classroom and in the language lab, was sometimes not accessible to deaf learners because it could not be interpreted or read in transcript form quickly enough, and transcripts were sometimes not available. Where they were available (for example for language lab exercises) there was an additional worksheet to provide just for the deaf learners:

Listening and video in class not helpful to them [deaf]. Not [enough] time to do listening [exercise with a transcript] and no transcript for video.

How to include the two students in the language lab activities.

Practical challenges of trying to provide a written transcript of cassette listening

Writing up essential vocabulary arising from uncaptioned videos and listening exercises was one strategy adopted by a teacher in a hearing class. Also mentioned by several teachers was the use of transcripts of listening materials as reading activities.

- Deaf Only Class

Even in the Deaf only class, the needs and level varied widely from a need for basic literacy and study skills to a need for reading and writing for academic purposes, and interests, goals and proficiency in NZSL differed considerably from student to student. So the existing curriculum, although stating the general goals, did not provide adequate support:

Difficult to choose reading materials that suit all levels...[Deaf only class]

The curriculum content, I feel, has not served some students' needs. Trying to meet the different needs of different students has been an ongoing challenge. For example, 4 students want the class to be a workshop to go over their academic writing from mainstream classes. [Deaf only class]

Nevertheless it was important to base course design and assessment on needs analysis.

It is ... my opinion that the course needs to be driven by students' needs and not by predetermined outcomes. This is not hard to do. At least in theory, it just means that students are assessed within a competency-based framework on the skills and topics they themselves identify.

Materials and texts needed to be developed and adapted to meet these needs

- Both Hearing and Deaf only Classes

Presentation skills developed by teachers in an effort to make input as visual as possible and therefore maximally consistent with the learning mode and style of the deaf learners included greater use of the OHP and whiteboard, daily vocabulary quizzes with spelling included (as deaf people have to learn spelling visually without phonemics to help them), drawing attention to shape of words in spelling, and making grammar teaching as visual as possible. It was found to be

important to become more organised and systematic in teaching so as not to confuse the deaf learners who were accessing the information at second hand through an interpreter.

Affective needs

Catering to affective needs was next (six mentions). Teachers cited the importance and difficulty of including deaf learners in the class activities

Making them feel part of the class socially.

How to include the two Deaf students (and 1 interpreter) in oral pair/group tasks.

In fact simply putting the deaf learners in a hearing group with the interpreter worked well. Another challenge was helping them to cope with failure in assessments (especially in the higher level classes) when their previous educational experience was likely to have involved failure and confidence building was vitally important.

Having them sit assessments which they do not pass - It makes them feel failures and does not always portray that they have made progress.

In retrospect one teacher said s/he would remember the benefits as well as the challenges (for students hearing and Deaf and teachers) of having Deaf students in the class. Other suggestions were to work to win the trust of students early in the course, and to be more relaxed.

Assessment issues

Following on from and partly tied up with curriculum and planning issues were assessment issues (4 mentions). In hearing classes oral assessments had to be adapted so that the Deaf students could be assessed on the skills which were relevant for them (for example linguistic content, communication strategies, cultural norms and conversational genres which they would need for communication with hearing people in English).

Testing them on the English that was tested in the oral assessments for the hearing students, e.g. casual language, politeness, recount.

Arranging/planning oral assessments, deciding whether to ask her to use NZSL (for authenticity) or Sign English (to test her grammar and sentence construction).

Teachers addressed these challenges by doing oral assessments in NZSL for communication skills, in Signed English (lower level) or in writing (intermediate level) for linguistic content. The latter created some problems of consistency in the application of assessment criteria. Separate criteria needed to be written for assessments adapted for the deaf learners. This was especially important where they used a different medium (e.g. writing or NZSL instead of speaking). Without carefully

worked out criteria appropriate for the task and the mode it was carried out in, it was impossible to assess their level fairly consistently and accurately.

The teacher of the deaf only class gave assessment tasks at different levels to learners. The lack of availability of assessment tasks for sits and resits at different levels with the same topic content was a problem here:

Resits for lower proficiency students have been problematic because students have not always covered the content of the assessment tasks and are too low in proficiency to transfer skills.
[In the deaf only class]

Range of levels, goals and needs

Levels problems were the final issue (4 mentions) in the responses to the questionnaire. The deaf only class was of necessity a mixed level one because there were not enough students to make more than one class viable. Much reflection was focussed on coping with the multilevel nature of the class. It was imperative to plan for at least two groups if not two classes.

As it stands now the class comprises of students with: different levels of educational experience....different proficiencies in NZSL....different needs, wants and goals.

This was also a problem in one of the higher level hearing classes where the deaf students were below the level of the class, but could not be moved to a lower level class because they had already (just) passed the lower level certificate

I think that basically the class level was too difficult and the pace was too fast. [Higher level hearing class]

The only strategy listed for dealing with the level problems in the deaf only class, apart from splitting into two groups, was to use more advanced material and scaffold up the lower level students. This wasn't the ideal, only the best choice in the circumstances. It is also obviously important to limit numbers and the use of a Deaf support tutor, recommended to us by the Deaf Education Network and the Deaf Association has been invaluable in 2002. It was decided (in hindsight) that deaf students in fulltime (hearing) classes who narrowly passed might be better to audit the same level for one more semester before moving to a higher level.

Methodological issues

The final broad area of challenge was methodology and this appeared mainly in the reflections of the teacher of the deaf only class. Deciding what kind of input was most suitable for this class was an interesting challenge. After some reflection and experience the teacher concluded that two kinds

of language input were useful – ‘general knowledge’ input thought NZSL to improve the knowledge they needed to access to understand and interpret written texts, and linguistic input through relevant and interesting written texts.

The fact that Deaf students require input entirely through visual modes. In relation to literacy this means through written English. Where there is a place for classroom discussion in NZSL (via the interpreter), English language input (the instructional material) must relate to written English. If commercial ESOL materials are used, these need to be adapted so that all references to spoken language are removed.

Teaching grammar and vocabulary was also generally best approached through integrating them with the reading of whole texts with some bottom up microskills practice using grammar texts for homework tasks.

A knowledge of NZSL on the part of the teacher and students is desirable, not only for effective communication but also because contrastive analysis between NZSL and English, which have very different grammatical structures, is a help to Deaf learners. Some students had communication problems in the classroom because of their limited knowledge of NZSL and in the future we would insist that they attend NZSL classes before joining the English classes.

After some experimentation with different approaches to giving corrective feedback it was discovered by the teacher of the deaf only class that doing writing tasks in class and giving corrective feedback immediately through the interpreter was the best strategy.

The methodology found in the end to be most suitable for this class was to present a number of genre-based activities at different levels on topics of interest to students, with discussion for higher levels and a model together with scaffolding for lower levels interspersed with fluency writing for all levels. Newspaper reading was used for input and to create a purpose for writing.

Issues and insights from student feedback - deaf only versus mainstreaming in hearing classes

It is interesting to note that students appear to value the deaf only class in spite of all the limitations. Once recruited, they stay, except when other events in their lives preclude attendance. The teacher reported that there were few negative comments in student course evaluations and most were a request to address individual needs. A deaf only class was overwhelmingly preferred - good for communicating with and mutual support from other deaf, a focus on their needs, the necessity for

the teacher to slow down more in a deaf only class, feeling safer and freer to talk, feeling less isolated, and economy in the use of one interpreter for a number of students. Only two who were at the right level for both chose a hearing class over the deaf only class and this was for reasons unrelated to the actual class content. They both opted to join the deaf only class at the beginning of 2002. This feedback bears out the findings of Duffy et al (1993) Leigh and Cummins (1992) and Cresdee (1997) in research carried out with Australian deaf. Students in the deaf class have said they would ideally like to have a deaf teacher in the class for the same reasons as stated in the Australian research (although they also said that the hearing teacher with interpreter was fine).

Conclusions and recommendations

Benefits are seen by teachers and students in teaching deaf adults English in a competency based ESOL curriculum. However there are problems which need addressing. The following recommendations arise from our experience and this project:

Teachers with deaf students in their class for the first time need not only information about deaf culture and guidelines on working with an interpreter, but also information on the particular needs and areas of weakness of deaf learners. This could include the importance to them of vocabulary learning and their need to learn metalanguage for grammar. Also needed in teacher induction are guidelines on teaching strategies and methods of visual presentation to deaf learners. To this latter end teachers could be shown some of the teacher training videos available from the Deaf Education Network. (*Perceived Areas of Weakness, Challenges – 1, 2*)

A file of suitable materials and assessment tasks on topics of use and interest to deaf people needs to be created and built up for future use. (*Challenges – 2*)

If deaf students have no alternative to enrolling in a hearing class, a consistent assessment policy for the deaf students should be adopted with parallel assessments covering the content of the oral assessments and appropriate, consistent and transparent assessment criteria. (*Challenges – 4*)

Placement of students at inappropriate levels should be avoided if at all possible and placement in an all deaf class or in a reading and writing class is preferable to mainstreaming with hearing students who are also learning speaking and listening. (*Challenges – 5*)

Classes of deaf only should be small and, especially if they are bigger, a Deaf support tutor should be employed to teach alongside the hearing teacher. (*Challenges – 5*)

Hearing teachers should be encouraged to learn NZSL so that they can use contrastive analysis, as the structure of NZSL is very different from that of English, and deaf students without NZSL should be encouraged to go to NZSL classes before enrolment their first year to facilitate communication in the classroom.

(*Challenges – 6*)

An ESOL trained Deaf teacher is the ideal and until this happens a Deaf support tutor should be employed in a deaf only class. (*Student Feedback – also Australian studies*)

Further research could focus on the reasons that deaf adults do not readily access English classes and the most effective strategies for teaching English reading and writing to deaf adults in New Zealand.

Note: This article is based on a presentation given at the CLESOL 2002 conference.

References

- Butler, L. (2000). *Access? Deaf and hearing impaired students in tertiary education*. Auckland: Auckland University of Technology.
- Cresdee, D. (1999). *Improving services for deaf and hard of hearing NESB adults in Australia*. Sydney: National Centre for English Language Teaching and Research.
- Cummins, R. & Leigh, G. (1992). Adult literacy and basic education for deaf and hearing impaired people: Part 1 Service provider perspectives. *Australian Disability Review*, 1, 69-81.
- Duffy, A., Warby, L., & Phillips, J. (1993). *Nothing for my mind - key issues in literacy and numeracy for adults who are deaf or hearing impaired*. Sydney: Adult Education Centre for Deaf and Hearing Impaired Persons Inc.
- Holcomb, T. & Peyton, J.K. (1992). ESL literacy for a linguistic minority: The deaf experience. *ERIC Digest*.
- Leigh, G. (1992). Recognising diversity: Biliteracy education for deaf and hearing impaired adults: Open letter *Australian Journal for Adult Literacy - Research and Practice*, 3, 1, 16-27.
- Leigh, G. & Cummins, R. (1992). Adult literacy and basic education for deaf and hearing impaired people - Part 2: Consumer perspectives *Australian Disability Review*, 1, 83-97.
- Luke, R.A., Donnels, L. & Clarkson J.D. (1991). *Adult education, the deaf experience*. Washington: College for Continuing Education, Gallaudet University.
- Mayer, C. & Akamatsu, C.T. (1999). Bilingual-bicultural models of literacy education for deaf students: considering the claims. *Journal of Deaf Studies and Deaf Education*, 4, 1, 1-8.

- Mayer, C. & Wells C. (1996). Can the linguistic interdependence theory support a bilingual-bicultural model of literacy education for deaf students? *Journal of Deaf Studies and Deaf Education*, 1, 1, 93-107.
- Musselman, C. (2000). How do children who can't hear learn to read? *Journal of Deaf Studies and Deaf Education*, 5, 1, 9-31.
- Paul, P.V. (1987). Perspectives in using American Sign Language to teach English as a second language. *Teaching English to Deaf and Second Language Students*, 5, 3, 10-16.
- Power, D. & Leigh, G. (2000). Principles and practice of literacy development for deaf learners: A Historical overview. *Journal of Deaf Studies and Deaf Education*, 5, 1, 3-8.
- Quigley, S. P. & Paul, P.W. (1984). ASL and ESL? *Topics in Early Childhood Special Education*, 3, 4, 17-26.
- Wilbur, R.B (2000). The use of ASL to support the development of English and literacy. *Journal of Deaf Studies and Deaf Education*, 5, 1, 81-104.