

## DEVELOPING COMMUNICATION SKILLS

### The Quality of Interaction in a Cochlear Implant Rehabilitation Programme<sup>1</sup>

Morag CLARK and Umran TÜFEKÇİOĞLU

Due to technological advances in **conventional** hearing aid technology, and to a combination of advances in medical science and technology in **cochlear implant** programmes, it is now possible to provide auditory stimulation and information to almost every hearing impaired person, no matter how profound the hearing loss.

It is well known that sufficient care is not always taken to ensure that the individual needs of conventional hearing aid wearers have been met. One of the most interesting and praiseworthy features of cochlear implant programmes is the emphasis that is placed on ensuring that the device is set to meet individual needs, and to give the user the maximum opportunity to use auditory cues.

---

(1) Presentation given at "Advanced Programming and Rehabilitation Techniques Programme," Cochlear Workshop, Charmey, Switzerland, April 14 - 15, 1989.  
U. TÜFEKÇİOĞLU (Asso. Prof.). Director of the Centre for the Hearing Impaired at Anadolu University.

M. CLARK is overseas advisor for the Centre.

Nevertheless, the **availability** of auditory information is one thing but its **interpretation** in real life situations is another. At the language learning stage, a normally hearing child attributes meaning to the words he hears around him in meaningful situations. So too can hearing impaired children if a stimulating language learning environment is prepared for them.

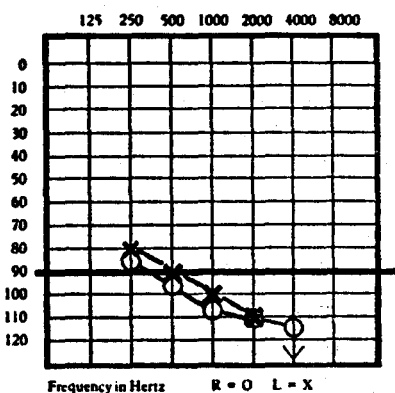
What **are** our expectations in relation to the ability of those with severe and profound hearing losses to interact with normally hearing people in the world around them? For each one here, expectations have been set in the light of our individual experience to date.

We would like to share our expectations with you as we examine briefly the communication skills of a few young adults who have had severe/profound hearing losses from birth. They are a representative sample from a programme with a **double** emphasis, namely that on (1) the maximum use of residual hearing, and (2) on the quality of interaction that the hearing impaired children and young people enjoy within it.

Video taped evidence highlighted the following areas of communication.

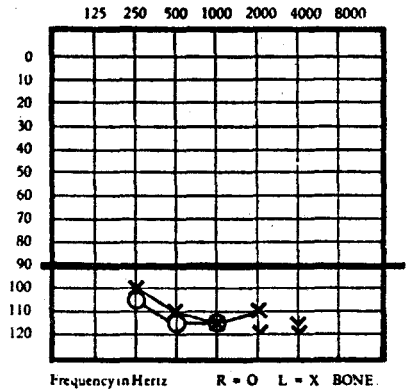
### 1. Mervyn

This young man, one of a family of seven children, from a Welsh speaking home, discussed his college course in fluent English. Not only had he a pleasant voice and easily intelligible speech but he used appropriate technical terms and colloquial language where appropriate. His conversational manner displayed very normal non-verbal as well as verbal behavior.



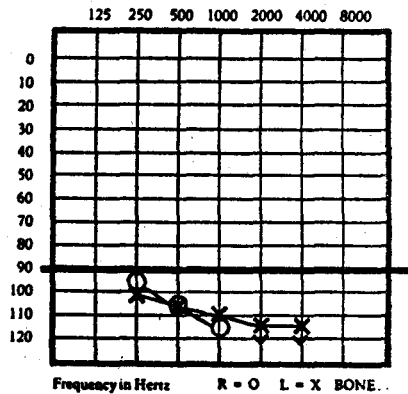
## 2. Stevan

Stevan, a multiply-handicapped young man suffers from a marked degree of athetosis, as well as from a profound hearing loss. Added to that, he had a severe burning accident at the age of five and has scarring from the ear to the knee on his left side. His sight problems and his low intellectual ability add to his problems. In spite of a profound hearing loss, it is clear that his listening skills are good as there is a marked degree of local accent in his speech which is both fluent and intelligible. His conversation is evidence that he picks up much incidental information in his work situation.



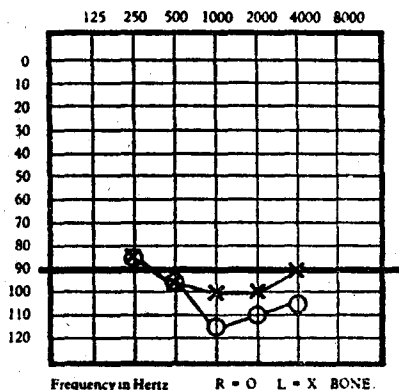
## 3. Ursula

Ursula was one of two hearing impaired children in a family of four children. Her poise and realistic self confidence come across clearly as she discusses career prospects and her preparation for University entrance in clear, intelligible speech.



#### 4. Philip

Philip makes his dependence on auditory cues very clear. He claims "to be lost" without his hearing aids. When asked if foreigners can understand him in the hotel in which he works, he shows how well adjusted he is with his casual remark of "Oh yes, they can speak English quite well."



These young people are in their late twenties and early thirties now. In their early years, cochlear implant work was in its infancy. All over the world there are young men and women of the same age and with same degree of deafness whose communication skills have **not** developed in this way. An examination of **their** early environments would undoubtedly show that the two key features, namely the maximum use of hearing and emphasis on the quality of interaction were lacking to some extent.

There are undoubtedly lessons to be learned from this experience for those involved in cochlear implant programmes. In most of these, attention to providing maximum auditory signals is good. May there just be, however, a danger of overemphasis on technology and the testing of its efficiency, at the expense of the main issue - the long term goal, in fact, namely the development of good communication skills in everyday life situations.

If maximum benefit is to ensue from a cochlear implant, care must be taken to ensure that there is a **dual emphasis** in the rehabilitation programmes:

- (1) Continued attention to the setting of the device and the monitoring of progress.
- (2) Considerable emphasis on the quality of interaction between the person implanted and those in his immediate environment.

A further examination of the environment in which the orally able young adults you have just seen, were brought up, highlights the absence of certain features from their environment.

1. No finger spelling or signing.
2. No formal sessions of auditory training.
3. No early intervention work in speech.
4. No formal language scheme.

Their degree of communication competence is the result of the total environment and what was **not** present is as significant as what **was**.

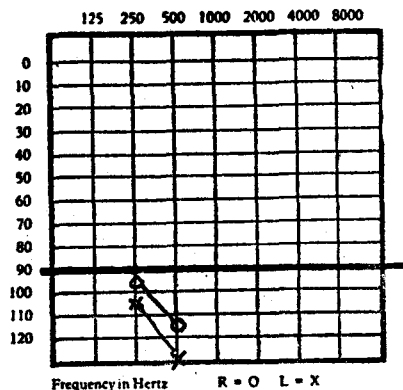
Needs vary from one person to another but, at the early stages particularly too much emphasis can not be laid on the importance of the availability of daily sessions of interaction on a one to one basis, with an adult who is a good listener and who is anxious to share meaning with the hearing impaired child.

Our Turkish programme has been deliberately modelled on the programme at Birkdale School in England in which the young men and women, you saw, grew up. We are finding the same results following the same approach with the same **dual emphasis** on the fullest possible use of auditory cues combined with daily opportunities for good quality interactions on a one to one basis with an adult well-tuned to the needs and interests of the child.

Video taped evidence highlighted the following features in a group of Turkish children all of whom had severe/profound hearing losses.

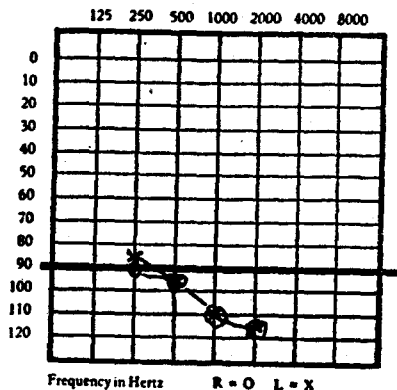
### 1. Tuğba

A simple village mother was seen building up the basic communication skill of joint attention and turn taking as she engaged her toddler in a simple routine with a ball, allowing for ample repetition in a meaningful context yet in a wholly informal way.



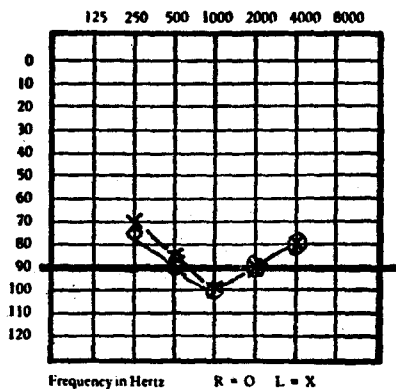
## 2. Nilhan

A seven year old had obviously learned how to negotiate meaning in a conversation and was seen asking for clarification in a most conventional way.



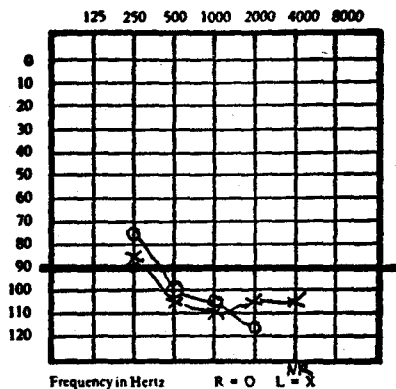
## 3. Müjde

An eight year old showed how in her interaction with her teacher, a meaning was shared through a combination of conventional spoken language, facial expression and natural gesture. The good intonation patterns were evidence to her good use of hearing.



## 4. Funda

Individual tutorial work following a group science lesson, showed how this not only reinforces the content of the lesson, but also provides opportunity for a child to verbalise the experiences of the science lesson - a very necessary part of learning.



## **Conclusion**

There are so many avenues to explore in this area of interaction that we feel it may well have relevance not only to children but also to many adults in cochlear programmes. Opportunities for good informal interaction on a one to one basis might well be considered as an important part of the rehabilitation programme for adults who have had implants after a period of time during which on account of deafness, they may well have tended to withdraw from **society**.