EXPERIENCES OF TELEPHONE USAGE

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A research study was conducted two years ago by YCIS in order to establish the factors that were influencing cochlear implant users in their telephone usage. There was evidence of wide variation in the ability of users to successfully employ telephones in their daily lives and this was the initiative for the study.

Independence

- Can you fully understand the person on the other end of the line?
- Do you have to end a call because you can't understand?
- Do you pass the handset to your partner/friend to continue the call for you because you haven't understood?
- Do you need other people to make calls for you?
- Do you think the person you are speaking to understands what you have said to them?

Figure 1

Rehabilitation appointments revealed apparent discrepancies between speech perception performance as measured on the BKB sentence test and reported telephone use. The objectives of the study were to identify the factors that were contributing to successful telephone use and to try to identify groups of patients that might benefit from future rehabilitation.

The methodology of the research study was by means of an extensive questionnaire coupled with clinical data on the relevant patients. Independent telephone use was identified as the key factor in successful telephone use (see fig 1). The influence of other factors on independent telephone use was then investigated. See figure 2 for the range of other factors investigated.

"Sphere of contact" was investigated in order to establish how wide the social contact of the person was in terms of telephone usage ranging from family, to local services, contact with national companies and finally, call centres. Some users achieve good success in family communication by telephone but struggle to extend their sphere of contact beyond that. The

Preliminary Model for Successful Telephone Use

- Sphere of Contact
- Independence
- BKB Score
- D " (D (
- A . .
- Duration of Deafness

Age

- Sound Quality
- Confidence
- Gender
- Practice
- Strategy Use



questionnaire also collected other data concerning the use of telephone equipment e.g. caller display, mobile telephones and Typetalk.

A total of 88 properly completed questionnaires were returned, (70% of survey) from people in the age range

17-82 years and 58% were female. The first encouraging result from the analysis was that 74% of

the respondents did use the telephone. There was no significant correlation found between independent telephone use and gender, age, length of implant usage and implant manufacturer. Much of the analysis was too detailed for presentation here but some key points were identified.

The longer someone had been deaf the less likely they were to use the telephone. However, 7 respondents who had never used the telephone pre implant were able to do so with their cochlear implants. Of the telephone users those who had been deaf for a long time were as likely to reach the same level of independent telephone use as those who had been deaf for a shorter duration.

The higher the BKB score the more likely someone was to be an independent telephone user. However a surprisingly high proportion of people who scored poorly on BKB testing reported that they did use the telephone. Out of 31 respondents who scored below 40% on BKB testing 13 reported that they did use the telephone.

It was encouraging to find that the majority of telephone users made calls of either the same length and frequency or only slightly less than they had done prior to deafness. 13% were actually making longer calls with their implants than they had ever managed to pre implant.

Concerning the sphere of contact 38% of users said they'd never rang local businesses or services and 60% said they never rang national companies or call centres. The presumption from these conclusions was that users either rely on friends or relatives to make their calls or they use e-mail, fax or typetalk in these situations.

Communication Strategies

Communication strategies used by respondents in order of most used first:

- Telling the other person you have a hearing impairment.
- · Double checking that you have understood correctly
- · Asking for repetition
- · Asking questions to control what you are listening for
- · Asking the other person to slow down
- · Asking 'yes' or 'no' questions
- Asking the other person to rephrase.

Figure 3

Communication strategies of course play an important part in this subject area see Figure 3. The strategies shown here are ranked in order of their reported usage and are recommended for all telephone users. It was recognised that there were limitations to the research in that it was based on subjective self reporting and there some difficulty in separating causes from effects.

There was a wide range of mix of equipment used (see figure 4). Typetalk properly featured and this valuable service is one which users either like and use consistently or dislike and use only out of necessity. A group of people used caller display and would only answer the phone numbers belonging to people that they knew were easy to understand by phone.

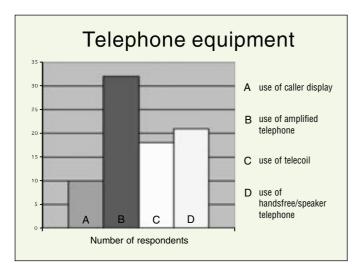


Figure 4

Most adult phone users also had mobile telephones and fairly equal numbers of people were using mobiles for text messaging and spoken phone calls. Among the younger respondents it was noted that some were using their mobile telephones to show text to each other when experiencing difficulty understanding in face to face situations.

Comments

- "I find a relaxed attitude enormously beneficial. If I feel pressured into understanding everything I probably would understand less."
- "It is much easier to use the telephone when the person with whom you are speaking is aware of your hearing difficulties. So I always ensure the person on the line knows about my deafness. The more I'm using the phone the more confident I'm becoming in using it."

Figure 5

There were many additional comments given by questionnaire respondents and just two are listed here in figure 5 but they do embrace a lot of the personal attitudes and strategies that should be employed to maximise one's success in telephone usage.

Commentators said that you need to build up quite a lot for resilience to be able to cope when things don't go as planned on the phone and the use of closed questions was highly recommended so that the answer is more succinct and understandable. In conclusion Lynne explained how the results of the research had enabled YCIS to reshape rehabilitation provision. YCIS now hosts two annual telephone/typetalk demonstration sessions, one for adults and the other of the older children and teenagers and these have proved popular.

This is a summary of the presentation made by Lynne Tapper at the NCIUA in Saltaire, November 2006. Acknowledgements were made to Catherine Killan & Andrew Scally for their work on the research study.

IMPLANT PROGRESS

Following a survey of all the implant centres in the UK, we are able to report another year of good progress in implant treatments achieved. We are grateful to all the Coordinators and their staff who contributed to this survey.

A total of 667 implant treatments were performed in the calendar year 2006. This shows an increase of 16.8% on the 2005 figures which is encouraging. In 2006, 292 adults were implanted and 375 children compared with 239 adults and 332 children in 2005. The growth in paediatric implantation, up 13%, reflects the increasing neonatal referrals from the post natal screening process which only reached national rollout during last year. Expressed in terms of implant figures per million of population the results were 11.1 per million for the UK overall.

Cumulatively the UK figure has now reached 6250 cochlear implants. Worldwide figures for implants at end 2006 have reached 130,000 including 4000 bilaterals.