

# Appendix D

## LIFE-UK IHP

(Listening Inventories for Education UK Individual Hearing Profile)

### Introduction

LIFE-UK IHP is the second in a series of self assessment questionnaires and teacher completion assessments designed to be used with the school aged child with a hearing impairment. It is made available free to download at [www.hear2learn.com](http://www.hear2learn.com).

### Background

LIFE Listening Inventories for Education. These were originally developed by Karen Anderson and Joseph Smaldino and are available at a small cost through the American Educational Audiology Association at [www.edaud.org](http://www.edaud.org). **The LIFE inventories were designed to fulfil 5 functions:**

1. provide a student self report measurement tool to identify classroom situations which present a listening challenge for an individual student.
2. provide a teacher report measurement tools to be used to document the effects of interventions to improve the listening environment of a particular student,
3. provide a valid and reliable measurement tool which could be used in a pretest and post-test format to document the effectiveness of intervention utilized to improve the classroom listening environment.
4. provide material which can be used for inservicing school personnel as to the challenges of listening in the classroom, making teachers and students aware of particular classroom listening challenges and
5. arm the teacher and students with information to encourage self-advocacy for good classroom listening environments<sup>1</sup>.

### LIFE-UK version 1.5

In 1998 work began on a nationwide trial of Classroom SoundField Amplification. In order to assess the efficacy of the trial, the LIFE student questionnaire was adopted and modified to reflect the UK educational context. The questionnaire was adapted to focus only on situations where whole classroom approaches to management of the environment were to be made. In addition a series of line drawings were commissioned to reflect a broad and non-specific educational context, which might

be identifiable for children in Junior schools and early Secondary education.

The questionnaire proved to be very popular and straightforward to administer to both hearing and hearing impaired children. It is not only reliable and sensitive to changes to the acoustic environment, but also proved to be a valuable counselling tool for both children and teachers.

As for the original LIFE inventories there is a teacher assessment tool. This is available in two forms, the first is intended to be used to identify difficulties and tailor specific interventions (such as use of personal fm systems, or modified classroom management approaches). The second is an assessment of benefit of the intervention undertaken. An additional teacher benefit schedule was devised, based on interviews with teachers who had been involved in the original trials. This is identified as LIFEUK Tool VOICE subsection questionnaire.

The LIFEUK student questionnaire has been adopted for use in the paediatric MHAS (modernising hearing aid services) first phase trial and is used widely throughout the UK.

Full versions of the LIFEUK inventories are available for free download from [www.hear2learn.com](http://www.hear2learn.com).

## LIFE-UK IHP (beta)

Following the MHAS first phase and a further 100 interviews with hearing impaired children, **the LIFEUK protocol underwent revision to reflect two issues:**

1. The specific assessment of benefit of hearing aids/cochlear implants for mainstreamed children and
1. the feedback and analysis from previous work that identified that importance of lip-reading as a factor in the placement of children.

The new LIFE-UK IHP will serve similar functions to those identified by Anderson and Smaldino. The analysis of results has been simplified and a choice of scoring sheets is provided.

## Why Beta form?

This version is currently being made available as a free download to all. It is, however, done so with the intention of collecting data and feedback, which will in turn be used for further development of this and subsequent assessment tools.

It is expected that a computerised version will be available soon. This will provide a consistent approach to the assessments. The computerised version will also be able to analysis the data and create custom reports for internal and external use. We anticipate that there will be a small fee associated with the computer program.

We will continue to make a downloadable version of this questionnaire freely available.

<sup>1</sup> Anderson and Smaldino (1998) LIFE An Efficacy Instrument, EAA

## Target group

The LIFE-UK IHP is designed to be used with children from the age of 7 years through to 14 years. It has been used successfully with children of all degrees of impairment and with children who developmentally fall within the above age range.

The LIFE-UK IHP is intended to provide information that is of benefit to all involved in the support of the child with a hearing impairment. The test can be administered by Clinical Audiologists, Audiological Physicians, Educational Audiologists, Speech and Language Therapists and Teachers of the Deaf.

## Administration

The LIFE-UK IHP is designed to be used in its printed form, the pictures forming an essential tool for eliciting a response. It is therefore recommended that a printed copy is given to each child when administering the test. The LIFE-UK consists of 5 pages of A4. The subsequent scoring sheet is a further one page of A4.

The test should be carried out in a quiet room with adequate lighting for the test. There should be a pencil or pen available for the child to mark the test.

It is important that the child understands the task required and the administrator should check the child's understanding of the task using the example provided on the first page. It is important to draw the child's attention to the situation described in the picture. If the geography of the classroom is different it might be necessary to draw the child's attention to situations their own classroom. In many rural schools traffic may not be a problem for classroom listening. However there might be times when there is noise outside the classroom from lawnmowers, workmen, outdoor games lessons or delivery vans. The orientation of the teacher to the child in the picture is important and children will generally be very sensitive to this aspect of the question.

When the child understands the task then you should proceed with the test.

In each of the 18 scenarios there is a brief description and a picture. It is important to have the question presented in a consistent manner. The child might be able to read quietly, although it is better if the child or the person administering the assessment reads each question aloud. The child should then respond by ticking or marking the response box that most closely reflects their assessment of the listening situation. If a question is not relevant to the child's experience then the administrator should indicate this on the sheet.

## Instructions:

These should be read to the child using the format on the LIFE-UK IHP form. Additional clarification can then be given. Once the child is ready to begin the test then each question should be read and a response recorded.

**Modification:**

It is quite appropriate to allow the child to relate the question to their own context. If this is done, either with encouragement or spontaneously, then comments from the child should be noted either directly on the form or on the scoring sheet in the appropriate place. The school experience of each child is highly individual and their response to typical situations can often reveal unexpected coping strategies or difficulties in the daily experience of the child.

**Use of assistive listening devices (ALD) such as direct input fm systems and soundfield systems:**

It is important to identify if the child would normally be using an assistive listening device for each scenario. Children are often very clear about the impact of such modifications and they should be given the chance to express this. If the child uses an ALD then this should be indicated in the scoring.

**Scoring:**

The mark assigned to each scenario should be scored on a scale of 1 to 5, with 1 being always easy and 5 being always difficult:

Comment	Always Easy	Mostly Easy	Sometimes Difficult	Mostly Difficult	Always Difficult
Score	1	2	3	4	5

The **first** scoring sheet allows you to record the results against each question (row). The columns can then be added to arrive at a score for each ‘type’ of school scenario.

The organisation of the score sheet will allow you to rapidly consider each type of situation. It is important, however, to note that there may be situations where ‘typical’ responses do not apply, for example a child might rely on alternative communication strategies not requiring hearing when in group settings. These should be noted in the comments section.

**Example of the first score sheet:**

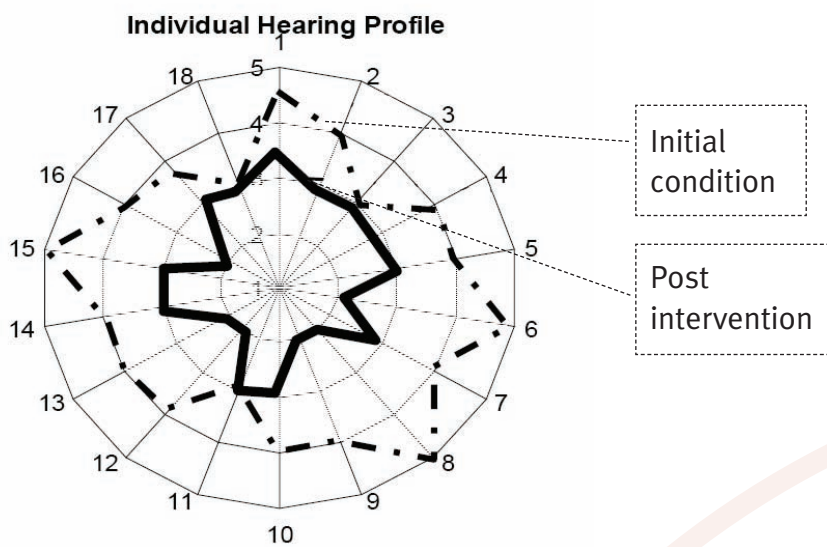
Q16										
Q17										
Q18										
<b>Type Totals</b>										
<b>Now mark Type Totals in the Chart Below:</b>										
	<b>Teacher Child Exchanges</b>				<b>Child Child Exchanges</b>					
Always easy	4-7	2-3	3-5	2-3	Always easy	2-3	2-3	2-3		1
Mostly easy	8-11	4-5	6-8	4-5	Mostly easy	4-5	4-5	4-5		2
Sometimes difficult	12-15	6-7	9-11	6-7	Sometimes difficult	6-7	6-7	6-7		3
Mostly difficult	16-19	8-9	12-14	8-9	Mostly difficult	8-9	8-9	8-9		4
Always difficult	20	10	15	10	Always difficult	10	10	10		5
	Type A	B	C	D	Type E	F	G	H		
	Noise	Quiet	Noise	Quiet	Noise	Quiet	Noise	Quiet		
	Lipreading		No Lipreading		Lipreading		No Lipreading			
COMMENTS:										

The example above is of a child who is educated in a mainstream school without the benefit of an ALD. We can see evidence of reliance on lip-reading to help overcome the difficulties associated with listening in very unfavourable conditions. Teacher observations of the child might be called upon to cross check these findings (a suitable tool would be the Teacher\_Pre\_LifeUK questionnaire available on the website [www.hear2learn.com](http://www.hear2learn.com). Appropriate interventions would probably require a multi-professional team approach.

The **second** scoring sheet provides a simple table for recording the score for each question. There are rows to allow for scores to be recorded on several occasions, such as a pre-test, post-test situation. The results can be (optionally) transferred to the radar diagram, which will allow the results to be presented in a more visual format:

**Example from the second score sheet:**

Further documentation will be made available on the website [www.hear2learn.com](http://www.hear2learn.com) shortly.



Your Name

Your Class

Today's Date

Your Date of Birth

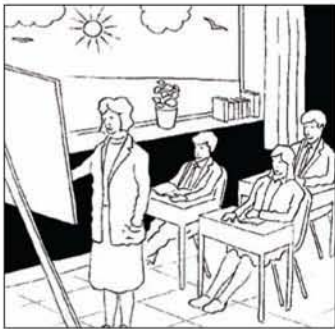
### Instructions:






You are going to be asked some questions about how well you can hear in school. For each question you will be shown a picture. **For example:**

Here is a picture of a classroom. Underneath the picture are 5 faces

The sad face means that hearing is always difficult to hear. The happy face means that it is always easy to hear. The face in the middle means that it is sometimes difficult to hear.

Now look at the picture and imagine you are in the classroom. Think about how well you can hear the words. If the teacher's words are mostly easy to hear then you should mark the picture with an X.








always easy	mostly easy	sometimes difficult	mostly difficult	always difficult
				

### Now answer all the questions:

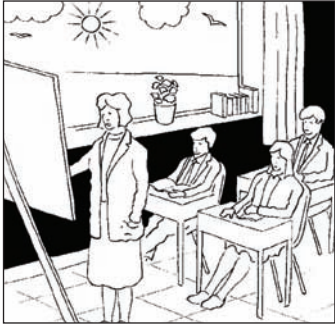
1. There is a lot of noise outside the classroom.

How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult
				

2. It is a quiet day and there is no noise from outside the classroom.  
How well can you hear the words the teacher is saying?



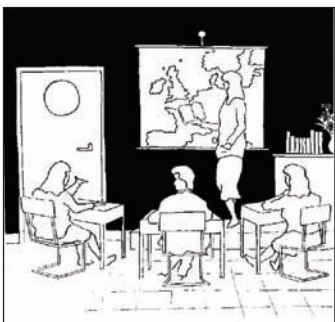
always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

3. The class have just finished an activity and are tidying up. The teacher says something to the class. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

4. The teacher is talking but you cannot see her face. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

5. The teacher is talking but there are children making a noise outside your classroom. How well can you hear the words the teacher is saying?



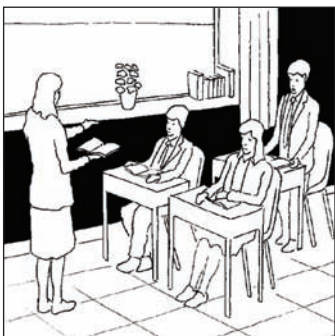
always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

6. The teacher is talking. Some other children in the class are tidying up their things, moving pencils, paper, chairs, walking around and whispering. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

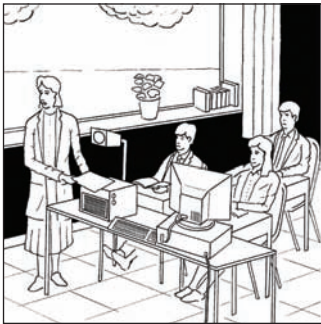
7. The teacher has asked a question to the whole class. Someone behind you is giving an answer. You need to hear the answer. How well can you hear the words?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult



8. The teacher is talking to the class and the overhead projector is on. A computer is also making a noise. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

9. The teacher is talking and moving around the room. You cannot see the teacher. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

10. The teacher is giving a test to the class. How well can you hear the words the teacher is saying?



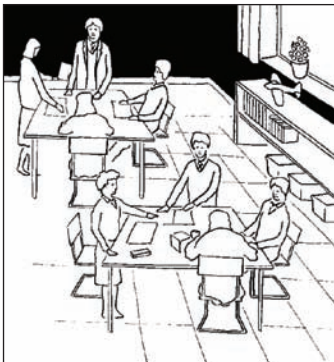
always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

11. There are two teachers in the class. They are both talking. One of the teachers is talking to you from the front of the class. You need to listen to this teacher. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

12. You are all working in groups. How well can you hear the words of other children in your group?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

13. You are in assembly. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

14. You are sitting in a circle and you can see everyone. How well can you hear the words other people are saying?



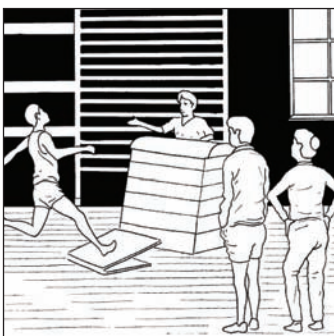
always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

15. You are talking with your friends in the playground. How well can you hear what they are saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

16. You are in the hall doing PE and moving around. How well can you hear the words the teacher is saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

17. You are in the dining hall. Someone is talking behind you. How well can you hear the words?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

18. You are in the corridor. You are talking with your friends. How well can you hear the words your friends are saying?



always easy	mostly easy	sometimes difficult	mostly difficult	always difficult

## Scoring sheet

Name of child

Date of Birth

Completed by

Internal reference

Comment	Always Easy	Mostly Easy	Sometimes Difficult	Mostly Difficult	Always Difficult
Score	1	2	3	4	5

Score										Comments
Interaction	Teacher - Child				Child - Child					
Lipreading	Yes		No		Yes		No			
Noise	Yes	No	Yes	No	Yes	No	Yes	No		
Type	A	B	C	D	E	F	G	H		
EXAMPLE			3							
Q1										
Q2										
Q3										
Q4										
Q5										
Q6										
Q7										
Q8										
Q9										
Q10										
Q11										
Q12										
Q13										
Q14										
Q15										
Q16										
Q17										
Q18										
Type Totals										

Now mark Type Totals in the Chart Below:

Teacher Child Exchanges				
Always easy	4 - 7	2 - 3	3 - 5	2 - 3
Mostly easy	8 - 11	4 - 5	6 - 8	4 - 5
Sometimes difficult	12 - 15	6 - 7	9 - 11	6 - 7
Mostly difficult	16 - 19	8 - 9	12 - 14	8 - 9
Always difficult	20	10	15	10
Type	A	B	C	D
	Noise	Quiet	Noise	Quiet
	Lipreading		No Lipreading	

Child Child Exchanges				
Always easy	2 - 3	2 - 3	2 - 3	1
Mostly easy	4 - 5	4 - 5	4 - 5	2
Sometimes difficult	6 - 7	6 - 7	6 - 7	3
Mostly difficult	8 - 9	8 - 9	8 - 9	4
Always difficult	10	10	10	5
Type	E	F	G	H
	Noise	Quiet	Noise	Quiet
	Lipreading		No Lipreading	

Comments:

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## Alternative Scoring sheet

Name of child

Date of Birth

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Completed by

.....  
Internal reference

Comment	Always Easy	Mostly Easy	Sometimes Difficult	Mostly Difficult	Always Difficult
Score	1	2	3	4	5

**Table 1**

Question Number																		
Date of test	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
Score 1																		
Score 2																		

**Comments:**

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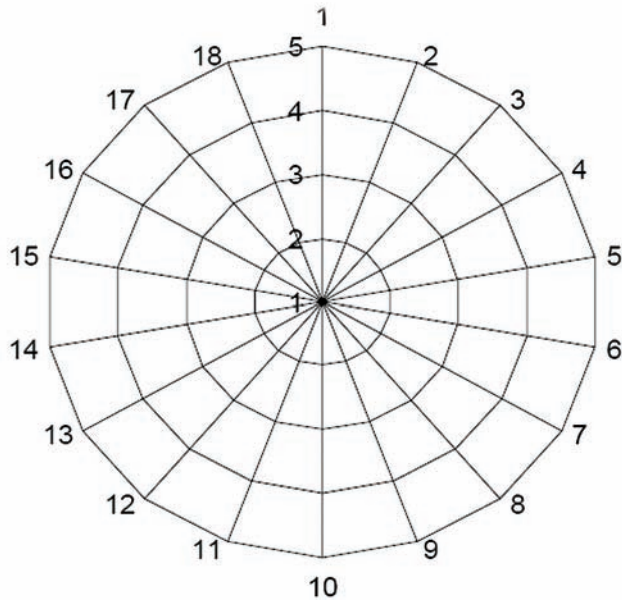
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## Individual Hearing Profile



## Your legend

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