Who, What, Where, When, Why? And How.
The use of novel intervention software to facilitate language acquisition in deaf children.
Special studies project by Caitlin Carr '11 with Peter de Villiers (Psychology)

Introduction

-Oral deaf children (who have cochlear implants) typically experience difficulty in acquiring language
-Examples:
- -Limited range of vocabulary
- -Difficulty mastering morphosyntax
- -Difficulty forming questions

Testing

- -Kindergarten class at Clarke School for Hearing and Speech
- -Morphosyntax: tense markers, plural markers, etc.
- -Wh-question production

Eliciting Wh-questions
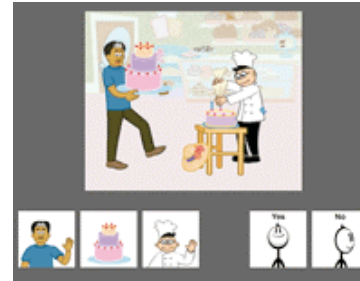
DELV Wh-Question Production Subtest

The girl is painting something. Ask me the right question and I'll show you the answer.

Software intervention

- -Laureate Learning Systems: QuestionQuest™
- -Optimized intervention approach
- -30 minute sessions
- -Three sessions weekly over three months

QuestionQuest™

Is the baker decorating a cake?
Who is carrying a cake?

How is the boy leaving the tent? **Why** is the boy leaving the tent?

Wh-questions: Pretest versus Post-test

Prompt:	Dog eating something	Boy falling for a reason
Pretest question	He's eating chicken?	Did he slip on water?
Post-test question	What she eating?	What she tripped on?

Results: 2009

Student	Age	Morphosyntax		Wh Question Production	
		PreTest /15	PostTest /15	PreTest /13	PostTest /13
1	8.42	1	1	0	3
2	7.5	2	0	0	0
3	6.91	10	7	8	9
4	6.83	8	8	0	0
5	6.75	14	14	12	13
6	6.67	13	12	10	10
7	6.42	1	2	0	1
8	5.91	3	3	0	4
9	5.5	8	10	0	2
		6.67	6.33	3.33	4.67

Conclusions

Data from previous testing indicate an improvement in Wh-question production following of use QuestionQuest™.
The data do not support an improvement in morphosyntax.