Building Early Sentences (BESSt): Designing bilingual language interventions

NALDIC
The Clothworkers’ Centenary Concert Hall, University of Leeds
Saturday 26th November 2011

Dr Sean Pert
Principal Speech and Language Therapist
Introduction
The role of the SLT and language therapy
The role of the SLT

- ‘SLTs should not advise individuals and their carers to abandon their mother tongue to facilitate progress in English
- SLTs should strive to assess an individual in all the languages to which they are exposed
- ‘Providing intervention in the individual’s mother tongue and support the family in their use of mother tongue...’
- RCSLT 2006
The role of the SLT: Language impairment

Language impairment is defined as?
The role of the SLT: Language impairment

- Language impairment is defined as?

- Language delay – ‘Children who are slow to talk’ – ‘...use of the term language delay is avoided in favor of language disorders’
  - Hegde and Maul 2006: 45

- SLI ‘...children who show a significant limitation on language ability, yet the factors usually accompanying language learning problems—such as hearing impairment, low non-verbal intelligence scores, and neurological damage—are not evident’
  - Leonard 1998: 3’
The role of the SLT: Language impairment

- Language impairment

- Specific language disorder (SLI) ‘...is diagnosed only after age 4, as many children who show signs of slow language learning in early years are “late bloomers” who catch up with normally developing children

- Rescola, 1989 in Hegde and Maul 2006:59
The role of the SLT: Language impairment

- A child with a typically developing home language but poor additional language learning requires more time and exposure in the additional language (EAL specialist required).

- A child with poor/unusual language development in their home language and their additional language is likely to have a language impairment (SLT specialist required).
The role of the SLT: Language impairment

- Language delay is a common diagnosis
- It is problematic as ‘delay’ compares the child with their peers
- It is unfair to compare a bilingual child with their monolingual peers when using standardised assessments
- Language delay and EAL acquisition may look similar
The role of the SLT: differentiating

- How to differentiate:
  - Language delay
  - Language disorder
  - EAL

- Assess the child in both/all their languages
- Observe their language learning over time
Language therapy: Evidence

- ‘...there is relatively little evidence supporting the language intervention practices that are currently being used with school-age children with language disorders’
  - Cirrin and Gillam 2008

- ‘The evidence for expressive syntax difficulties is more mixed, and there is a need for further research to investigate intervention for receptive language difficulties’
  - Law *et al.* 2003
Language therapy: Evidence

- ‘This study provides little evidence for the effectiveness of speech and language therapy compared with watchful waiting over 12 months’
  - Glogowksa et al. 2000
Language therapy: Impact

- Language therapy may be restricted by commissioners to the ‘targeted’ workforce

- Children’s SLT services may withdraw from direct language therapy, providing only advice and ‘consultation’

- The assumptions are that:
  - children will ‘catch-up’
  - language therapy is ineffective
The service in Heywood, Middleton and Rochdale

Reality of Children’s SLT
Referrals

- 1000+ new referrals a year
- Short term pathway
- Long term pathway
- Specialists
- Approximately 800-900 referrals for the short term pathway
- Impact of Sure Start funding
Staffing

- 5.2 wte SLTs and 0.9 SLTAs monolingual service
- 2.1 wte SLTs and 2.4 SLTAs bilingual service
- SLTAs run 2-3 groups for 3-6 children each session
- SLTAs speak Pakistani heritage languages: Mirpuri, Punjabi and Urdu
- 1 Sylheti Bangla SLTA
Mirpuri

- A Pakistani heritage language
- Syntax contrasts with English
- Morphologically rich verb structure
- No determiners
- Spoken and pre-literate language
- Third most spoken language in the UK after English and Welsh
- Often mistakenly called Urdu or Punjabi
Mirpuri

- Low status language
- Often exists as a code-switched form, with code switching typical in adults and children incorporating elements from English, Punjabi and Urdu
- Borrowings, e.g. apil, cup, plate etc
- Basic form is AGENT + PATIENT + ACTION
- Kuri kela kha-ni pi - Girl banana eat-ing+female is+female
English

- English is a morphologically impoverished language
- Few gender agreements
- Simplification of the language structures make it difficult for children to decide what is a noun or a verb
- High frequency verbs are often irregular, e.g. eat/ate
- Therapy should ‘...avoid telegraphic speech, always presenting grammatical models in well-formed phrase and sentences’ (Fey et al. 20003)
Collaboration with Newcastle University

Applying the theory, gathering the evidence
Video case studies

- Central Rochdale clinic 5 minutes from the town centre
- Individual and group therapy offered
- Mother tongue input in offered by SLT with bilingual SLTAs in:
  - English
  - Pakistani heritage languages - Mirpuri / Punjabi / Urdu
  - Bangla (Sylheti/Standard)
  - Other languages via interpreters
- BESt taps into the child’s language learning so should be applicable to any language
The BESSt language therapy programme

- Based on constructivist theory:
  - ‘...children learn strings of language directly from the input’
  - ‘All accounts of inflection assume, in one way or another, that children can generalize across forms such as play-s, walk-s and run-s to form a VERB-s rule or scheme’
  - ‘...children learn lexical strings...e.g. He’s playing; He’s running) directly from the input, and abstract across them to form lexically specific schemas (e.g. He’s X-ing).’
The BESSt language therapy programme

- ‘Experimental evidence that children repeat forms recently produced by adults...found that children were more likely to produce a correct 3sg (e.g. *goes* as opposed to *go*) when it had been recently produced by the experimenter.
  - Ambridge and Lieven 2011

- Children use their general intelligence to find patterns and learn exceptions

- Children learn from the language input they receive

- Children then make schemas abstracted from the input using their ability to spot patterns
The BESt language therapy programme

- The BESt is aimed at children with little or no expressive language

- Comprehension skills are not targeted as it is thought that the children will acquire meaning as they acquire expression (in contrast to other language programmes)

- Language is *not* simplified as the patterns help the child to abstract the schemas, e.g. a determiner helps to identify a noun, an auxiliary is followed by a lexical verb etc.
The BESt language therapy programme

- Toys are used and actions acted out for children to see
- The target sentences are said by the therapist at the same time the action is happening
- The child does not have to repeat, just listen and observe
- The child is then shown / helped to act out a series of actions that have the same syntactic and morphological construction
- One element is changed
The BESl language therapy programme
The BESSt language therapy programme
The BESl language therapy programme
The BESI language therapy programme
The BESSt language therapy programme

- There are common errors in English speaking children and Mirpuri speaking children:

- Both sets of children
  - Omit the AGENT
  - Omit auxiliary verbs
  - Use non-verbal gestures or act out VERBS they don’t know/can’t recall
  - Use ‘boy’ for both ‘man’ and ‘boy’ and ‘girl’ for both ‘girl’ and ‘lady’/’woman’
  - Make syntactic errors (phrase order) – rare
In addition, English speaking children
- Omit determiners
- Omit the present progressive –\textit{ing}

In addition, Mirpuri speaking children
- Use male gender agreement for all AGENTS on the present progressive and the auxiliary (N.B. cannot omit as gender inflection is required)
- Code switch nouns
- Code switch verbs
The BESt language therapy programme

Video of a child taking part in a BESt session

- Male
- No other health concerns (hearing, motor development etc.)
- Referred July this year aged 4 years 3 months
- Mirpuri monolingual speaker
The BESt language therapy programme

Video of a child taking part in a BESt session

- Reason for referral: 'Mum has concerns about speech sounds and putting sentences together' - nursery teacher. Mum concerns about hearing.

- Seen September this year for assessment aged 4 years 5 months

- Dad speak Mirpuri, Mum both Mirpuri and English
The BESSt language therapy programme

Video of a child taking part in a BESSt session

- DLS-RST passed:
  - single word nouns
  - Single word verbs
  - 2WL
  - Not able to demonstrate understanding of longer and more complex instructions

- Used no AGENTS, Mainly two word utterances

- Some gaps in VERB vocabulary
The BESSt language therapy programme

Video of a child taking part in a BESSt session

● Session 4 of the BESSt language programme

● VIDEO
The BESl language therapy programme

- Now using a range of AGENTS
- Longer utterances - full sentences
- Self-correcting errors
- More confident speaker
The BESSt language therapy programme

- Preliminary results
- Diagnostic therapy – children with poor exposure to language input develop quickly
- Some children have eliminated jargon
- Most children have generalised to real situations
The BESit language therapy programme

- Preliminary results
- Increase in content
- Increase in grammar and morphology
- Increase in MLU
- Increase in the consistency of use
The BESl language therapy programme

- Preliminary results

- The non-verbal fine motor development assessment (VMI) did not show the same increase

- Suggests an effect beyond simple maturation
The BESSt language therapy programme

- Preliminary results
- Cross linguistic – works on languages other than English
- Face validity
- Parents and SLTs can see change
References


© Dr Cristina McKean\(^1\) and Dr Sean Pert\(^2\)

\(^1\)Newcastle University

\(^2\)Pennine Care NHS Foundation Trust, Heywood, Middleton and Rochdale Community Healthcare

cristina.mckean@newcastle.ac.uk

S.Pert@NHS.net