Measuring the effect of an early childhood caregiver training on child development

Emma Jolley, Sightsavers
Background & rationale

• Evidence on what works in early childhood education?

• Children with disabilities or developmental delay may require additional or adapted support to reach their potential, and yet are often disproportionately excluded from programmes providing such services.

• Along with partners, Sightsavers has been testing a training intervention for caregivers at early childhood centres in rural Malawi.

• In Malawi, early childhood education services are provided through community-based childcare centres (CBCCS)

• CBCCs are often run on a voluntary or in-kind payment basis by untrained volunteers
Tikule Limodzi: Let’s grow together!

• Thyolo district, rural Malawi
• University of Birmingham, UK; Chancellor College, University of Malawi; Sightsavers
• 3 year research partnership funded by ESRC/ DFID

• Objective: To develop a disability-inclusive training module for caregivers and tested how the new training affected children’s development.
Study design

Phase 1
- Literature review
- Community based participatory research
- Redesigned training curriculum

Phase 2
- Cluster randomized control trial
- Case studies of individual families/ caregivers

Phase 3
- In-depth interviews to understand process of embedding in policy

• Phased, mixed-method study
• Multi-disciplinary

Specific question of CRCT:
How does the new training package effect the developmental outcomes of children?
Training intervention

- Training was facilitated by national ECD caregiver trainers from the Association Early Childhood Development in Malawi (AECDM), Magamero College and the Ministry of Gender, Children, Disability, and Social Welfare;
- Three, one week training sessions;
- Trained CBCCs also received an ‘Inclusion Resource Pack’ which included items to facilitate learning and inclusion of children with different disabilities

Topics included:
- Understanding of disability
- Inclusive games
- Early literacy and storytelling
- Well-being and involvement
- Safety and risk management
- Early maths
- Inclusive environment
- Inclusion of CBCCs
- Identification of common types of disability
- Working with parents of children with disabilities
Study methods: CRCT component

48 CBCCs chosen at random
20 children aged 2-6 years in each, chosen at random
Caregivers in half the CBCCs received intervention, half did not
Data collected at baseline and endline:

Main child data:
• UNICEF/ Washington Group Child Functioning Module
• Malawi Developmental Assessment Tool
  • 4 domains: GM, FM, **language & social**
  • Compares biological age with developmental age
  • Measuring proportion of children in each CBCC outside the ‘normal’ range expected
Malawi developmental assessment tool (MDAT)

- **Child developmental assessment tool**
  - Combined ‘any delay’ – one or both domains

- Age-referenced norms developed through MDAT production and validation in Malawi.

- Compared with their biological age, where do our children fall? Bottom 10%? 5%? 2.5%?
## Key results

### Profile of respondents

<table>
<thead>
<tr>
<th></th>
<th>Baseline</th>
<th>Endline</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CBCCs</strong></td>
<td>47</td>
<td>44</td>
</tr>
<tr>
<td><strong>Children</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Girls</td>
<td>516</td>
<td>362</td>
</tr>
<tr>
<td>Boys</td>
<td>414</td>
<td>519</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>930</td>
<td>881</td>
</tr>
<tr>
<td><strong>Average age</strong></td>
<td>52 months (4y, 4m)</td>
<td>53 months (4y, 5m)</td>
</tr>
<tr>
<td><strong>Prevalence of disability</strong></td>
<td>10.7%</td>
<td>6.0%</td>
</tr>
</tbody>
</table>
## Tikule Limodzi | Let’s Grow Together

Main results: % children below 2.5% of referenced norms

<table>
<thead>
<tr>
<th>Domain</th>
<th>Baseline</th>
<th>Endline</th>
<th>Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Social</td>
<td>8.3%</td>
<td>6.1%</td>
<td>-2.2%</td>
</tr>
<tr>
<td>Language</td>
<td>4.3%</td>
<td>3.5%</td>
<td>-0.8%</td>
</tr>
<tr>
<td>Any delay</td>
<td>11.7%</td>
<td>8.2%</td>
<td>-3.5%</td>
</tr>
<tr>
<td>Girls</td>
<td>11.1%</td>
<td>7.3%</td>
<td>-3.8%</td>
</tr>
<tr>
<td>Boys</td>
<td>12.6%</td>
<td>9.4%</td>
<td>-3.2%</td>
</tr>
</tbody>
</table>
Tikule Limodzi | Let’s Grow Together

Main results: Any delay, by group

<table>
<thead>
<tr>
<th></th>
<th>Baseline (Control)</th>
<th>Endline (Intervention)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Baseline</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Endline</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Control</strong></td>
<td>11.8%</td>
<td>10.0%</td>
</tr>
<tr>
<td><strong>Intervention</strong></td>
<td>9.2-15.1%</td>
<td>7.5-13.2%</td>
</tr>
<tr>
<td></td>
<td></td>
<td>9.0-14.8%</td>
</tr>
<tr>
<td></td>
<td></td>
<td>4.4-9.0%</td>
</tr>
<tr>
<td></td>
<td></td>
<td>6.3%</td>
</tr>
</tbody>
</table>
Tikule Limodzi | Let’s Grow Together

Main results: social delay, by group

Control
- Baseline: 6.4-11.5% (8.6%)
- Endline: 5.2-10.1% (7.3%)

Intervention
- Baseline: 5.8-10.8% (7.9%)
- Endline: 3.3-7.5% (5.0%)
Main results: language delay, by group
Implications & next steps

• The study highlights the usefulness of collecting data from ECDE settings using standardised tools.

• The results of the baseline study show the high prevalence of developmental delay and functional difficulties among young children in low resource settings such as this.

• Low-cost strategies for including such children meaningfully in ECDE activities are vital for their development.
Study limitations

• One district - generalisability

• Sample size insufficient – precision, children with disabilities

• Limited types of data: contextual, anthropometric, etc

• Community prevalence of disability unknown
THANK YOU!

LEARN MORE
ejolley@sightsavers.org
or
research.sightsavers.org

FOLLOW US
@sightsavers_pol

SUPPORT US
educationequity@fhi360.org

LEARN MORE
www.educationequity2030.org

FOLLOW US
@equity2030  |  #equity2030

SUPPORT US
educationequity@fhi360.org