Using a child-focused community profile as a catalyst for a multi-disciplinary child health partnership in a low-income Irish community

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Child poverty

• Poverty, particularly in the early years, impacts on all aspects of a child’s life (Duncan et al., 2012).
• Early childhood development is negatively impacted with lasting effects into adulthood and beyond to the next generation.
• This intergenerational transmission of disadvantage is more pronounced in liberal economies such as Ireland and the UK than in social democracies (Whelan et al., 2013).
• In 2015, 11.5% of children in Ireland (aged 0-17) lived in consistent poverty (Barnardos 2016).
Resilience

Resilience is an adaptive response to adversity which can be build through:

- Strengthening relationships with supportive adults
- Creating environments which strengthen adaptive skills and self-regulatory capacities

Investing in interventions which support Early Childhood Development can build resilience and break the cycle of poverty

(Harvard Centre for Child Development)
Young Knocknaheeny Area Based Childhood Programme (YK)

A multi-disciplinary area-based prevention and early intervention partnership which aims to get every child’s life off to the best possible start by:

• Respectfully enhancing the knowledge and skills of all parents and practitioners
• Strengthening and enhancing all relationships and environments that are important to children
• Embedding systems and community change to address childhood poverty and support early childhood development
YK Interconnected strategies

Infant Mental Health and Wellbeing

Speech, Language and Literacy

Capacity Building
Integration
Quality Improvement

Early Childhood Care and Education

Prosocial Behaviour and Self-Regulation

Underpinned by Interdisciplinary Infant Mental Health Framework

Supported by an integrated Research and Evaluation
Local context in which YK developed

Multifaceted and multi-generational deprivation, in a concentrated area.

Impact of austerity on both residents and local services.

Growing recognition of need to address early childhood health and well-being.

New methods of inter-agency work required in response to emerging changing social and economic conditions.
Location

**Cork city**
- population **119,230**

**YK Catchment area**
- population **12,000**
- children <15yrs **5177**
- children 0 – 6 yrs **1155**

(Source CSO Census 2011)
## YK catchment area demographic profile
(Total population 12,000)

<table>
<thead>
<tr>
<th></th>
<th>YK catchment area (% population)</th>
<th>Ireland (% population)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Post secondary education (≥15 years)</td>
<td>17%</td>
<td>44%</td>
</tr>
<tr>
<td>Unemployed</td>
<td>30%</td>
<td>15%</td>
</tr>
<tr>
<td>Renting from Local Authority</td>
<td>38%</td>
<td>8%</td>
</tr>
<tr>
<td>Ethnicity – White Irish</td>
<td>90%</td>
<td>85%</td>
</tr>
<tr>
<td>Private households with Children</td>
<td>52%</td>
<td>49%</td>
</tr>
<tr>
<td>Children under 15</td>
<td>21%</td>
<td>21%</td>
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</tbody>
</table>

### Families with children under 15:
- Couples with Children: 45% (YK) vs 78% (Ireland)
- Lone mothers: 54% (YK) vs 21% (Ireland)
- Lone Fathers: 1.5% (YK) vs 1.5% (Ireland)
Rationale:
In Ireland, data on child health and well-being indicators are not available at the community level.

Adult orientated indicators of disadvantage used as proxy.

Need to examine impact of disadvantage on child development outcomes and build an evidence-base for appropriate, quality services.
AIM:

To develop an in-depth understanding of local childhoods and, thereby, inform the programmatic direction of a multi-disciplinary area-based prevention and early intervention partnership.
Methods

• In 2015, community-level data on child development were collected using validated assessment instruments and administrative data sources.

• Convenience sampling was used.

• All data were aggregated to population level.

• Results were compared to expected national and international standards.
Sample of data sources

• **Small area statistics** from 2011Census (Cork City Council)
• **Micra-T - Reading level attainment** Standardised testing in Irish Primary Schools obtained from Primary Schools

Data collected by the YK:

• **Strengths and Difficulties Questionnaire (SDQ)** teacher-completed (Junior Infants in Primary Schools)
• **Pre-school Language Scale 5th Edition (PSL-5)** Clinical testing of Junior Infants by YK Oral Language Officers
• **Early Childhood Environment Rating System (ECERS)** external independent assessment of child care settings
Speech & Language Difficulties
PLS5 May/June 2015 (n=117 Junior Infants in 4 schools)

- Expressive language difficulty only: 7%
- Receptive language difficulty only: 15%
- Difficulties in Both categories: 38%
- Total percentage of children with language difficulty: 60%
Speech & Language Difficulties
PLS5 May/June 2015 (n=117 Junior Infants in 4 schools)

Expressive Language
- Average: 49%
- Mild: 13%
- Moderate: 13%
- Severe: 19%
- Above average: 6%

Auditory Comprehension
- Average: 49%
- Mild: 18%
- Moderate: 19%
- Severe: 14%
- Above average: 0%
Child Mental Health
Strengths and Difficulties Questionnaire (SDQ)

- Measure of mental health problems in children aged 4–17
- 20 items relating to
  - emotional symptoms (5 items)
  - conduct problems (5 items)
  - hyperactivity (5 items)
  - peer problems (5 items)

- Total difficulty score ranging from 0 to 40
- Validated predictor of population-level prevalence of child mental health disorders (Goodman et al. 2011)
Teacher completed SDQ
Junior Infants in 4 Schools November 2015 (n = 123)

- Peer Problem: 79% close to average, 15% slightly raised, 1% high, 5% very high
- Hypreactivity: 69% close to average, 5% slightly raised, 7% high, 19% very high
- Conduct Problem: 82% close to average, 7% slightly raised, 4% high, 7% very high
- Emotional Problem: 72% close to average, 9% slightly raised, 7% high, 13% very high
- Total score: 67% close to average, 15% slightly raised, 8% high, 10% very high
- UK Norm: 80% close to average, 10% slightly raised, 5% high, 5% very high
Literacy

MICRA-T (Mary Immaculate Reading Attainment Test)
• Standardised reading test used across Irish primary schools

• Results presented by 20\textsuperscript{th} percentile (based on the scores of 10,000 pupils in the 2002-2003 school year).

• Not routinely available for research purposes but aggregated results provided by 3 schools to YK
Micra T Class-based Scores across 3 schools in 2014 (n = 429 students)
Early Childhood Environment Rating Scale (ECERS-R)

• Quality early childhood care and education can mitigate the impact of poverty on children

• ECERS-R assesses quality in early years settings in seven dimensions using a validated rating scale.

• Overall score from 1 to 7 for each dimension (1 = inadequate, 3 = unacceptable, 5 = good, and 7 = excellent)
Early Years Service Quality (2015)
ECERS Baseline 2015 (n = 14 rooms)

- Childcare quality average: 3.6
- Space and Furniture: 3.3
- Personal Care Routines: 3.3
- Listening and Talking: 4.0
- Activities: 2.7
- Interaction: 4.5
- Program Structure: 3.4
In summary

• This presentation is a snapshot of local child development trajectories

• The YK catchment is an area of multifaceted and multi-generational deprivation

• By the time children in the area start school they are already exhibiting signs of disrupted development

• By 9 years of age are disengaging from education

• Early years care and education which has the potential to mitigate the impact of adversity is sub-optimal and therefore a missed opportunity
Implications

• Profile gave meaning to local anecdotal/practice wisdom
• Immediate – Speech therapy service over 40 additional referrals
• Public health nurses are key contacts for parents in the early years and well placed to provide support through the Infant Mental Health framework
• Joined up/innovative working eg Babbling babies clinic
• YK programme adapted to address unmet need – maintaining Infant Mental Health focus
• Attention to improvement in quality across childrens’ services
• Built in flexibility to reflect local need, whilst maintaining gold standard evidence based programme.
References


• Barnardos (2017) www.barnardos.ie

• Center on the Developing Child, Harvard University (2017) http://developingchild.harvard.edu/

• Young Knocknaheeny Area-based Childhood Programme http://youngknocknaheeny.ie/
Thank you