

## Home-based literacy program: design elements

Report to the Steering Committee of Advancing Country Towns initiative

#### March 2012

Children live, grow up and learn through their interactions with a wide range of interconnected environments – including the family, residential communities, relational communities, and the environment of child development services<sup>1</sup>. Each of these environments is situated in a broad socioeconomic context, which in Benalla, is highly socially disadvantaged<sup>2</sup>. The evidence is very strong that as a population group, children from lower socio-economic families and communities grow up to have lower educational, health and 'life' outcomes than their peers.<sup>3</sup>, <sup>4</sup> Differences between children affected by poverty and others start appearing in their language and behavioural development at two years of age<sup>5</sup>. This is not simply the result of low income – it is a combination of factors that add up to "low socio-economic status" (Low SES)<sup>6</sup>. In Benalla, there is an excellent opportunity, and desire, to integrate service provision to focus on mitigating the effects of disadvantage. If a generation of children can achieve to their individual potential, with no negative impact on their health or education due to their low SES family or community standing, the benefits to our community (and Australia) will be measurable and ongoing.

School readiness is not something that suddenly happens, but rather is an outcome of a child's life up to school entry. The Advancing Country Towns Program, and the Education Benalla Program, are both seeking an early childhood development intervention that will prevent the negative impact of disadvantage on children's natural ability to learn. This report draws on published early years literature as well as Benalla-specific data and information to discuss the "right" early childhood development program for Benalla.

<sup>&</sup>lt;sup>1</sup> Alan Dyson et al (2010)

<sup>&</sup>lt;sup>2</sup> The Vinson Report on comparative social disadvantage by postcode in Australia; and the ABS SEIFA index are discussed in various background papers of both Advancing Country Towns and Education Benalla Program

<sup>&</sup>lt;sup>3</sup> See www.tomorrowtoday.com.au for background papers

<sup>&</sup>lt;sup>4</sup> Australian Research Alliance for Children and Youth (ARACY) (2010)

 $<sup>^{\</sup>rm 5}$  Australian Research Alliance for Children & Youth

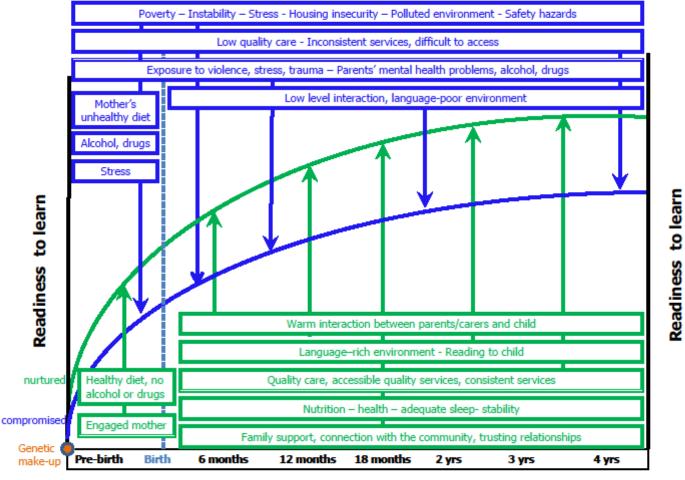
<sup>&</sup>lt;sup>6</sup> For an outline of the categories, see T. Vinson "Dropping off the Edge – the distribution of disadvantage" (2007)

<sup>&</sup>lt;sup>7</sup> Blair et al 2007 in ARACY (2010) p.4

<sup>&</sup>lt;sup>8</sup> A state government funded initiative implemented by Benalla Rural City Council. See Advancing Country Towns Program Benalla Project Plan February 2012 for more information.

<sup>&</sup>lt;sup>9</sup> A Benalla community philanthropy initiative with multiple funding partners across local community, philanthropy, and government. See <a href="https://www.tomorrowtoday.com.au">www.tomorrowtoday.com.au</a> for more information

# Readiness to learn trajectories: risk factors and protective factors



Age

### Framework

The diagram shown on the previous page<sup>10</sup> illustrates the negative risks and positive protective factors for children's ability to commence school with the range of pre-literacy skills that will see them aspire and move forward with learning.

In setting the scene for shaping a suitable program, we have used these positive and negative influences to take a 'lessons learned' approach to the literature.

Using this approach, common findings are:

- (1) The earlier the intervention, the better<sup>11</sup>, <sup>12</sup>, <sup>13</sup>
- (2) Quality early experiences (eg caregiving) positively impact on brain development, and poor early years experiences (eg violence) negatively impact on brain development<sup>3</sup>, <sup>14</sup>, <sup>15</sup>
- (3) The parent/child relationship is the most powerful influence on children's early development<sup>3</sup>, <sup>16</sup>
- (4) Learning is transactional by nature: the more hours per year and the number of years involved in an early years development program positively impact on the life-long benefits<sup>17</sup>, <sup>18</sup>

### Home-based or child care centre?

Large scale studies demonstrate that children who enter a preschool program before age 2 ½ gain more than those who enter later<sup>19</sup>. The number of months in attendance predicted growth on cognitive development. In follow-up through to age 7, months of preschool participation and educational quality both continued to predict gains in reading and maths<sup>20</sup>. The contribution of long hours in a pre-school program (i.e. more than 30 hours per week) was emphasised in another study<sup>21</sup>.

A review undertaken in 2003 also found that high quality centre-based programs enhance vulnerable children's school-related achievement and behaviour<sup>22</sup>. It is also noted that what parents do matters more than what preschools do.

<sup>&</sup>lt;sup>10</sup> Australian Research Alliance for Children & Youth www.aracy.org.au

<sup>&</sup>lt;sup>11</sup> Margaret McCain and J.Fraser Mustard (1999)

<sup>&</sup>lt;sup>12</sup> Oberklaid in Szego and Nader 2002: 4

<sup>&</sup>lt;sup>13</sup> Ben Edwards, Matthew Gray, Sarah Wise et al (2011)

<sup>&</sup>lt;sup>14</sup> Rima Shore (1997)

<sup>&</sup>lt;sup>15</sup> A. Karoly Lynn, M.Rebecca Kilburn, Jill S.Cannon

<sup>&</sup>lt;sup>16</sup> Leon Feinstein (2003)

<sup>&</sup>lt;sup>17</sup> W.S.Barnett, L.N.Masse (2007)

<sup>&</sup>lt;sup>18</sup> Australian Research Alliance for Children & Youth (2010)

<sup>&</sup>lt;sup>19</sup> Reported in W.S. Barnett et al (2007) p.115

<sup>&</sup>lt;sup>20</sup> Sylva, Melhuish, Sammons, Siraj-Blatchford & Taggart, 2004; in W.S.Barnett et al (2007) p.115

<sup>&</sup>lt;sup>21</sup> NICHD & Duncan, 2003; NICHD & ECCRN (2003) in W.S.Barnett et al (2007) p.115

<sup>&</sup>lt;sup>22</sup> Brooks-Gunn (2003) in Australian Research Alliance ARACY (2010)

In Benalla's situation, most children are not in long day-care from birth to kinder. Most children spend most time with a parent or home-based carer such as Family Day Care or a grandparent. As noted (above), the parent/child relationship is the most powerful influence on children's development. The Benalla design should respond to this by working with supporting and strengthening the caregiving nature of the parent/child relationship. In our context and culture, the goal should be to achieve the 'long hours' of pre-school benefits via a home based program that involves families with 0-5 year olds (and beyond), trained tutors who know how to have fun, service back-up through coordinated health and community service provision, and community back up through a positive community environment.

It is, however, important not to lose sight of the strong evidence that quality centre-based care has been highly effective.

Recommendation: Benalla's context and culture dictate that an early years program focus on the parent (carer)/child relationship in the home environment, with integrated service back up in the community.

The program design should incorporate both a home-based and centre-based elements.

## Successful early childhood development programs -

The most successful early intervention programs have used combined strategies that target both child and carer.<sup>23</sup> Here, three well studied and successful programs are discussed for their relevance to Benalla's situation.

#### (1) The Abecedarian Approach

The Abecedarian program is an approach to early childhood care and development that has generally been delivered through centre-based child care and parent education. It is included in this consideration of models because it has been so well studied, and we can learn much from its successes. The program's approach is comprised of (1) Learning Games (2) conversational reading, (3) language priority, and (4) a comprehensive conceptual framework of enriched caregiving.

The academic achievement of children from at-risk and under-resourced families has been improved as a result of participation in the program. For example, almost all of the at-risk children in both the experimental and control groups of the first Abecedarian study were in the normal IQ range at the beginning of the study. Most of those who received the Abecedarian intervention continued to stay in the normal IQ range, while more than half of those who did not receive the intervention fell out of the normal range by 48 months of age<sup>24</sup>.

This research finding is very important to Benalla's context. The design of the *Education Benalla Program*<sup>25</sup> was influenced by strong research data from the U.K. showing significant differences in the educational performance of children from different levels of socio-economic status from as early

<sup>&</sup>lt;sup>23</sup> Watson & Tully, 2008 in ARACY (2010) p.17

<sup>&</sup>lt;sup>24</sup> Dr. J. Sparling (2010)

<sup>&</sup>lt;sup>25</sup> Tomorrow:Today Foundation (2011)

as 22 months<sup>26</sup>. Children from low socio-economic status families who are in the bottom quartile of performance tests at 22 months are still there at age 10; whereas high socio-economic status children are more likely to be in the top quartile by age 10 even if they were in the bottom quartile at 22 months. The design elements of the Abecedarian approach sit very comfortably with Benalla's context of under-resourced families. Other findings from research into the Abecedarian approach are also of interest –

- An Abecedarian parent education program can increase parental responsiveness to child and parental interactive reading skills<sup>27</sup>
- At age 21, almost 70% of the young adults who had received the Abcedarian intervention in the infancy and preschool years were attending a 4-year college or were employed in a skilled job, compared to about 40% of those who did not receive the preschool intervention<sup>28</sup>.
- Not only did the children benefit, but benefits accrued for the mothers of the children who
  received the program. About 80% of the teen mothers in one study whose infants received
  the program continued on to get post-secondary education, compared to about 30% of teen
  mothers whose infants did not receive the program. Teen mothers continued to get more
  education for as long as 8 years after their children entered the program<sup>29</sup>

A comparative benefit-cost analysis published in the Economics of Education Review<sup>30</sup> demonstrates that the high implementation cost of the program can be substantiated in the range of accrued benefits to the individual and society, over time. The study also notes that "Change in [social] equity [is] a potentially large unmeasured benefit of the Abecedarian program"

The developer of the Abecedarian project, Joseph Sparling, spent time in Australia at the University of Melbourne. He has developed an Australian approach (titled the 3A concept) which is under consultation with government, community and Aboriginal and Torres Strait Islander representatives.

It is of interest to Benalla that the first component of the Abecedarian Approach, "Learning Games", has been implemented successfully in a variety of service-delivery models, including home visiting, parent education classes, family child care homes, child care centres, pre-kinder classes and family literacy programs. He notes that "Learning Games" can be used as a stand-alone curriculum in home visiting activities.

Recommendation: That the program consist, in part, of the suite of Abecedarian Learning Games, and that the home based tutors be trained to train parents in their use.

### (2) PEEP (Peers early education partnership)

PEEP offers a very flexible approach to early childhood development in that it can be developed around the home, playgroup, care centre or any combination of these. It aims to improve children's

 $^{\rm 27}$  Judkins et al., 2008 p.90 in SNAICC National Conference 2010

<sup>&</sup>lt;sup>26</sup> Leon Feinstein (2003)

 $<sup>^{28}</sup>$  Campbell, Ramey, et al., 2002 in SNAICC National Conference

<sup>&</sup>lt;sup>29</sup> Ramey et al., 200 in J. Sparling (2010)

<sup>&</sup>lt;sup>30</sup> W.S. Barnett, Leonard N. Masse (2007)

life chances, particularly in disadvantaged areas by raising educational attainment, especially in literacy. PEEP began in an area of low socio-economic status in Oxford in 1995<sup>31</sup>. It supports parents/carers in their relationships with their children and affirms the crucial role of the parent/carer as children's first educators. It uses everyday activities and interactions to promote parental awareness of children's very early learning and development. It is relevant and informative for Benalla's situation because it is designed for low-socio economic communities, and it recognises that families may be difficult to access in the first instance. Part of the program responds to this by defining how to make contact, and includes, for example, activities to run in local shopping centres, and contact via health clinics. It has a specific aim of promoting the parent's lifelong learning, as well as the child's.

A major longitudinal evaluation of the program<sup>32</sup> established that PEEP had a significant impact on the quality of parents' interaction with their children when the children were one and two years of age; and on children's progress in a number of literacy-related skills, as well as in measures of their self-esteem. The program and its resources would therefore seem to be very relevant to Benalla. Of interest is an external evaluation of the operation of the program which identifies implementation 'hiccups' relating to linking across and between services and listening and responding to local access issues. Successful systems and approaches, such as Benalla's Little Footprints and Little Giggles playgroups, can inform the adoption of PEEP into Benalla. It appears that over time the small group-based component of PEEP has become more significant than the home-based component in some settings. This may not have been the early intent, and in Benalla's case, both components should be equally supported.

### **Recommendation:**

- That the program adapt the PEEP approach for implementation in Benalla.
- PEEP's establishment in Benalla be informed by the knowledge of local groups successful in attracting targeted families such as Little Footprints and Little Giggles playgroups.
- That the home-based and small group-based elements of PEEP be equally weighted in the implementation of the program.

#### (3) Home Interaction Program (HIPPY)

HIPPY is a two-year, home-based parenting and early childhood enrichment program that runs in the year before the child commences formal school. It consists of a tertiary qualified coordinator and a team of (paid) home tutors. The program builds the confidence and skills of parents and carers to create a positive learning environment to prepare their child for school. The program also offers some parents and carers a supported pathway to employment and local community leadership.

The Australian Government has funded the rollout of HIPPY in fifty locations around Australia<sup>33</sup>. A study prepared by the Australian licensee of HIPPY for the Dept. Education & Early Childhood

The Brotherhood of St Laurence, through HIPPY Australia, has exclusive licensing rights from HIPPY

<sup>&</sup>lt;sup>31</sup> Abril Saldana and Paul Bywaters (2006)

<sup>&</sup>lt;sup>32</sup> "The Birth to School Study: A Longitudinal Evaluation of the PEEP 1998-2005" reported in Abril Saldana and Paul Bywaters (2006)

<sup>&</sup>lt;sup>33</sup> HIPPY Factsheet <u>www.hippyaustralia.org.au</u>

Development notes that programs such as HIPPY help to strengthen the home learning environment towards mitigating the effects of socioeconomic disadvantage, improving children's readiness for school and enhancing future life chances. The evaluation outlines the range of issues and considerations noted earlier<sup>34</sup> – for example, that quality of delivery and engagement of participants interact and are positively correlated<sup>35</sup>.

As with the Abcedarian and PEEP program, HIPPY notes difficulty with engaging some parents. ACT and Education Benalla Program should note that there are no easy answers to achieving the participation of the most marginalised and vulnerable families; and recognise the time consuming, and sometimes frustrating, nature of this task. An early years development program in Benalla cannot achieve its goals without achieving a connection with the most hard-to-reach families.

HIPPY provides a good model of delivery in terms of a tertiary qualified coordinator plus paid home tutors. However as noted earlier ("Framework"), there is good evidence that the earlier the program commences with families (i.e. from birth), and the longer the involvement prior to school commencement, the better the life-long outcomes for the child and the primary carer. The Benalla program can take from HIPPY the structure of delivery, and the importance of staying with families as they transition from a home based pre-school model of delivery, to early school years.

#### **Recommendations:**

- That the Benalla program model consists of a tertiary-qualified coordinator and home tutors – as well as trained centre-based and small-group based tutors.
- That the Benalla program continue to support families in suitable ways for at least the first year of the child's school education

### Other Considerations

- Early intervention programs are one part of a bigger approach which should include the school years and ongoing community connectedness<sup>36</sup>, <sup>37</sup>.
- Although the right program would expect indicators of success to be in evidence within a
  couple of years, it is considered that measurable and long term change will take at least 10
  years of active program investment to achieve the desired outcome<sup>38</sup>.
- A program that focusses only on poor families in Benalla would be counter-productive as it would (a) overlook the reality that there is a correlation between socio-economic

International to run the program in Australia and is responsible for managing the implementation of the national roll-out. The Brotherhood of St Laurence has sub-licence arrangements with other not-for-profit organisations to deliver the program to selected communities. 50 communities were selected based on SEIFA index and proportion of young families. The 2011 intake also considered AEDI data.

<sup>&</sup>lt;sup>34</sup> Assoc.Prof. Max Liddell et al., (2009)

<sup>&</sup>lt;sup>35</sup> p.63 ibid

<sup>&</sup>lt;sup>36</sup> ARACY (2010)

<sup>&</sup>lt;sup>37</sup> Tomorrow:Today Foundation (2011)

<sup>38</sup> Ibid

disadvantage at the neighbourhood scale and educational under achievement<sup>39</sup>, and (b) be poorly supported as families do not want to be identified as particularly disadvantaged.

## **Summary**

International experience provides us with a good opportunity to avoid the pitfalls experienced by numerous other initiatives. "Lessons learned" from quality research and evaluations provide the framework for a Benalla program.

- (1) The earlier the intervention, the better (i.e. from pregnancy, or birth)
- (2) Quality early experiences (e.g. caregiving) positively impact on brain development, and poor early years experiences (e.g. violence) negatively impact on brain development
- (3) The parent/child relationship is the most powerful influence on children's early development
- (4) Learning is transactional by nature: the more hours per year and the number of years involved in an early years development program positively impacts on the life-long benefits

Based on an assessment of the literature and Benalla's context, we recommend that an early years program consist of the following:

A qualified coordinator and tutors trained specifically in the implementation of the program. The program should run in three domains –

- Home based learning. Here, trained tutors come into the family home to work on a frequent
  and regular basis with the primary carer and the child. The tutor teaches the parent how to
  use age-appropriate games.
- Centre based care. Nominated employees of pre-school centre-based care in Benalla are trained in the program for delivery on a daily basis to all children in age-appropriate groupings.
- Small parent-led and facilitator-led parent/child groups. Parents and/or the playgroup facilitator are trained to use the program in playgroup time.

One goal of program roll-out is that within two years we see families interacting with the program across two or three domains – home, centre-based, and small-group. There are so many age-appropriate resources – children and carers will not grow weary. Trained tutors may work exclusively in one domain, or be available to work in two or three domains.

The program will consist of the PEEP approach, adapted in consultation with local experts for appropriateness to Benalla. The Abecedarian Learning Games should be considered as an adjunct to the PEEP resources. Given their proven benefits, their use should not be negated on the grounds of cost alone.

Each of the domains – home, centre-based and small group - will require consultation with local experts to inform the program design:

<sup>&</sup>lt;sup>39</sup> P. Holmes-Smith (2006) in Tomorrow:Today Foundation (2007)

Home Domain & Small Group Domain – a number of discussions with Benalla families should be undertaken as soon as possible, focusing on primary carers of 0-8 year olds to ensure that the adapted PEEP design is fit for its purpose. These discussions could be arranged using, for instance, parents at Little Footprints and Little Giggles as a first port-of-call. These parents are excellent experts to advise on both the home-domain, and the small-group domain.

Centre-based care. Centre managers and coordinators should be consulted to identify the systems already in place at each centre or kinder; and the potential for implementing an adapted PEEP approach. Feedback should be sought regarding the appropriateness of the suggested resources and the applicability of the program to existing centre-based systems.

### Conclusion

Benalla is in a position to design and implement a program that enables all Benalla children to start school ready to embrace life and learning. It can be undertaken in a way that positively impacts on whole families. Benalla has much to be proud of in the steps taken to date. There is no magic remedy for changing the life-chances of our children, but there is very good information which we can use to guide our investment in our families from birth. It will require consistency, persistence, ongoing inquiry, interagency cooperation, money – and time.

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