



# *The home learning environment and readiness for school*

A 12-month evaluation of the  
Home Interaction Program for Parents  
and Youngsters (HIPPY)  
in Victoria and Tasmania

Report to the Victorian Department of Education and  
Early Childhood Development

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# Contents

Acknowledgments	iv
Abbreviations	iv
<b>Summary</b>	<b>v</b>
<b>1 Introduction</b>	<b>1</b>
The nature and extent of the problem that HIPPY aims to address	1
What's known from existing research into HIPPY	3
The value and aims of this evaluation	3
Home Interaction Program for Parents and Youngsters	4
Research questions	5
Structure of this report	6
<b>2 Evaluation design</b>	<b>7</b>
Research structures	7
Design	7
HIPPY sites and participants	7
Data collection	9
Measures	10
Analysis	12
<b>3 Characteristics of those involved in HIPPY</b>	<b>13</b>
<b>4 Child's school readiness</b>	<b>15</b>
Child's school readiness as measured by Who Am I?	15
Child's school readiness as reported by parent	20
Summary	28
<b>5 Parent-child relationship</b>	<b>30</b>
Parent's bond with child	30
Parent's communication with child	30
Understanding children's needs	31
Involvement in children's education	32
Summary	33
<b>6 Parent wellbeing and social inclusion</b>	<b>34</b>
Parent wellbeing	34
Parent social inclusion	37
Summary	45
<b>7 Tutor wellbeing and social inclusion</b>	<b>47</b>
About the tutors	47
Tutor wellbeing	48
Tutor social inclusion	50
Impact of HIPPY on tutor's education and job skills	55
Summary	57
<b>8 Context and implementation</b>	<b>59</b>
Adherence	59
Exposure	62
Quality of delivery and participant responsiveness	63
Program differentiation	66
Summary of implementation integrity	66
Other personal and household characteristics that impact on implementation and integrity of HIPPY	67
<b>9 Conclusion</b>	<b>70</b>
<b>References</b>	<b>73</b>

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## Abbreviations

ANOVA	Analysis of variance
CALD	Culturally and linguistically diverse
CAMHS	Child and Adolescent Mental Health Services
HIPPY	Home Interaction Program for Parents and Youngsters
LSAC	Longitudinal Study of Australian Children
OECD	Organisation for Economic Co-operation and Development
PWI	Personal Well-being Index
SDQ	Strengths and Difficulties Questionnaire
SES	Socioeconomic status

## Summary

This report details the findings of an evaluation of the Home Interaction Program for Parents and Youngsters (HIPPY). Operating in several countries, the program targets children from disadvantaged communities and aims to improve their school readiness in a program which takes in preschool children and assists them over a two-year period concluding with the end of their first year at school. The program uses structured materials that tutors introduce to parents whom they visit fortnightly at home. Parent group meetings with tutors are held every alternate fortnight, also for the purpose of familiarisation in the use of the materials. Parents then work through the materials with their children. While the primary aim of HIPPY is to improve the school readiness of the children, there are additional aims: improving the parenting skills of parents and the parent–child relationship, and providing additional skills to the tutors, many of whom are people who are, or have previously been, parents who have been tutored in the program themselves.

The report outlines research evidence that indicates the multiple disadvantages suffered by children from disadvantaged communities, particularly communities in which the economic status of parents is poor. In particular the research shows the negative impact of such factors on children’s cognitive achievement and school readiness. However, while structural factors are significant contributors to such disadvantage, the research also shows that the influence of positive parenting and of contextual factors such as the availability of relevant programs may help mediate the impact of structural factors. In other words, programs aimed directly at parents and children can still have positive impacts. It is in this context that programs such as HIPPY are important and their impact important to evaluate. HIPPY contains the key features known to be important in addressing problems of school readiness but thorough evaluations including comparison groups have not been carried out to date.

This longitudinal evaluation was carried out through 2008 on six of the nine HIPPY sites operating in Australia at that time. Three sites, one in La Perouse, New South Wales, and two in Victoria, (Winchelsea and Colac), were not included due to difficulties in collecting baseline data from participating parents. The remaining sites are in a variety of urban, regional and rural locations (Moonee Valley, Fawkner, Fitzroy and Geelong in Victoria, and Burnie and Smithton in Tasmania). These sites are in diverse communities displaying a range of economic, cultural, educational and social demographics.

The questions addressed by the evaluation were:

- Was the child’s school readiness enhanced by HIPPY?
- What was the impact of HIPPY on the parent–child relationship?
- What was the impact of HIPPY on the parent’s and tutor’s sense of wellbeing and social inclusion?
- What was the impact of contextual factors on the design, implementation and outcomes of HIPPY?
- To what extent has program fidelity been maintained during the program’s rollout?
- What changes to the program are recommended in order to ensure appropriate high levels of program fidelity for future rollout?

The research team reflected a partnership between Monash University and the Brotherhood of St Laurence. Monash University Standing Committee on Ethical Research on Humans gave approval for the evaluation to proceed.

All parents enrolled in the program at the six sites in 2008 were invited to participate in the evaluation. Of the 195 families enrolled in HIPPY in Victoria and Tasmania in 2008, 120 parents

gave their consent to be contacted. Baseline interviews were completed with 93 parents (48 per cent of those enrolled in the program at these sites). Some 84 children were directly assessed by researchers.

The second round of interviews with parents and children were completed as close as possible to the end of the HIPPY year, between 21 October 2008 and 11 December 2008. Of the 93 parents who completed baseline interviews, 73 completed time 1 interviews giving an attrition rate of 22 per cent. Possible reasons for non-participation are contained in the body of the report.

Direct assessments of children were completed with 63 children at the end of their first year of HIPPY (time 1). This means we have both parent and researcher-assessed child outcome data at both baseline and time 1 for 63 families.

Home tutors at all nine sites were invited to be interviewed for this evaluation. There were 35 tutors across these nine sites in 2007. Interviews with home tutors were conducted in the first few months of 2008. Thirty-four tutors' responses were analysed for this report (the remaining tutor was on maternity leave at the time of data collection).

As expected, child age was the single main predictor of school readiness. However, other factors at the family level also impact on school readiness. We found certain socio-demographic variables significantly impacted on the parent's assessment of their child's school readiness: whether the parent reported that their partner lived in the house, if the parent had completed Year 12 as their highest level of school education, whether the parent had a Health Care Card, and whether the child had participated in preschool or kindergarten as compared to participation in day care. However, while these factors appear important, the only variable found to have a positive statistical correlation with school readiness as measured by direct assessment of the child, was whether the parent had completed Year 12 as their highest level of school education.

The findings that child age and proximal socio-demographic characteristics, as mentioned above, are correlated with school readiness are consistent with findings of the Longitudinal Study of Australian Children research into school readiness.

Over the program year, children showed statistically significant improvement of their pre-academic skills. Despite their gain, children doing HIPPY on average remained below national norms. However, some children in the sample outperformed the norm groups. The gain observed over the HIPPY year is an important outcome given that these children started the program with higher levels of disadvantage than their general Australian population counterparts, and it could not be expected that the gap between HIPPY children and those in the general population would be completely closed.

Findings indicate that, over the course of the program, more than half of the children involved in HIPPY became ready for school—their scores on the tests used suggested appropriate levels of cognitive and socio-emotional skills. However, a significant fraction of the children involved in the program were still experiencing some difficulties with cognitive and/or socio-emotional skills at the end of the first year of the program.

Analyses of the wellbeing and social inclusion of parents, and how these changed during the first year of HIPPY, show somewhat diverging findings, depending on the questions used and the type of analysis undertaken. Quantitative analysis revealed that most parents reported consistently high levels of wellbeing, and high levels of informal contact and support within informal networks of friends and family. This was reported by parents to be the case before HIPPY could have had any impact, as well as after. However, in response to qualitative questions asked, many parents said they had built new networks through HIPPY and these networks are perceived by parents to have been an important source of support, information and advice. In addition, one-third of parents reported increased engagement in their communities since doing HIPPY, including in festivals and

events held locally, and in voluntary activities in their local communities, such as holding playgroups and getting involved in their children's school. The fact that we found no change over time using standardised quantitative measures is likely to be explained by the lack of sensitivity of these measures, especially those aiming to measure broad constructs like sense of community, and the fact that some of these constructs have also been shown by other research to remain stable over time.

These findings also show that parents' participation in paid work and study increased during their first year in the program. While it is difficult to attribute these changes to HIPPY (especially as mothers' economic participation often increases as their children get older), responses from parents provide evidence that HIPPY had at least influenced the employment and study plans of some parents, with several parents saying they had been inspired to pursue studies and/or employment in child care, education or other care-related industries. Put differently, in the context of contemporary theory, HIPPY seems to have been effective in building social capital.

Interviews with tutors included questions about the effect of HIPPY on their life, especially in terms of gaining work and education skills, their self-esteem, social inclusion and social capital, as well as some demographic information about themselves. Thirty-four tutors' responses were analysed for this report. Almost all had either previously completed HIPPY with one of their own children or were currently doing the program with one of their own children.

Responses indicate that tutors perceive HIPPY helped them to develop job skills and that the skills they have learnt working at HIPPY will be useful when they apply for other work. Because of HIPPY, many had either enrolled in further education or were thinking about it, mostly in early childhood education and child-care courses or community services and development.

Tutors' self-reported wellbeing was slightly higher than that found in a normal population, and most said that doing HIPPY had a positive impact on their life, especially in relation to building relationships and support networks and enhancing their engagement and sense of inclusion in their communities.

## **Key findings**

The findings from this study show that HIPPY possesses some of the key features of effective early childhood development programs. They build on previous research evidence in Australia that supports the notion that HIPPY has an important role in:

- preparing children from disadvantaged communities for school readiness
- assisting parents in their parenting role generally and in their capacity to promote the positive development of their children
- increasing parents' sense of inclusion and connectedness with their community
- developing the skills and self-esteem of tutors (who are usually parents currently or formerly involved in HIPPY).

There are, however, limitations in this study which impact on our ability to generalise from the findings. The sample is relatively small, both in terms of numbers of parents, children and tutors and in terms of the number and range of communities from which they came. The lack of a comparison group also limits our ability to say with confidence whether the gaps in school readiness of children were narrowed because of HIPPY or by normal processes of parental support and guidance and maturation. Nevertheless, the findings from this evaluation are positive and helpful.

## **Potential development of HIPPY**

Possible areas for development of the program itself must be advanced with caution given the limitations outlined above. However, the following are suggested as areas warranting further research and consideration by HIPPY Australia for the purpose of program development.

### **Further training**

Tutors have reported difficulties in relating to and responding to the behaviours of challenging families and review of their training in this area appears to be warranted.

### **Better engaging the less engaged**

A more fine-grained analysis of the characteristics of those parents and children who derive lesser benefit from HIPPY is warranted in order to develop strategies most suited to their needs. A similar study of tutors is warranted in order to clarify those tutor characteristics most suited to delivering HIPPY (noting the evidence in this evaluation that the work of the great majority of tutors seems very effective). The age appropriateness of the HIPPY curriculum also warrants further investigation, given that our analysis shows that the children who benefited most from the program were aged over 4½.

### **Questions about the design and implementation of HIPPY**

Questions about the design and implementation of the program itself have also been raised and warrant further investigation.

### **Parent meetings**

Why are parent meetings less valued and attended by many parents? Are such meetings viable given pressures on some parents? Are they timely, or can some redesign enhance their effectiveness? Are additional supports such as childcare or other domestic assistance required by some parents? One notes here the comments of several parents that they lacked time to attend parent groups or to do the HIPPY activities daily; and while there might be a range of factors leading parents to say this, it is not surprising that the time and energy possessed by many parents, in such groups as HIPPY targets, are limited.

### **Program integrity**

While the finding that program integrity is more difficult to achieve when English is not the family's first language is not surprising, it still prompts questions about how the program can be improved for such families. Could additional coaching in English be provided parallel with the delivery of HIPPY? Are the materials translated into enough non-English languages, or are translated materials sufficiently culturally sensitive? Further investigation might also be conducted into whether limited English leads to limited participation in parent groups, and whether the educational experience of people from certain cultures is of highly directive models of teaching, so they are less comfortable with the interactive learning models which are more familiar to people in many western countries.

### **Community participation**

The finding that parents in general reported high levels of interaction with the community before involvement with HIPPY but greater levels of participation afterwards warrants further examination as this was not the case for all families. There is room for further examination to discover which families are more isolated, what the impact of this is, and how their greater social participation might be promoted. What is clear is that HIPPY plays a very important role in this area of developing 'social capital'; what is less clear is which families benefit from this, why, and whether additional strategies for some families might be considered.

The findings from this study support the general proposition that programs with certain characteristics which HIPPY possesses help to strengthen the home learning environment as an important proximal factor in mitigating the effects of socioeconomic disadvantage, improving children's readiness for school and enhancing future life chances.

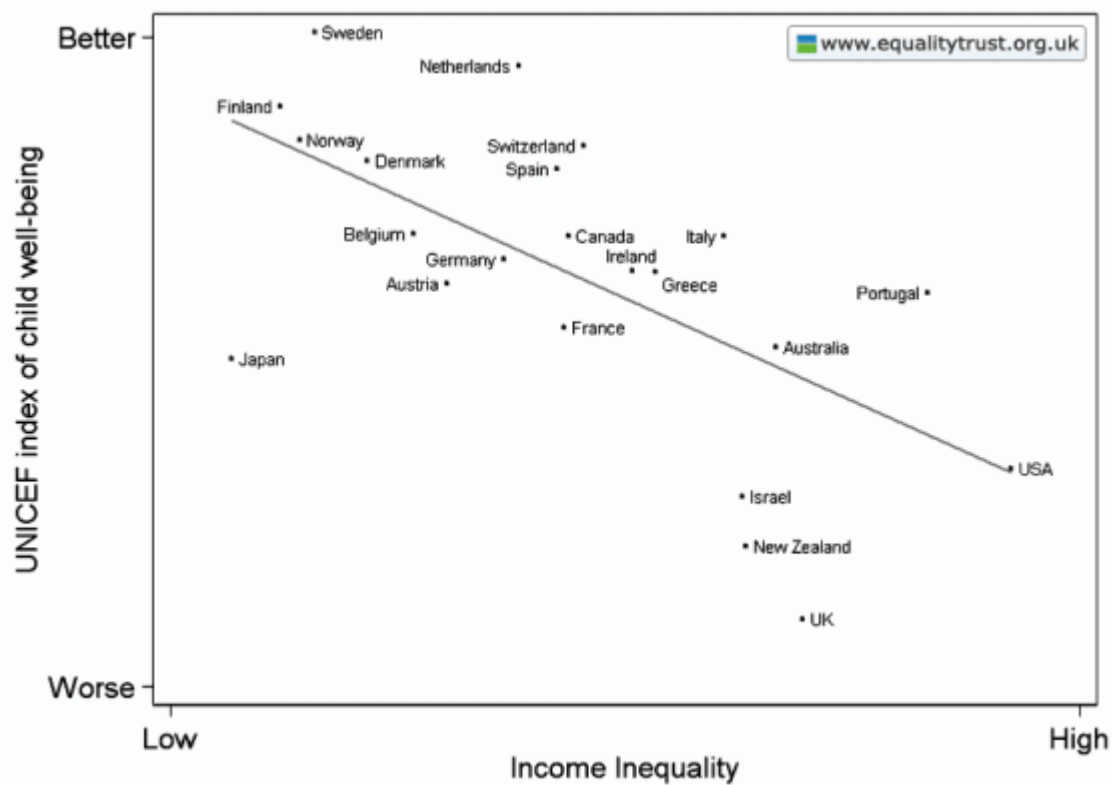
## I Introduction

### The nature and extent of the problem that HIPPY aims to address

Australia currently has a higher level of inequality (measured as income inequality) than at any time in the past. High levels of inequality are linked to a number of health and wellbeing outcomes including physical health, mental health, drug abuse, education, imprisonment, obesity, social mobility, trust and community life, violence, teenage births, and child wellbeing. For all 11 of these health and social problems, outcomes are very substantially worse in more unequal societies (Wilkinson & Pickett 2007).

Of the 22 wealthiest countries in the world, Australia has the fourth-highest level of income inequality<sup>1</sup> and the sixth-lowest level of child wellbeing (see Figure 1.1). The low income and associated low socioeconomic status (SES) of the poor or near poor are also linked to worse cognitive development, achievement and behaviour among preschool-aged children—in short, less adequate readiness to learn and less adequate readiness for school (Brooks-Gunn 2003; Hilferty & Redmond 2009).

**Figure 1.1 The impact of inequality on child wellbeing**



Source: Pickett and Wilkinson (2007, p.5)

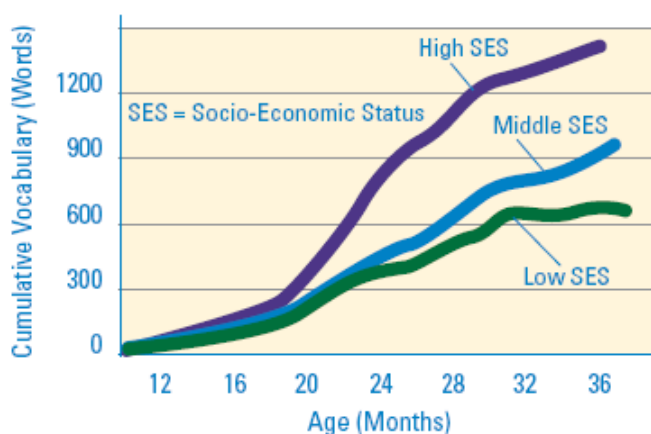
But why is this a problem? And how big a problem is it? There are currently over 500,000 children growing up in poverty in Australia (approximately 1 in 7 children). This places Australia in the middle of all OECD countries in terms of the percentage of children living in poor households

<sup>1</sup> Income inequality is based on the Gini coefficient for private income. But even when this is adjusted to take into account total fiscal redistribution (tax and transfer reductions) in each country to arrive at a Gini coefficient based on disposable income (interpreted as a measure of income inequality after social policies have done their work), Australia's position remains much the same (Mahler & Jesuit 2004).

(below 50 per cent of the median equivalised income). However, child poverty is 4.3 times higher in Australia than in Denmark, and the average equivalised income of households in the richest OECD countries is 1.5 times higher than for households in Australia. In addition, as Morrison (2009, p.51) notes, in Australia: ‘despite a fall in child poverty in recent years, there has been growing income polarisation amongst the various kinds of households with dependent children’, with income of medium or high-income households with dependent children growing 1.5 times faster over the past 10 years than for low-income households.

As mentioned above, income levels are linked to preschool-aged children’s readiness to learn and readiness for school. Furthermore, any gaps in linguistic development, cognitive and non-cognitive skills between children of different socioeconomic groups have been shown to emerge early, are widest at the age of 3 for those in deep poverty (see Figure 1.2), and persist throughout the life course (Carneiro & Heckman 2003). Children of poor or near poor families do not enter school on an equal footing with their more affluent peers and are set on a trajectory for lower school achievement and poorer health and wellbeing outcomes in later life, which has been shown to be difficult to alter (Brooks-Gunn 2003).

**Figure 1.2 Impact of inequality on linguistic development**



Source: Hart and Risley (1995)

What can be done about the problem? It is clear that interventions during the earlier stages of life have the potential to generate cumulative benefits by altering a child’s physical, cognitive, and socio-emotional developmental trajectory (Shonkoff & Phillips 2000; Heckman 2000; Heckman and Masterov 2007). Interventions that occur early, especially when targeted towards disadvantaged children, are more effective than later interventions in addressing the adverse effects of inequalities and closing the inequality gap (Brooks-Gunn 2003). For example, children from at-risk families who participate in successful home visiting programs are less likely to become involved with the criminal justice system or costly social services as adults (Karloly et al. 2005). Most successful early interventions are targeted towards disadvantaged families (Bakermans-Kranenburg et al. 2003) and use combined strategies that target both child and parent (Watson & Tully 2008).

Early childhood interventions often focus on parenting practices to alleviate the impacts of inequality and poverty. Even though increased income has been shown to be directly and strongly correlated with improved outcomes for young children (Wilkinson & Pickett 2007; Brooks-Gunn 2003) interventions typically target factors at the family or proximal level. The aims of such interventions are often to develop more effective parenting practices and to improve the home environment, access to services, and sense of connectedness with the local community. These factors are perhaps regarded by policy makers and program providers as more easily modifiable than the larger structural factors of inequality and income. In addition, it has been shown that about

one half of the effect of low income and low SES on children's learning and cognitive ability is mediated by the home environment (Brooks-Gunn & Duncan 2000).

Thus, even though income inequality and poverty directly affect outcomes for children in the early years, and, even though Wilkinson and Pickett (2007) point out many different ways in which societies may be made more equal, until such time as some substantive gains can be achieved in tackling the underlying causes of inequality, local communities and families will remain the target of early interventions both to directly address inequality gaps and, perhaps more reasonably, to mitigate the adverse effects of inequality.

However, it is unlikely that solutions to reducing inequality directly can be found at the local level when it is not clear that local communities and a lack of parental 'competency' caused the large increases in inequality in the first place. Nonetheless, the expectation that local communities can be effective in *directly* reducing inequality seems to persist. For example, reducing inequality is a consistent and explicit goal of programs such as the New Deal for Communities and Sure Start in the United Kingdom, and Neighbourhood Renewal and Communities for Children in Australia. A more comprehensive understanding of the nature of the problem (in particular its aetiology) and what can and cannot reasonably be addressed and achieved by interventions at the family and community levels is therefore warranted. As Jeanne Brooks-Gunn states:

If policy makers believe that offering early childhood intervention for two years will permanently and totally reduce SES disparities in children's achievement, they may be engaging in magical thinking (Brooks-Gunn 2003, p.9).

## **What's known from existing research into HIPPY**

To date, HIPPY has been the subject of evaluative research in a number of countries including Australia.<sup>2</sup> The results of this research are surprisingly diverse, and range from showing HIPPY to be 'promising' (Lombard 1994; Baker & Piotrkowski 1996; Burgon et al. 1997; Barahava-Monteith et al. 1999; Le Mare & Audent 2003) to 'positive or excellent' (Bradley & Whiteside 1995; Kagitcibasi 1996; Bradley 1999; Jacobson & Ramisetty-Mikler 2000) in achieving its aims. Significant research gaps remain in the evaluation of HIPPY, both in Australia and abroad, particularly in relation to testing of the effectiveness of the program (HIPPY USA 2001).

Previous research into HIPPY in Australia has been undertaken at single or dual sites. It has focused on issues of program implementation and adaptation within the Australian context (Grady 2002; Godfrey 2006; Green 2007), the acceptability and meaning of the program for participants, and perceived effects (Gilley 2002; McDonald 2004; Green 2007). Findings, although mixed, have been largely positive and are consistent with international research into HIPPY. This includes an acceptance of the program by adults involved as being flexible, adaptive, supportive and enjoyable, with perceived positive impacts in terms of: the child's cognitive and social-emotional development; parenting skills and parent-child relationship; parental confidence in their role as the child's first teacher; self-esteem, knowledge and understanding of childhood development; and acquisition of new skills relevant to their general employability.

## **The value and aims of this evaluation**

This evaluation of HIPPY builds on the existing evidence base of the appropriateness, acceptability and effectiveness of the program and includes a sample of six sites. It is the most extensive evaluation of HIPPY that has been conducted in Australia to date; but Monash University and the

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<sup>2</sup> HIPPY was originally developed in Israel. Known as HAETGAR in Israel, it has been replicated in 12 countries and currently operates in Australia, Austria, Canada, Germany, Italy, New Zealand, South Africa and the United States. Pilots have commenced in Argentina, Denmark, and Switzerland. Early childhood programs in Turkey and the Netherlands are based on HIPPY principles and strategies. Programs that have operated in Chile and Mexico have closed due to changes in political leadership and policies. The possibility of introducing HIPPY into China, Portugal, Singapore and Zimbabwe is under exploration.

Brotherhood of St Laurence have also been engaged by the Commonwealth Department of Education, Employment and Workplace Relations to undertake the evaluation of the national rollout of the program to 50 sites by 2011. The current six-site evaluation is a longitudinal quasi-experimental study that assesses the impact of the program across a number of ecological levels over time within the study group. In future research we intend to explore comparisons between the study group and a non-randomised control group derived from the Longitudinal Study of Australian Children (LSAC).

HIPPY is designed primarily to improve the child's school readiness and readiness to learn. It does this by engaging children in activities and contexts directly, thus operating at what Bronfenbrenner (1995) has termed the microsystem or proximal level. But HIPPY also attempts to influence the other interrelated systems of Bronfenbrenner's model within which the child is nested: family, school and community. As such, HIPPY aims to bring about improvements not only for children but also for parents and the community.

In addition to evaluating the outcomes of HIPPY, this research evaluates process by assessing program integrity so as to better understand the essential and core components of the program that would appear to effect change.

We already know, from over 50 years of research into parenting programs, that effective early interventions which aim to improve children's cognitive ability and behaviour include the core components identified in Sutton et al. (2004): active rehearsal of new parenting skills; teaching of behavioural principles rather than prescribed techniques; practice of new parenting behaviours at home; use of play and praise in building positive relationships, as well as use of (non-violent) sanctions for negative behaviour; and acknowledgement of relationship difficulties between adults in the family.<sup>3</sup> Where such relationship difficulties exist, the need for appropriate interventions and support is most critical in situations that include issues of domestic violence.

It is clear that HIPPY includes many of the above features and the following evidence-based design characteristics (Hilferty & Redmond 2009):

- being intensive in nature
- comprising multiple components – e.g. early childhood education and a simultaneous family support strategy
- intersecting both home and childcare settings, or home and school
- including quality education and direct teaching of child and support for parents and teachers
- including a curriculum that children can meaningfully connect with
- beginning in the preschool period and extending into the early school years.

### **Home Interaction Program for Parents and Youngsters**

HIPPY is an international early education program that has been operating in Australia since 1998, where it is managed by HIPPY Australia and auspiced by the Brotherhood of St Laurence. In previous years, the Brotherhood of St Laurence Research and Policy Centre worked together with Swinburne University to undertake several single-site evaluations. For this multi-site evaluation Monash University has been engaged by the Victorian Department of Education and Early Childhood Development and, in 2009, by the Commonwealth Department of Employment and Workplace Relations to partner with the Brotherhood's Research and Policy Centre to continue to build the evidence base of the program's appropriateness and effectiveness in various Australian contexts.

HIPPY is a two-year, home-based, parent involvement, early childhood education program. Children typically begin HIPPY between the ages of 3<sup>1</sup>/<sub>2</sub> and 4, in the year prior to entry to primary

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<sup>3</sup> For details of the core components, see chapter three.

school, and participate in the program for two years. It is thereby designed to support families during the important stage of children's transition to school.

Most of the content is delivered using a home-visiting model. The program is designed so that parents deliver HIPPY lessons to their children at home, with support in the form of visits from home tutors (paraprofessionals) and group meetings with home tutors and other parents. It is a highly structured program in which home tutors model activities with parents for them to complete with their children (this is referred to as 'role-play' in HIPPY). The activities are designed for parents to do with children daily. In most cases the home tutor visits the family's residence once every fortnight to go through a workbook of activities with the parent. Between home visits, the parent goes through the same material with their child. Parents use 30 workbooks and nine stories a year with their children. At most sites there is also a fortnightly parents' meeting where parents role-play the activities in a larger group and take part in enrichment activities.

The HIPPY home tutors are usually parents who have already been through the program with their children. The coordinator supervises the home tutors and meets with them to discuss the activities, model the curriculum and discuss the work and any problems they are facing. It is expected that home tutors will usually only work with HIPPY for two years and will be able to use this experience to help them acquire work skills. By training parents as home tutors, HIPPY aims to provide a supported pathway to employment and community leadership for some parents.

The HIPPY curriculum is based on language development, problem solving, perceptual skills and logical thinking. It is also designed to develop children's social, emotional, and fine and gross motor skills. HIPPY operates in several countries, and most of the HIPPY books and curriculum materials were originally developed by HIPPY International, but have been adapted to meet local needs in most countries, including Australia. For example, materials are produced in, or translated into, community languages, or adapted to suit the local school curriculum. All storybooks feature a range of cultures and environments. HIPPY Australia currently uses two storybooks written and produced locally plus five written and produced in New Zealand. In Australia, the storybooks are translated into Somali, Vietnamese and Arabic, with other languages to be added as funding is secured.

When data collection for this study began, HIPPY was operating in nine communities in three Australian states. In each location, the program is run by local health or community-based services. Families are recruited via self-referral or word of mouth in response to advertisements of the program and referrals are made from professionals and paraprofessionals, and health care or school staff, including the local HIPPY coordinator.

## **Research questions**

The research questions are:

- Is the HIPPY child's school readiness enhanced by the HIPPY program?
- What is the impact of HIPPY on the parent-child relationship, and is it enhanced?
- What is the impact of HIPPY on the parent's and tutor's sense of wellbeing and social inclusion?
- To what extent, and in what ways, do contextual factors impact on the design, implementation and outcomes of HIPPY?
- To what extent has program fidelity been maintained during rollout across Australia?
- What changes to HIPPY are recommended in order to ensure appropriate high levels of program fidelity for future rollout?

## **Structure of this report**

The remainder of this report is structured as follows. The next chapter describes the design of the evaluation. This is followed by a presentation of findings. Findings are organised in relation to each of the research questions outlined above. We begin with a brief description of the characteristics of those involved in the program, followed by an assessment of the impact of HIPPY on children's school readiness, the primary goal of HIPPY. We then assess the impact of HIPPY on the parent-child relationship, and on parent and tutor wellbeing and social inclusion, which can be considered secondary aims of the program. The final section describes variation in the ways in which the program is delivered and how it affects outcomes of the program. A concluding chapter draws this analysis and our findings together.

## 2 Evaluation design

This chapter provides information on the design of the evaluation, the constructs and measures used, the participants, the data collection and the analysis. In the first section the program itself is described.

### Research structures

The research team reflected the partnership between Monash University and the Brotherhood of St Laurence. Associate Professor Max Liddell of Monash University Department of Social Work was Chief Investigator. The researchers were located at the Brotherhood of St Laurence, initially under the direction of Dr Janet Stanley and then Mr Tony Barnett, and the team comprised Dr Zoe Morrison and research assistants Fatou Roost and Jody Hughes. An Advisory Committee composed of Associate Professor Liddell, Mr Barnett, Dr Morrison, representatives of HIPPY Australia, HIPPY coordinators, the Australian Institute of Family Studies, the Victorian Department of Education, and HIPPY International provided advice on the project.

Monash University Standing Committee on Ethical Research on Humans gave approval for the evaluation to proceed.

### Design

The current evaluation of HIPPY is designed as a two-year longitudinal quasi-experimental research study that aims to investigate the *process* of the program, and its *outcomes*. In relation to process, the evaluation aims to investigate how the context within which HIPPY is delivered influences the design, implementation, uptake and acceptability of the program, as well as its outcomes. In relation to outcomes, the evaluation aims to investigate the impact of HIPPY on the child's school readiness, the parent-child relationship, and the sense of wellbeing and social inclusion of parent and home tutor. The evaluation has been designed to measure change over time in the above outcomes by following a cohort of parents, children and tutors through their participation in the two-year program.

This report is based on data collected from parents and children at the middle point of the two-year program, that is, when they had completed the first year of HIPPY.

### HIPPY sites and participants

There are five groups of participants included in the two-year evaluation: parents in the HIPPY program, children in the HIPPY program, HIPPY home tutors, HIPPY site coordinators, and HIPPY children's teachers in their first year of primary school. This report includes information obtained from HIPPY parents, children and home tutors after one year of the program. The evaluation encompasses six of the nine HIPPY sites operating in Australia in 2008 when data collection began. Three sites (La Perouse, in New South Wales, and Winchelsea and Colac, in Victoria) were excluded due to difficulties in collecting baseline data resulting in no data being collected.<sup>4</sup> The remaining sites included one urban and one rural location in Tasmania (Burnie and Smithton) and four locations in Victoria (Moonee Valley, Fawkner, Fitzroy and Geelong). These sites encompass some very diverse communities with a range of economic, cultural, educational and social demographics. For example, HIPPY Fitzroy includes many Vietnamese and Sudanese families living in the inner city high-rise housing estates of Fitzroy and Carlton; Moonee Valley includes many Somali families living in public housing in North Melbourne and women living in Flemington from other Horn of Africa

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<sup>4</sup> In La Perouse, an almost entirely urban Indigenous site, it was decided to employ a local Indigenous researcher to undertake data collection. Recruitment of this position was delayed and the opportunity for collection of baseline data missed. Winchelsea and Colac were excluded as the enrolment process at these sites was delayed and there were no enrolments at the time of baseline data collection.

communities; and Smithton is an isolated town in rural Tasmania with a wide range of families including single mothers, not-working mothers, isolated farmers, and families newly arrived in Tasmania from different countries or different parts of Australia.

All parents enrolled in the program at these six sites in 2008 were invited to participate in the evaluation. Each site coordinator was provided with information about the study and asked to inform parents verbally about the study. Coordinators then sent letters to parents asking whether they were happy to be contacted by a researcher. If parents were willing to be contacted, they were asked to return these permission slips to coordinators with their contact details. (A few gave their verbal consent to coordinators.) Of the 195 families enrolled in HIPPY in Victoria and Tasmania in 2008, 120 parents gave their consent to be contacted. Coordinators passed on parents' permission slips and contact details to research staff, who then called parents to arrange a convenient time to be interviewed.

Baseline interviews with parents and children were completed between 4 February 2008 and 23 May 2008. Interviews were completed with 93 parents (48 per cent of those enrolled in the program at the six sites). Eighty-four of their children were directly assessed by researchers (see Table 2.1 below).<sup>5</sup>

**Table 2.1 Number of parents and children assessed at baseline per HIPPY site**

HIPPY site	Parents	Children
Fawkner	7	7
Fitzroy	16	14
Mooney Valley	19	16
Geelong	32	30
Burnie	12	11
Smithton	7	6
<b>Total</b>	<b>93</b>	<b>84</b>

The second round of interviews with parents and children were completed as close as possible to the end of the HIPPY year, between 21 October 2008 and 11 December 2008 (time 1).<sup>6</sup> Parent contact details were updated via records provided by HIPPY Australia. Of the 93 parents who completed baseline interviews, 73 completed time 1 interviews (or 78 per cent of the original sample). Of the 20 parents lost between baseline and time 1, five parents were lost because of withdrawal from the program, 13 parents could not be contacted (either by phone or when researchers arrived in town to complete the scheduled interview) and two parents said they were too busy to participate and refused.

Direct assessments of children were completed with 63 children at the end of the first year (time 1). This means we have both parent and researcher-assessed child outcome data at both baseline and time 1 for 63 families in the program (see Figure 2.1 below).

All home tutors at the nine sites were invited to be interviewed for this evaluation. There were 35 tutors across these sites in 2007. Interviews with home tutors were conducted in late 2007 and the first few months of 2008. Thirty-four tutors' responses were analysed for this report. No home tutors refused to be interviewed but one was on maternity leave at the time of data collection.

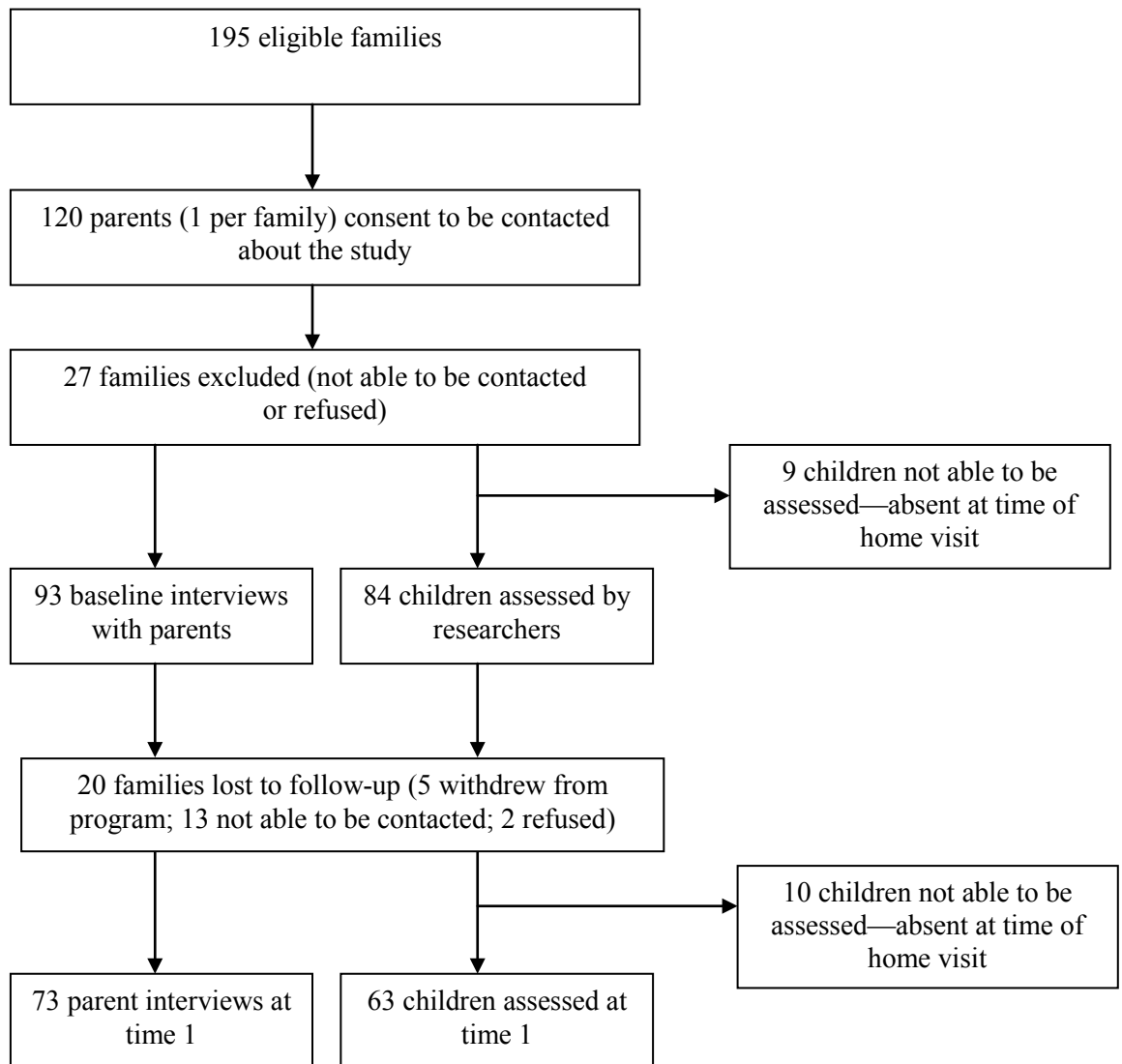
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<sup>5</sup> Where families had two children doing HIPPY, parents chose one child to focus on in the interview. In total, direct assessments were completed with 88 children, but this included four families where two children were doing HIPPY and both were assessed by the researcher. We have linked parent and researcher-assessed child outcome data for 84 cases at baseline.

<sup>6</sup> Two interviews were planned for parents and children—time 1 refers to the second round of interviews after completion of the first year of the program.

All HIPPY site coordinators will be invited to complete a questionnaire towards the end of the two-year evaluation.

**Figure 2.1 Participant flow diagram: parents and children**



## Data collection

Five groups of participants are included in the evaluation: parents in the program, children in the program, HIPPY home tutors, HIPPY site coordinators, and HIPPY children’s teachers. There are three types of data collection used: face-to-face interviews based on structured questionnaires, direct assessments of children carried out by researchers, and teacher assessments of children’s skills and abilities based on teacher self-completed questionnaires.

Parents are asked to complete a questionnaire at three points in time during the course of the two-year evaluation:

1. within the first month they take part in the program (baseline)
2. in the final month of the program for Year 1 (time 1)
3. at the end of the final month of the program for Year 2 (time 2)

As mentioned above, this report is based on data collected from HIPPY parents, children and home tutors at the middle point of the two-year HIPPY program and evaluation. Thus, the report is based on data collected at baseline and time 1 only. Data for time 2 will be collected in November and December 2009.

HIPPY tutors are invited to complete a questionnaire twice—near the beginning and the end of the evaluation. HIPPY site coordinators will be interviewed once towards the end of the two-year evaluation.

All parent, tutor and coordinator interviews are conducted in person with a researcher asking the participant questions from a structured, written questionnaire and writing down their responses. The questionnaire for each group comprises a mixture of qualitative and quantitative questions.

The interviews take about 40 minutes and are completed at a venue nominated by the participant, typically their home (for parents and tutors) but sometimes the HIPPY premises (more typically for coordinators and tutors). Parents and tutors receive a payment of \$25 for the time taken to be involved in the research.

Explanatory statements, letters to parents, and consent forms were designed in the languages spoken by participants, and participants were informed of the availability of interpreters. All participants were initially given information about the evaluation, and consent was obtained prior to commencing each interview.

Consent for children to participate was obtained from the child's parent (or guardian). Parents were provided with an explanatory statement outlining the process and if, after reading this, they were willing for their child to take part they signed a consent form on behalf of their child. This documentation was again provided in the parent's own language. Prior to commencing assessments of children, the researcher explained to the child what they were going to be asked to do and asked if they were willing to take part (verbal consent was secured). Parents received no payment for allowing their children to take part, but the children received a small gift, usually coloured pencils and/or booklets.

A pilot of the tutor and parent questionnaires was undertaken with five home tutors and five parents. On the basis of the feedback, changes to the questionnaires were made, to shorten the overall length, and to add more open-ended questions and several measurement scales. Based on the pilot, as well as feedback from other researchers and the advisory committee, a scale asking questions about the parent-child relationship was removed because it was felt that the questions were too personal in nature.

Teacher reports of children's development will be included in the second year of the evaluation, when HIPPY children have started school. Each child's teacher will be asked to complete an assessment of the child's development at the beginning and end of the school year. Their assessments of how children have improved over time will be incorporated in the final report for this study.

## **Measures**

The current evaluation collects baseline data on the following demographic and socioeconomic characteristics of participants: age of child doing HIPPY, gender of child doing HIPPY, number of people in household, education level of parent delivering HIPPY, age of parent delivering HIPPY, main language spoken at home, English ability of parent delivering HIPPY, marital status of parents (for example, single-parent family), employment status of parents, main source of income and total household income for parents, age of tutors, education level of tutors, English ability of tutors, employment status of tutors, previous employment of tutors, and income level of tutors.

### **Primary outcomes: school readiness**

The school readiness construct is made up of questions in relation to numeracy, literacy, language, social-emotional adjustment, fine motor skills, interest in and attitude to learning. Child's school readiness is measured in two ways: by parent report and direct assessment. Parent reports of school readiness occur at baseline (entry into the program), time 1 (the end of the first year) and time 2 (the end of the second year) via the parent questionnaire. Five domains for measurement were selected based on a 'holistic' conceptualisation of school readiness, which incorporates physical wellbeing, social and emotional development, language skills, numeracy, and literacy (Janus and Offord 2007; Farrar et al. 2007; Hilferty & Redmond 2009). Measurement tools were selected that had been used and validated in other studies. Many of those selected were included in the Longitudinal Study of Australian Children (LSAC) with children of the same ages as those involved in HIPPY,<sup>7</sup> allowing us to compare our findings with the largest longitudinal study of children ever undertaken in Australia.

Direct assessment with the child also occurs at baseline, time 1 and time 2, using the validated 'Who Am I?' assessment tool for numeracy and literacy. This is administered by a trained HIPPY research officer in the child's home with the parent present. This tool was chosen for several reasons. It assesses developmental processes that are central to the skills HIPPY aims to develop—the cognitive processes around literacy and numeracy. The assessment task is quick, similar to tasks students already complete in HIPPY, and is designed to feel like a fun activity rather than an assessment, so it should be non-threatening to children. It has been designed for use with children who do not speak English as their first language, which is important given the large number of culturally and linguistically diverse (CALD) children in HIPPY. 'Who Am I?' is also included in the Longitudinal Study of Australian Children. Reference to the 'Who Am I?' norms and the LSAC will allow for analysis of change over time in children doing HIPPY in comparison with other Australian children.

### **Secondary outcomes: parent-child relationships, wellbeing and social inclusion**

The parent-child relationship is measured by parent report. Relevant questions in the parent questionnaire focus on communication style, feelings of attachment and involvement in the child's schooling and education.

Wellbeing and social inclusion are measured by parent and tutor self-report. Relevant questions focus on neighbourliness, trust, social contacts, networks, support, civic engagement, notions of collective efficacy, satisfaction with life and with living in the area, skills and confidence as the child's first teacher, and skills and confidence to pursue training and education or employment.

### **Context and implementation fidelity**

Information on context, adaptation and implementation of the program is gathered as a reflexive process with the use of both closed and open-ended questions that form part of the parent, tutor and HIPPY coordinator questionnaires. Questions that focus on these issues in the respective questionnaires cover the areas listed below.

#### *Parent questionnaire*

The parent questionnaire covers ability to complete HIPPY activities; perception of cultural appropriateness of HIPPY books and other materials; and overall experience of the process of doing HIPPY.

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<sup>7</sup> The LSAC is the largest longitudinal study of children ever conducted in Australia. It aims to track the development of young Australians from birth to early adulthood. Data are being collected from two cohorts every two years, a first cohort of 5000 children aged less than 12 months in 2003–04, and a second cohort comprising 5000 children aged 4 years in 2003–04. Study informants include the children (when of an appropriate age) and their parents, carers and teachers.

### *Tutor questionnaire*

The tutor questionnaire covers recruitment into HIPPY; any difficulties delivering HIPPY (including quality of relationship with parents, tutors and coordinator); experience of process of doing HIPPY; satisfaction with the program; perception of parent capacity to complete activities and strategies for assisting them; perception of parental engagement with the program; turnover/experience; perception of cultural appropriateness of HIPPY books and other materials; perception of effectiveness of various program components; and variations in language used when working with families.

### *HIPPY coordinator questionnaire*

The coordinator questionnaire covers information about the coordinator–tutor relationship; adaptation of the program and the degree to which it has been delivered as planned.

## **Analysis**

This report is based on analyses conducted of change in key outcome measures for parents and children between baseline (entry into the program) and time 1 (the end of the first year in the program). The dependent means (paired samples) t-test was used when data were interval, and the non-parametric Wilcoxin ranked test for dependent samples was used where data were ordinal or categorical.

Multiple regression was performed to develop predictive models and to control for the effect of covariates, and perform subgroup analysis.

Some analysis of differences between groups was also undertaken (for example, to assess differences between sites and children of different ages and family backgrounds). Quantitative data were analysed using ANOVA, and the chi-square test of association was used where data were nominal.

Unstructured qualitative data were analysed through thematic analysis, conducted by two independent researchers, with results compared and discrepancies discussed.

We plan to extend all the above analyses when families have completed their second year in the program and data collection is complete. In addition, we will incorporate analysis of how the development of children doing HIPPY compares to the development of a matched sample of children from the LSAC.

### 3 Characteristics of those involved in HIPPY

The characteristics of those involved in the program vary greatly on some dimensions from those of the general Australian population. Table 3.1 (below) demonstrates that the program has, as intended, been delivered to some of the most disadvantaged households in our community. Compared to the general population, the HIPPY study population is made up of people with a much higher rate of unemployment and reliance on government benefits as their main source of income, who have had less schooling, and includes a high proportion that have completed a vocational certificate or diploma as distinct from a university degree. Most notably, 43% speak a language other than English as the main language spoken at home as compared to 16% in the general Australian population. However, family type (couple, one-parent, other/extended) closely resembled that of the overall Australian population.

**Table 3.1 Characteristics of parents and children involved in HIPPY**

Demographic	Number (N)	HIPPY	Australia
Child's age in years	93	<i>M</i> 4.5; <i>SD</i> .63	
		%	%
Child's gender:			
Male	56	60.2	
Female	33	35.5	
Not reported	4	4.3	
Parent's gender—Female	91	97.8%	
Family type:			
Couple family	66	71.0	72.1
One parent family	23	24.7	25.1
Other/Extended family	4	4.3	2.7
Main language spoken at home:			
English	53	57.0	78.5
Somali	20	21.5	
Arabic	10	10.8	
Other	10	10.8	
Parent level of school education:			
Year 8 or below or did not attend school	12	12.9	1.9
Years 9–11	36	38.7	30.4
Year 12	45	48.4	60.7
Parent's post-school education:			
University degree or above	10	10.8	25.9
Vocational certificate or diploma	49	52.7	24.3
School year level or equivalent	4	4.3	
None	26	28.0	
Not reported	4	4.3	
Main source of household income:			
Salary or wage earned by you or partner	38	40.9	75.9
Government benefit, pension or allowance	49	55.9	12.5
Other/Don't know/Missing	3	3.2	11.6
Parent has Health Care Card	69	74.2	
Employment status of parent:			
Employed full-time	6	6.5	66.6
Employed part-time or casual	14	15.1	28.1
Not working/Not looking for a job	69	74.2	5.3
Other	4	4.3	

Source for Australian population data: Australian Bureau of Statistics

#### Education

As Table 3.1 shows, 12.9% of HIPPY parents (compared to 1.9% of parents in the general Australian population) had a maximum school education of Year 8 or below or did not go to school, while 38.7% had a maximum school education of between Year 9 and Year 11 levels.

Nearly half the HIPPY parents (48.4%) reported they had Year 12 level school education with one in five of these having gone on to undertake a university degree. However, 52.7%, just over twice the number in the general Australian population, reported they had undertaken other education or training activities (school level, vocational, diploma) while 28% stated they had no post-school education.

### **Income**

Over half (55.9%) of the HIPPY parents had a government benefit, pension or allowance as their main source of income. This compares with an Australian figure of 12.5%. But, notably, 74.2% of the HIPPY parents had a Health Care Card indicating that even if they were not receiving a government benefit, many parents were on low incomes.

### **Household type**

Some 27 respondents (29%) said their partner or spouse did not live at home. Of these, four reported that a relative lived with them, suggesting that in total 23 (24.7%) households were single-parent or single-adult households. This is not markedly dissimilar to the general Australian population figure of 27.8% for single-parent/adult households.

### **Main language spoken at home**

Only 53% of parents reported that English was the easiest and main language spoken at home. Somali and Arabic were the two main non-English languages spoken at home—by 21.5% and 10.8% of parents respectively. A total of 43% of parents reported that a language other than English was the main language spoken at home. This means that our HIPPY sample contained nearly three times more families than there are in the general Australian population who report that a language other than English is the main language spoken at home. Thus, if parental use of English at home is a predictor of early school child numeracy and literacy success (Walker et al. 2008), then HIPPY is targeting families most in need of extra support.

Together with this finding the data on education and income suggest HIPPY is reaching its target of disadvantaged groups.

## 4 Child's school readiness

There is no common accord about the definition of school readiness. However, there is a growing consensus about the multidimensionality of this concept. Traditionally, the determinant criterion that was used to assess a child's readiness for school was his/her chronological age—the reason being that some language and conceptual skills were found to be closely related to age (Piaget 1977; ARACY 2006). In recent years, there has nevertheless been an important conceptual shift in the definition of school readiness. Current research has demonstrated that one of the best predictors of children's academic achievement is their early learning experience (Meisels 1999). This suggests that both development and early learning play a role in building the skills that are essential for transition to school. Accordingly, the definition of school readiness should take into account both the child's personal readiness and the influence of his/her context.

In line with the recent literature, this research was based on a 'holistic' conceptualisation of school readiness, which incorporates five domains: physical wellbeing, social and emotional development, language skills, numeracy, and literacy (Janus & Offord 2007; ARACY 2006; Arnold et al. 2007). As outlined in the previous chapter, two techniques were used to measure children's school readiness:

- direct assessment of each child using 'Who Am I?'—an Australian validated school readiness measure designed to assess young children's level of cognitive development (de Lemos & Doig 1999)
- parents' reports on their children literacy, numeracy and social skills.

Both measurement techniques were used at the beginning of the program (baseline) and at the end of the first year of the program (nine-month follow-up).

### Child's school readiness as measured by Who Am I?

'Who Am I?' is an Australian measure based on early copying and writing skills. It is aimed at identifying the wide stages of development that trigger children's readiness for school (de Lemos 2008). 'Who Am I?' is presented in the form of a booklet where the child is required to complete a series of tasks. Responses are scored according to the child's level of competence on a scale ranging from level 0 (no response) to level 4 (clear and recognisable response). Three subscales are derived from these tasks:

- the Copying Scale based on the copying of geometric figures
- the Symbol Scale based on the child's ability to produce written symbols—name, numbers, letters, words and sentences
- the Drawing scale based on the child's representation of himself/herself.

Results from the three scales sum to yield a total score of school readiness.

'Who Am I?' has been used in a number of studies, including the Canadian National Longitudinal Survey of Children and Youth, and the Longitudinal Study of Australian Children, as well as the Queensland trial of the prep year. In the context of HIPPO, 'Who am I?' has previously shown an acceptable reliability with an internal consistency of Chronbach's  $\alpha = .80$  (Gilley 2002).

### Children's sample

This analysis of HIPPY children's score on the 'Who Am I?' tool includes only children who completed the tasks both at baseline and time 1. The sample comprised 63 children at different developmental stages. Their ages ranged from 3 to 5.9 years ( $M = 4.45$ ,  $SD = .63$ ), with 24% aged under 4 years. Some 38% of the children in the sample were female. Among the children in the sample, 68% were attending kindergarten or preschool. In order to overcome the difficulties underpinning comparison between children from different age ranges, a decision was made to use the same grouping process used by de Lemos and Doig (1999). This process consists of using three-month bands from age 4<sup>1</sup>/<sub>2</sub> to age 5<sup>1</sup>/<sub>2</sub>, and six-month bands from age 5<sup>1</sup>/<sub>2</sub> to age 7. Because 'Who Am I?' age norm data starts from age 4<sup>1</sup>/<sub>2</sub>, comparison of children aged below 4<sup>1</sup>/<sub>2</sub> years was not possible.

### Children's baseline scores for Who Am I?

HIPPY children's baseline scores were normally distributed with a mean of 15.44 ( $SD = 7.21$ ) and a range of 1 to 31 out of a total possible score of 44.

As expected, child age was the single main predictor ( $r = .44$ ;  $p < .001$ ) of school readiness and child age explained nearly 20 per cent of the variance in their school readiness 'Who Am I?' scores. Despite this relationship and the fact that we found no significant difference on the 'Who Am I?' scores between age groups, some younger children scored higher than their older counterparts.

Interestingly, data revealed a significant, yet moderate difference between girls' and boys' 'Who Am I?' scores with girls scoring on average 5.2 points higher than boys ( $r = -.31$ ;  $p < .05$ ).

Similarly, we found a significant difference in score for HIPPY children who were not attending kindergarten and those who were attending kindergarten, with the latter scoring on average 4.8 points higher ( $r = -.30$ ;  $p < .05$ ).

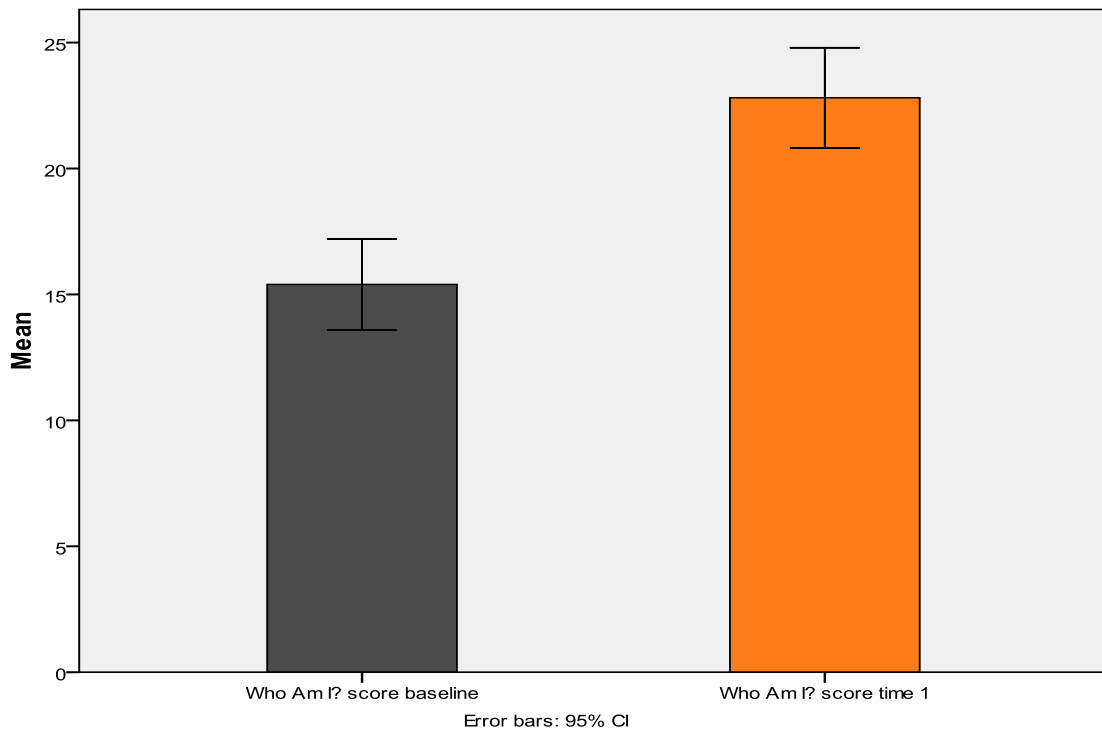
### Comparison of children's Who Am I? scores between baseline and time 1

Distribution of the HIPPY children's scores on the 'Who Am I?' tasks at follow-up was almost symmetric. Half of the children scored 22, with the middle 50 per cent scoring from 17 to 30, with the lowest score being 4 and the highest being 41. Analysis of time 1 data revealed that HIPPY children had significantly improved levels of school readiness, and the size of the improvement was large ( $r = 0.78$ ;  $p = .01$ ). As shown on Figure 4.1 (below), HIPPY children's mean score on the 'Who Am I?' scale increased by more than 7 points between baseline ( $M = 15.40$ ;  $SD = 7.16$ ) and time 1 ( $M = 22.81$ ;  $SD = 7.89$ ) [ $t(62) = 11.793$ ;  $p < .01$ ].

In contrast to the baseline scores, statistically significant differences between some age groups can be demonstrated at time 1. For example, children aged on average 58 months scored significantly higher than those aged on average 55 months. As for baseline, there was a significant difference at time 1 between girls and boys, and the magnitude of the difference was slightly larger compared to baseline ( $r = -.39$ ;  $p = .01$ ).

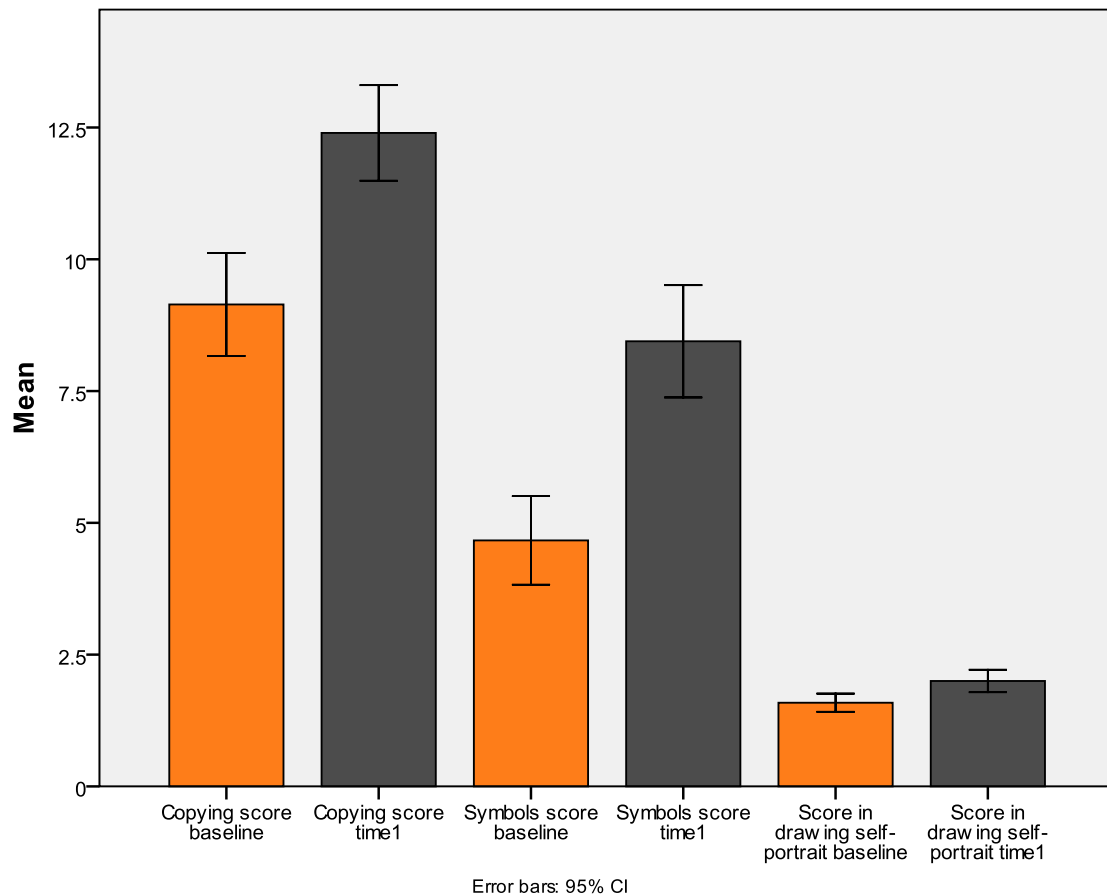
After one year in the program, the gap narrowed between the ‘Who Am I?’ scores of children who were attending kindergarten and those who were not, with the difference in means just crossing the traditional threshold of significance at the  $p = .05$  level ( $r = -.22$ ;  $p = .08$ ). This might suggest that HIPPY helped the latter children to close the gap but given the small sample and high probability of making a Type II error, this hypothesis should be tested with a larger sample. It is worthwhile to note that the children who started HIPPY with the lowest pre-academic skills (the children that fall within the first, or lowest, quartile of scores) had the biggest increase and more than doubled their scores.

**Figure 4.1 HIPPY children’s Who Am I? scores at baseline and time 1**



To obtain a more descriptive analysis about the types of skills children developed, a more detailed analysis of children’s level of development was conducted. This analysis was based on the progress achieved in each of the copying, symbols and drawing tasks, since these tasks have been demonstrated to be the most indicative of children’s developmental level (de Lemos 2008). As shown in Figure 4.2 (below), HIPPY children gained over time in all the ‘Who Am I?’ skill areas. The most notable gain was in the symbols task, where HIPPY children more than doubled their baseline score. This is an important gain, as underlined by de Lemos (2008):

Being aware that different symbols exist and that they have particular names and meanings is a first step to an understanding of conventional notion systems such as alphabet and numeral (de Lemos 2008, p.14).

**Figure 4.2 HIPPY children gains over time in the three Who Am I? subscales**

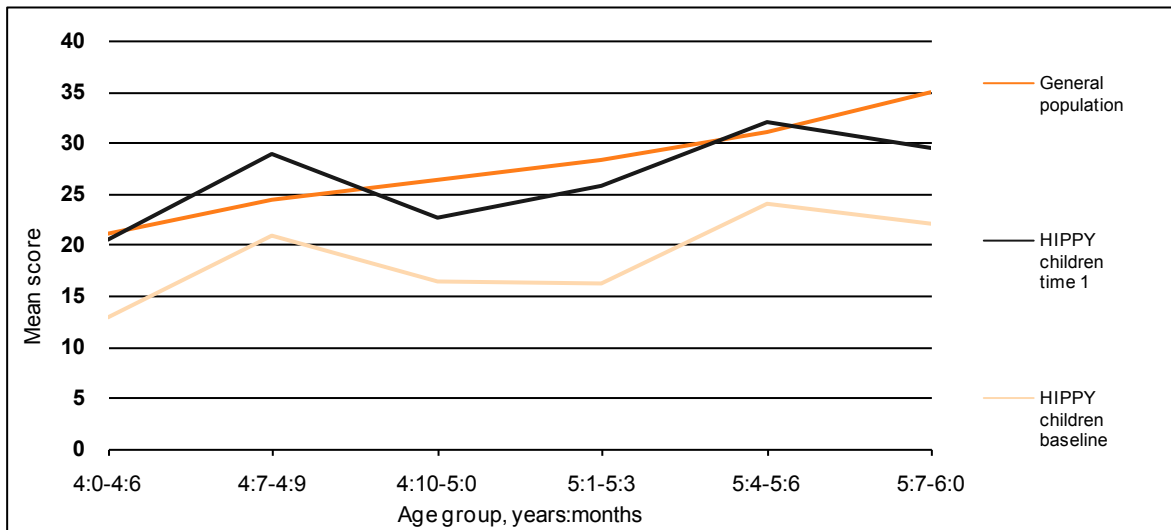
### Comparison of HIPPY children's Who Am I? score with the Australian population norm

Unlike most psychological and school readiness tests, 'Who Am I?' provides only raw, non-standardised scores. Therefore, in order to compare HIPPY children's scores on the tests with the population norm, reference values provided in the test manual for the relevant age groups were used (de Lemos & Doig 1999).

Most children started HIPPY with academic skills below the Australian norm. On average HIPPY children scored, on the 'Who Am I?' test, 6 points (14%) below the Australian norm at baseline and some children scored outside the Australian norm 95% confidence interval. As shown in Figure 4.3 (below), the mean score for HIPPY children at baseline did not intersect at any time with that of the population norm for any age group.

However, after being in the program for a year, HIPPY children narrowed their gap with the Australian population norm by more than 3 points (7%), moving their mean score closer to that of the population mean and even intersecting with it at some points. Indeed, a more descriptive analysis across age groups shows that after the end of the first year of the program, some HIPPY children scored higher than the population norm, particularly children within the age groups: 4 years, 7 months–4 years, 9 months; and 5 years, 4 months–5 years, 6 months. It is worth noting that children aged 5 years, 1 month–5 years, 3 months experienced the biggest improvement (10.6 points) after one year of the program. Furthermore, despite HIPPY children scoring on average consistently below the population norm at baseline, the difference between HIPPY children and the population norm narrowed after one year of the program, with the mean score line across all age groups at time 1 intersecting with that of the Australian norm (see Figure 4.3).

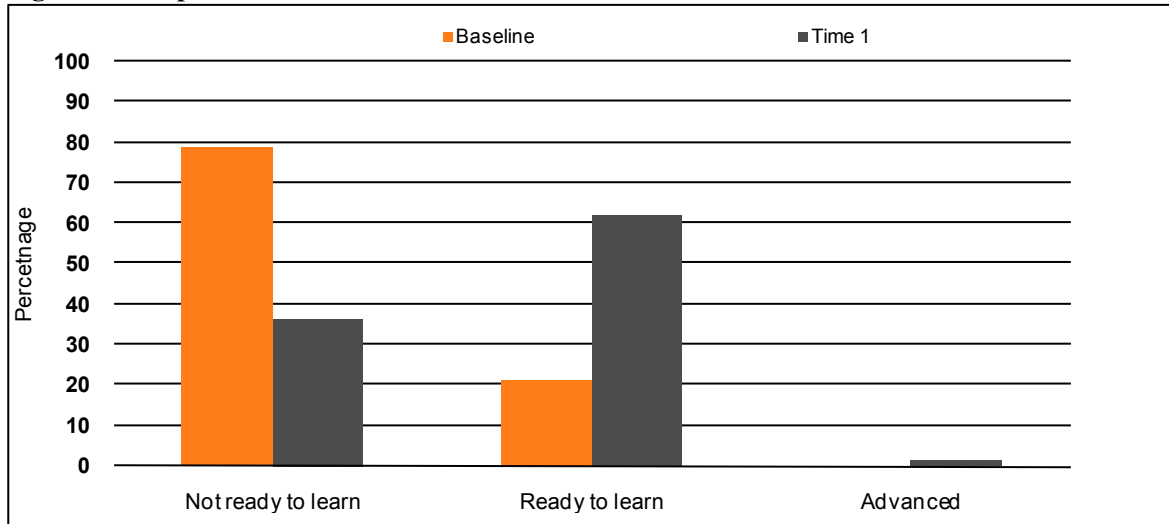
**Figure 4.3 Comparison between HIPPY children at baseline and time 1, and the population norms**



#### Using Who Am I? to assess HIPPY children's readiness for school after completion of the first year of the program

'Who Am I?' can also be used as a measure of children's development upon entry to school. Used in this way it can help identify children who may be developmentally not ready for school (de Lemos 2008). To examine HIPPY children's readiness to learn, we have used the same criteria used by de Lemos in a comparison study that assessed readiness for school across different cultural and language groups. In that study, the author constructed three levels of risk based on children's scores in the symbols and diamond tasks (de Lemos 2002). Children who failed to achieve above level 2 in any of these tasks were defined as 'not ready to learn' and children who achieved at level 3 or above in some but not all of the tasks were identified as being 'ready to learn' (having acquired some understanding of symbolic representation and the conventional symbols used in reading and writing, but having not yet reached the level at which they are able to write meaningful words and sentences). Children who achieved at level 3 or above in all the tasks were considered 'advanced' (having reached a level of development where they are able to understand and use conventional symbols for representation of words and meaning (de Lemos 2002). Using these criteria, the percentage of HIPPY children ready to learn greatly increased between baseline and time 1, as shown in Figure 4.4 (below). At baseline nearly 20% of HIPPY children were assessed as being ready to learn. After one year of the program this figure had grown to nearly 60% of children being assessed as ready to learn.

**Figure 4.4 Impact of HIPPY on children’s school readiness based on de Lemos criteria**



## Child’s school readiness as reported by parent

### Parents’ perception of children’s physical health and fine motor skills

Research now tells us that motor skills are linked to a child’s early learning and development with relationships found between gross motor skills and learning to read, and fine motor skills and learning to write (Piaget 1952; Knight & Rizzuto 1993; Meisels 2006). HIPPY provides children with opportunities to develop their fine motor skills through drawing, copying, sewing and cutting.

At baseline, when asked to indicate their children’s overall development on a five-point Likert scale, 75% of parents rated their children’s overall development as good or excellent. However, 40% of the parents indicated that they had concerns about some aspects of their children’s development. In regard to children’s physical health and motor skills, two children were reported to have hearing impairment and five children were reported to have some motor skills difficulties. Researchers’ observations of the children during the ‘Who Am I?’ assessment at baseline shows that 15% had difficulties with holding a pen, sometimes using both hands simultaneously and sometimes alternating hands.

At time 1, parents were asked to rate the impact of HIPPY on their children’s fine motor skills. Almost 60 per cent of the parents felt their children’s fine motor skills had ‘much’ improved as a result of HIPPY. Among these, one parent reported that:

*Before [HIPPY], he [my son] ...had no clue about how to hold pen, but now he can.*

Another parent commented that:

*[With HIPPY], he [my son] is a lot better at drawing straight lines and following dotted lines. His pen work is much better.*

Another parent reported the following:

*My son’s fine motor skills are much better because with HIPPY he learnt about holding a pen, about coordination and direction.*

Nevertheless, 27% of the parents reported only a little impact on their child’s fine motor skills and 14% did not see any change at all. Researchers’ observations show no variation in the proportion of children using both hands while writing between baseline and time 1.

These results demonstrate that HIPPY has a positive impact on some children's fine motor skills. The fact that more than one-quarter of parents could see no or little impact on their children's fine motor skills may indicate that the program is not helping those children in this area or, simply, that those children developed these skills prior to starting the program. The latter is plausible given that children in the HIPPY sample are at different developmental levels, with the youngest aged 3 and the oldest aged almost 6.

### Parents' reports on their children's social-emotional health

Researchers have demonstrated the link between children's socio-emotional wellbeing and their early academic performance. According to authors such as Ladd et al. (1997) and O'Neil et al. (1997), children's academic success in the early years of schooling is predicated on a strong foundation of positive social and emotional adjustment. Further, children who have demonstrated difficulties in concentrating on tasks, following instructions and getting along with peers, as well as difficulties in regulating their emotions are more likely to have difficulties at school (Arnold et al. 1999; McClelland et al. 2000). Teachers have indicated that physical health, enthusiasm, taking turns and having the ability to sit and pay attention are essential considerations in determining a child's readiness for school and readiness to learn (Brooks-Gunn 2003).

The assessment of HIPPY children's social-emotional health in this study was based on:

- parents' reports of concerns they had regarding their child's difficulties at baseline
- parents' ratings on the 25 items of the Strengths and Difficulties Questionnaire, a brief screening measure of behavioural and emotional problems in children and adolescents (Goodman 1997).

#### *Parents' reports of concerns*

As reported earlier, 40 per cent of parents had concerns about some aspects of their children's social-emotional health at baseline. Table 4.1 (below) shows the areas of concern reported by parents, the most common being concerns about behaviour and social-emotional problems.

**Table 4.1 Parents' concerns about their children's development at baseline (N = 29)**

Developmental concern	Number of reports
Autism	1
Concentration difficulties	6
Developmental delay	5
Social-emotional	7
Behavioural problems	7
<b>Total number of concerns</b>	<b>26</b>

Notes:

Developmental delay includes unspecified learning disabilities or delays in multiple areas; social-emotional and behavioural problems include aggressive behaviour, difficulty getting on with other children, shyness, jealousy etc. Some parents reported more than one concern, and some did not specify the kind of concern they had.

At time 1, parents were asked to indicate how much HIPPY had helped improve their children's socio-emotional skills: the child's ability to adapt, cooperate, take responsibility, and be self-controlled. Fifty-one per cent of parents considered that their involvement in the program had a very positive effect on their children's social and emotional development:

*She will do what she's told when she gets told to. Before HIPPY she used to be very defiant. And she is concentrating more.*

*Since HIPPY he [my child] is a lot more confident when tackling new activities and social situations.*

*At the beginning of the year, I could hardly keep him here for five minutes, now he'll sit down and concentrate a lot more, at least half an hour.*

*He is more confident and independent. I was so glad to do HIPPY with him otherwise I would have had problems with him.*

Nevertheless, 31% of parents reported that the program had only a little impact on their child's socio-emotional skills, and 18% considered the program did not lead to any changes at that level:

*My child has acquired a lot of new skills as well as information. But he hasn't made much progress in following instructions and he still has a lack of concentration.*

*She has always been really good at sitting down and reading books, always [had a] good concentration span.*

These results suggest that HIPPY has some positive impact on the children's socio-emotional health. However, any such conclusion needs to be tempered with the fact that more than one-third of the parents interviewed saw very little or no impact of the program on their children's socio-emotional skills.

#### *Parents' ratings of concerns on the Strengths and Difficulties Questionnaire (SDQ)*

The SDQ is a validated and norm-referenced assessment of socio-emotional adjustment in children from early childhood through to age 16 (Goodman 1997). It is a reliable instrument which is used nationally in Child and Adolescent Mental Health Services (CAMHS) in Australia and the United Kingdom, and also has been validated in several European countries and the United States. Developed by Goodman (1997), the SDQ is a brief behavioural screening questionnaire designed for children and adolescents aged 4–16 years. The SDQ consists of 25 items designed to assess children's emotional wellbeing and social behaviour. There are five subscales with five items in each:

##### Emotional symptoms

- has often complained of headaches, stomach aches or sickness
- has often seemed worried
- has often been unhappy, sad or tearful
- has been nervous or clingy in new situations, easily lost confidence
- has been fearful, easily scared

##### Conduct problems

- has often had temper tantrums
- has usually done what adults told him/her to do
- has been in fights with other children or has bullied them
- has often lied or cheated
- has stolen from home, school or elsewhere

##### Hyperactivity/inattention

- has been restless, overactive, cannot stay still for long
- has constantly been fidgeting or squirming
- has been easily distracted or had poor concentration
- has been able to stop and think things over before acting
- has had good attention and finished the things he/she starts

Peer problems

- has tended to play by him/her self
- has had at least one good friend
- has generally been liked by other children
- has been picked on or bullied by other children
- has been getting on better with adults than with other children

Prosocial behaviour

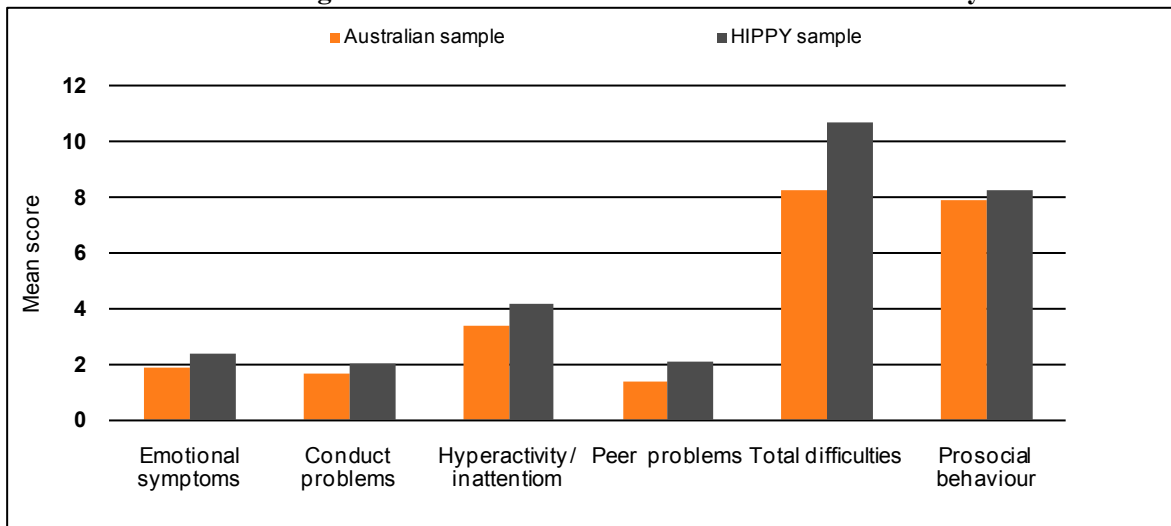
- has been considerate of other people’s feelings
- has readily shared with other children (lollies, toys, pencils, etc.)
- has been helpful if someone is hurt, upset or feeling ill
- has been kind to younger children
- has often volunteered to help others (parents, teachers, other children)

Each item is scored on a three-point scale (where 0 = not true, 1 = somewhat true and 2 = certainly true). Subscale scores are then obtained by summing scores on all relevant items, yielding values in the range 0–10. The SDQ yields a Total Difficulties Score (range 0–40) which is a composite measure incorporating all dimensions *except* the strength-based subscale Prosocial behaviour. Subscale scores are also classified as being within a normal (no needs), borderline (some needs), or abnormal (high needs) range. The SDQ exists in six different versions. In this research, the Parent Report Measure for children aged 4–10 was used.

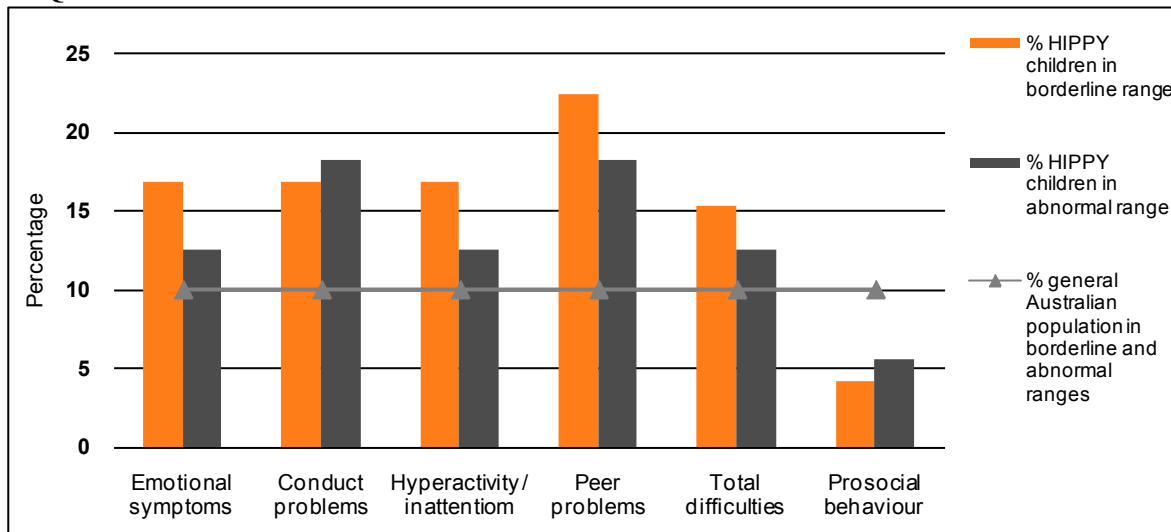
The mean score for total difficulties of the HIPPY sample was 10.73 ( $N = 63$ ;  $SD = 4.68$ ), which is in the normal range. However, the HIPPY sample scored slightly but not significantly worse (higher) than the Australian general population across three out of the four subscales not including Prosocial behaviour (see Figure 4.5).

Some HIPPY parents reported severe or abnormal behavioural problems with their children. Some 18% of scores fell within the abnormal/high needs range for parent report of child conduct disorder and relationship problems with peers. In addition, 13% scored in the abnormal/high needs range with respect to parent report of child hyperactivity/inattention. As shown in Figure 4.6 (below), these results are above the threshold set by Goodman, which is 10% of the population scoring in the ‘abnormal’ range and 10% scoring in the ‘borderline’ range.

**Figure 4.5 Comparison between Australian children aged 4–5 years and HIPPY children’s mean scores on the Strengths and Difficulties subscales at the end of the first year of HIPPY**



**Figure 4.6 HIPPY children at the end of the first year of the program within the borderline and abnormal ranges compared to the general Australian population with respect to the five SDQ subscales**

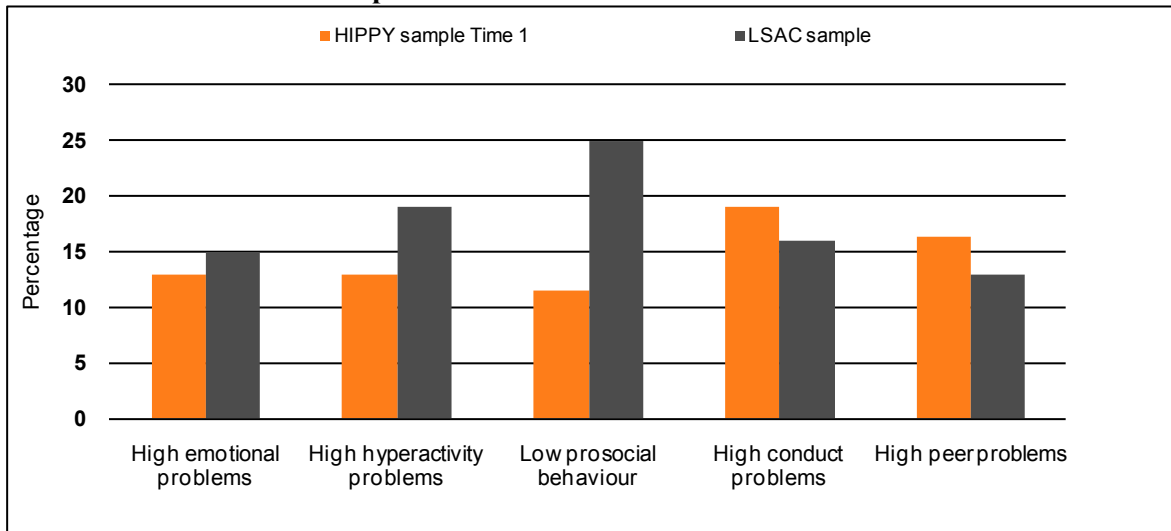


*Social-emotional readiness for school*

Research has shown that children with behaviour problems, such as hyperactivity/inattention, conduct disorder and peer problems, are more likely to demonstrate later academic and social difficulties (Hinshaw 1992; Sanson et al. 1991). To assess HIPPY children’s social-emotional readiness for school, we applied the same method as that used by Smart et al. (2008) with the Longitudinal Study of Australian Children (LSAC). HIPPY children whose scores were in the highest quintile of the sample distributions on the behaviour problem subscales (excluding Prosocial behaviour) were classified as showing low readiness for school. With regard to Prosocial behaviour, scores in the lowest quintile were used to identify children who were not ready for school (Smart et al. 2008).

As Figure 4.7 (below) shows, the HIPPY group of children classified as ‘not ready for school’ at the end of the first year of the program were, however, doing better than the LSAC comparison group on three out of the five social-emotional subscales. Fewer HIPPY children were assessed as having high levels of emotional problems and hyperactivity, and low levels of prosocial behaviour. Even though we cannot directly link this result to HIPPY children’s participation in the program (data on the SDQ was collected only at the end of the first year of the program), we can hypothesise that HIPPY might have helped in achieving this better-than-average result if we accept research findings (Patterson et al. 1990; Hanson et al. 1997) which show that children from disadvantaged backgrounds on average score worse than their more advantaged peers on levels of social-emotional adjustment.

**Figure 4.7 Percentage of HIPPY ‘not ready for school’ children classified as having low social-emotional skills as compared to LSAC children**



### Parents’ reports on their children’s literacy and numeracy skills

To assess literacy and numeracy skills, parents were asked at baseline and time 1 to evaluate their child on some specific skills such as ability to recognise alphabet letters, write their own name, and read simple and/or complex words. Although some teachers do not regard some of the skills reported here as necessary to start school, it has been established that children who acquire these skills before entering school are more likely to have higher levels of school achievement. Researchers such as Snow et al. (1998) and Tymms (1999) have demonstrated that recognition of letters is strongly related to subsequent achievement in reading. The importance of early writing and reading skills as predictors of later school achievement has also been demonstrated. Research has shown that children who lag behind in reading skills development are those who were not exposed or less exposed earlier in life to print material, and opportunities to practise reading and writing. These children are also more likely to develop a negative attitude towards reading and school (Phillips 2005).

Baseline data analysis shows that children included in the sample had some emergent literacy skills. Some 35% were reported to be able to recognise already either all or most of the alphabet letters, and 37% could write their name (even if some letters were sometimes reversed). Even though a very small proportion of the children were reported to be able to read storybooks (2%), more than 75% of them were reported to be pretending to read, suggesting their interest in learning. At baseline, HIPPY children’s ability to read simple words was very low, with only 12% reported to be able to read a word like ‘dog’ or ‘cat’. Only 2% were able to read complex words like ‘table’ or ‘orange’, and the same proportion could read a simple sentence like ‘John is big’.

As illustrated in Figure 4.8 (below), we found a substantial improvement in HIPPY children’s pre-literacy skills between baseline and time 1, particularly in children’s ability to write their own name (70% as against 37%), to recognise alphabet letters and to read simple words (40% as against 12%). Furthermore, only 4% were still unable to recognise any of the alphabet letters, compared to 17% at baseline. Despite the fact that the proportion of children who were able to read storybooks at time 1 stayed the same, 10% of the children were able to read some words in storybooks while pretending to read the rest of the words. There was also a small increase in the proportion of children (7%) who were able to read complex words like ‘table’ or ‘orange’, with the same proportion being able to read a simple sentence like ‘John is big’.

Overall, 55% of the parents reported that their child’s pre-reading skills—that is, the child’s ability to recognise sounds of letters, to recognise where the words are on a page, to follow the print in the

right direction, to turn pages—had ‘much’ improved with HIPPY, while 21% reported a ‘little’ improvement and 15% reported no change.

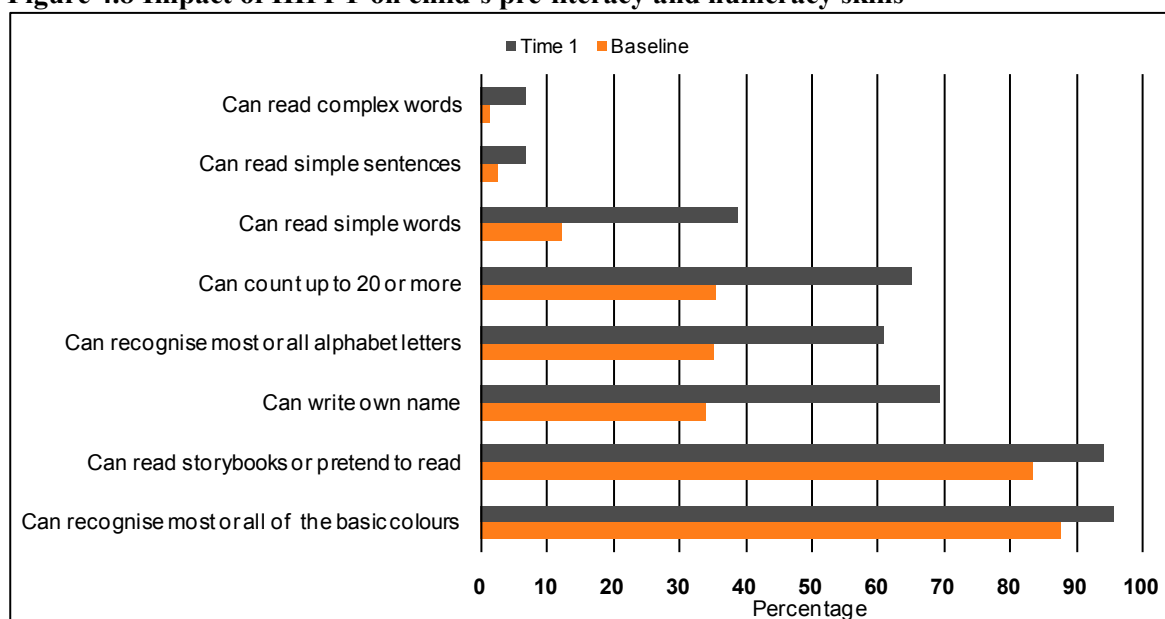
### *Parents’ reports on their children’s numeracy skills*

The concepts of counting and calculating are of fundamental importance to mathematical learning for young children. Research has shown that children who develop emergent numeracy skills—including counting up to 20 and recognising basic numbers or shapes—and who demonstrate some understanding of the mathematical concept of relativeness are more likely to develop strong mathematical skills (Stevenson & Newman 1986; Duncan et al. 2007).

To measure children’s numeracy skills, parents were asked to indicate whether or not their children were able to count, recognise written numbers, and identify basic colours. At the beginning of HIPPY (baseline), according to parent reports, almost half of the sample could count up to 10, and one-third could count up to 20 or more. Children could, on average, recognise some written numbers, but 20 per cent were not able to recognise any written number at all. About three-quarters of the sample could identify all the basic colours.

By the end of the first year of the program (time 1) parents reported that almost two-thirds of the sample was able to count up to 20 or more. There was also a marked improvement in children’s ability to recognise written numbers, increasing from an average of 13 to 33 numbers.

**Figure 4.8 Impact of HIPPY on child’s pre-literacy and numeracy skills**



Notes:

Wilcoxon signed-rank test results: Can read complex words ( $z = -1.897$ ;  $p > .05$ ); Can read simple sentence ( $z = -1.667$ ;  $p > .05$ ); Can read simple words ( $z = -3.766$ ;  $p < .05$ ); Can count up to 20 or more ( $z = -5.057$ ;  $p < .05$ ); Can recognise most or all alphabet letters ( $z = -4.82$ ;  $p < .05$ ); Can write own name ( $z = -4.243$ ;  $p < .05$ ); Can read storybooks or pretend to read ( $z = -1.28$ ;  $p > .1$ ); Can recognise most or all the basic colours ( $z = -2.175$ ;  $p < .05$ ).

### *Parents’ reports on their children’s language skills*

Children’s language skills were assessed by parents’ responses to a series of questions relating to their children’s ability to tell stories and recount events, knowledge of nursery rhymes, ability to listen to stories, ability to join in discussion, and knowledge of animal names.

Table 4.2 (below) shows that the vast majority of HIPPY children were reported to have good language skills. Comparison between baseline and time 1 data show very little change on the language items.

**Table 4.2 Parent's reports on impact of HIPPY on children's language skills**

Language skill type	Baseline		Time 1	
	<i>n</i>	%	<i>n</i>	%
Can tell story and recount events in sequence	54	74	57	78
Knows some nursery rhymes, chants or songs	56	76	62	86
Enjoys listening to stories and joining in the discussion	67	91	64	88
Knows animal names	63	86	70	97

Notes:

Wilcoxon signed-rank test: Can tell story and recount events in sequence ( $z = -0.936$ ;  $p > .1$ ); Knows some nursery rhymes, chants or songs ( $z = -3.215$ ;  $p < .05$ ); Enjoys listening to stories and joining in the discussion ( $z = -2.175$ ;  $p < .05$ ); Knows animal names ( $z = -3.766$ ;  $p < .05$ ).

At time 1, 48% of the parents reported that their child's expressive language—ability to use language and to communicate ideas effectively—was much better than before their involvement in the program. Some 45% reported a little improvement and 7% reported no change.

Close to 50% of parents also reported that the program had a big impact on their child's receptive language skills, or ability to understand, interpret and listen while only 15% of parents reported no change:

*It's sort of little things he will say to us, and we realise he learned it in HIPPY the other day. Things we at first wondered how he knows. He uses comparison language of same and different.*

*He is singing along to the TV; he is remembering words; he is using longer sentences, and you get a conversation out of him now, where before he was just sitting quiet.*

Results from the one-year data suggest that parents' perception of the impacts of HIPPY on their child school readiness was very positive. Parents' responses suggest that being involved in the program not only helps build children's interest in learning and confidence about starting school, but also actually helps them to get ready for school. This in turn boosts parents' confidence in sending their children to school. In every ten parents interviewed, nine perceived HIPPY as having a big impact on their child's attitude toward learning. In addition, more than three-quarters of parents asserted that HIPPY helped a great deal in preparing their children for school. One parent observed that:

*He would be more familiar to what the teacher teaches him because what HIPPY provided to him is the same as what he would learn at prep.*

Along the same lines, another parent stated that:

*With HIPPY activities, he is ready [to start school] because he knows everything for school.*

HIPPY was also shown to give parents confidence in sending their children to school. Three different parents stressed that:

*She can prepare her backpack and she can write her name, alphabet, numbers and read by herself. She is much more confident, and I feel confident to send her to school. With my elder son [who did not do HIPPY] I did not have this confidence. What they do in HIPPY is much closer to what she will be doing at school.*

*I feel confident to send him at school because with HIPPY, he is smarter. He can recognise numbers, letters, and can follow rules.*

*She knows all the alphabet, numbers and reading. I feel confident sending her to school because I feel that she is ready and she is also confident.*

*I feel confident now to send her to school because she knows the basics.*

## Summary

As expected, child age was the single main predictor of school readiness and explained nearly 20% of the variance ( $r^2 = .197$ ;  $p < .001$ ) in the child's school readiness 'Who Am I?' scores. However, other proximal factors at the family level also impact on school readiness. We found the following socio-demographic variables at the proximal level to significantly impact on the parents' assessed level of their children's school readiness: whether the parent reported that their partner lived in the house, whether the parent had completed Year 12 as their highest level of school education, whether the parent had a Health Care Card, and whether the child had participated in preschool or kindergarten as opposed to participation in day care. However, the only proximal factor and variable to be significantly correlated with school readiness as measured by the 'Who Am I?' was whether the parent had completed Year 12 as their highest level of school education. The finding that child age and the proximal socio-demographic characteristics, as mentioned above, are correlated with school readiness is consistent with findings of the LSAC research into school readiness.

Over the program year, HIPPY children showed statistically significant development of their pre-academic skills tested with the 'Who Am I?' tasks. Despite their gain, HIPPY children overall remained below national norms. Yet, some children in the sample (4:7–4:9 years) outperformed the norm groups by over 4.5 points. It is also essential to stress that the gain observed over the year is an important outcome given that HIPPY children started the program year with higher levels of disadvantage than children in the general population.

Findings indicate that, over the program, almost two-thirds of the children involved in HIPPY became ready for school because their scores on the tests used suggested an appropriate level of cognitive and socio-emotional skills. However, as shown in Table 4.3 (below), about one-third of HIPPY children were still experiencing some difficulties with cognitive and/or socio-emotional skills at the end of the first year of the program.

While it is difficult to attribute this improvement in children's pre-learning skills to the program only (because of the age effect or attendance to other preschool programs), responses from parents provide evidence that HIPPY is perceived positively and as having a big impact on their child's readiness for school.

**Table 4.3 Percentage of children with low readiness for school after one year of HIPPY**

School readiness measure	Children with low readiness for school	
	%	<i>n</i>
Who Am I?	36	23
SDQ sub-scales:		
High emotional problems	13	8
High conduct problems	19	12
High hyperactivity problems	13	8
High peer problems	16	10
Low prosocial behaviour	11	7
Both cognitive (Who Am I?) and social-emotional problems (SDQ)	35	22

These findings should nevertheless be examined with some caution, firstly, because of the limitations of the direct assessment tool used. The main issues encountered during the administration of 'Who Am I?' were language problems. The fact that 'Who Am I?' is an English-based assessment tool might have influenced some children's understanding, responses, and scores on the tasks, since some of the children involved in the research were from a CALD background. In

addition, we found that children's responses to the tasks were affected by their mood and their perception/feeling toward the person administering the assessment tasks. Another issue related to the 'Who Am I?' tool was a scoring difficulty. We sometimes found it very hard to classify some responses as they were on the borderline between two different categories. This might have had an influence on scores.

Secondly, some of these findings should be approached with caution because of the single-source nature of the data. The majority of the data on children's socio-emotional skills and school readiness were collected by parent report, and the possibility of either positive or negative response bias should be taken into consideration.

Finally, the lack of a matched non-HIPPY comparison group at this stage of the study means that it is not possible to determine whether changes observed over time in children's readiness for school can be linked with any certainty to their participation in the program.

## 5 Parent–child relationship

The relationship parents build with a child can have a deep influence on the child’s future outcomes and academic achievements. When academic performances are considered, researchers such as Calkins and Hill (2006) have demonstrated that mothers who are sensitive to their child’s individual needs and promote their engagement in problem-solving tasks are more likely to provide a supportive framework for their children as they engage in challenging social and academic tasks. Pinta and Harbers (1996) have found a link between quality of parent–child interaction and achievement in elementary school. In addition, Gregory and Rhimm-Kaufman (2008) found that a positive mother–child interaction in kindergarten was associated with an increased likelihood of high school graduation and a higher grade point average by twelfth grade. Finally, Sroufe et al. (2005) have demonstrated that quality parent–child interaction when the child was 42 months old was a major predictor of education attainment roughly 20 years later.

The HIPPY parents’ interviews included a set of questions about the parent–child relationship. This included items on parent–child interaction in terms of bonding, communication with their child, understanding of their child’s needs, time spent together and involvement in their child’s learning activities.

### Parent’s bond with child

Before their involvement in the program, almost all parents in the sample reported having a good relationship with their child (93%) and feeling close to their child (99%). Despite the reported high quality of the relationship at the beginning of the program, almost three-quarters of parents reported that, after a year, HIPPY had a positive impact on this relationship.

Some parents stated that HIPPY had helped them improve their relationship with their child by giving them the opportunity to set aside time to spend together:

*HIPPY brought us closer together through one-to-one interaction and role-play.*

*Now we feel much closer because we have more time together and even after HIPPY time, we still interact and exchange ideas, discuss about stuff.*

*[HIPPY] makes me make time for him.*

Some of the parents’ explanations for closer relationships suggest that their children viewed them in a different and more respectful light since starting HIPPY. For example, two parents asserted:

*HIPPY has improved my relationship with my son. It hasn’t cast me in a role of a mum. I am a teacher to my son and he knows that I can help him. When we are learning something formal together it improves our learning relationship.*

*I think [with HIPPY] he has realised he can learn things from his parents as well—not just from his carers at day care.*

### Parent’s communication with child

At the beginning of the program, almost all the parents reported they communicated well with their child (95%). After completing one year of the program, more than half the parents witnessed an improvement in their communication with their child. The main reason given for this was that, with HIPPY, they learnt to be more patient with their child. Three parents noted:

*[Before HIPY] I used to be impatient and get angry or cross easily but now HIPY taught me how to start a change.*

*With HIPY I became more patient and I take more time to explain her when she asks questions.*

*[Now it] takes me longer to get angry at rudeness, I am firm instead. I respond instead of reacting.*

Having parents that are more patient positively influences the way children listen to parents, as one parent reported:

*[My son] listens more to me because I have learnt to be patient [through HIPY].*

Some parents felt that the positive impact of HIPY on their communication with their children was due to the fact that they learnt how to express things to young children through the program. One parent observed:

*I'm a lot clearer with him. I get to his level in the way I speak to him. I used to speak to him more like an adult sometimes. And it [HIPY] made me realise that, sometimes, I need to bring the level down.*

Other parents commented that they learnt how to catch their child's attention and to give more explanations to their child when they ask questions. This led to more communication, more respect and more opportunities to express feelings:

*We discuss more [because] now I know how to catch his attention and listening.*

*[Since HIPY] I explain more to her. When she asks questions I take more time to explain and we just talk more.*

*[HIPY has given me] the ability to discuss with her about feelings...It has given me the ability to draw things out of her.*

*[With HIPY] we have a lot more respect from both sides, he's more willing to listen and I'm more willing to give him choices*

Some parents noted that, with HIPY, children listen more to them because they discover their parents in a different role through the program:

*She listens more to me because she knows that we can have fun together.*

## **Understanding children's needs**

At the beginning of the program, almost all the parents considered that they understood their children (93%) and their children's needs (96%). During follow-up, more than three-quarter of parents said they understood their children's needs more since starting HIPY. Parents reported that HIPY had improved their ability to understand and satisfy their children's developmental needs. One parent observed that the program had given her a better overall understanding of her child:

*Now I understand him more and feel that I can help him more to improve.*

Other parents said that HIPY had increased their understanding of child development:

*Now I can see and understand more what is appropriate for his age.*

*[HIPPY gave me a] better understanding of the way kids see things and approach things, which is very different to adults and even older children.*

*HIPPY introduced to me how kids learn.*

Some parents reported that the program had made them more aware of the child's strengths and weaknesses, and how to help them:

*[With HIPPY] I've gained more understanding of my child's development and accepted that there are some things he can't do although other kids can.*

*[HIPPY] made us aware that one of his hands swells up for some unknown reason, which means he can't use it all the time.*

*[With HIPPY] we could see his limitations and realised he wasn't that good; so we'd start simplifying things, shortening our sentences and things so he can understand.*

One parent said she discovered her child through the program:

*We [used to] underestimate his abilities really, because verbally he doesn't put out much, but when you get him to write it down it's revealing.*

Even though most parents were satisfied with their relationships with their children before starting the program, parents' reports at time 1 suggest that, overall, doing HIPPY fosters a positive relationship between parents and their children. This finding is consistent with findings from two international studies on HIPPY. For example, Lombard's (1994) early research into HIPPY found mothers involved in HIPPY displayed more warmth to their children. Also, evaluation of the Turkish Early Enrichment Program, which includes HIPPY as one component, found that those mothers who took part in HIPPY reported having a better relationship with their children (Kagitcibasi 1996).

## **Involvement in children's education**

At the beginning of the program more than three-quarters of parents felt very positive about their involvement in their child's learning and education. About one-quarter reported that they were either not much involved or not involved at all. Among the reasons mentioned for lack of involvement was the lack of ability to engage their child in educational activities, as noted by one parent:

*[I am not involved] because I have no skills or knowledge on how to.*

Another parent explained her lack of involvement because of her lack of time:

*I am too busy with my house and my other son who is going to school and I don't bother doing something for him.*

One other parent did not feel the need to be involved in her child's learning and education because her child was too young or not yet at school; as she noted:

*I am tired and he is not going to school yet so I don't bother doing educational activities with him.*

All the parents who did not feel involved in their child's learning and education at the beginning of the program said they were positively involved after a year in the program. Explaining the process they went through, two parents stated:

*At first it was hard to sit down but it got easier as time went by. Hopefully it becomes habit for life now.*

*With HIPPIY, I do more with him and I found out more about education and can do more.*

We also asked parents if they would feel comfortable talking to their child's teacher or school principal if they thought their child's education needs were not being met. Enhancing parents' involvement in their children's schooling is known to have a positive impact on outcomes for children, and can also be positive for parents in terms of enhancing their social inclusion. Some 93% of parents said they would feel comfortable talking to their child's teacher, while 6% said they might be, and 2% said they would not be comfortable. At the end of the first year in the program, 62% of parents said that HIPPIY had made them feel more comfortable talking to their child's teacher.

## **Summary**

These findings demonstrate that, in addition to increasing parents' awareness about the importance of early learning, HIPPIY helps parents to be actively involved in this learning. By providing fun and structured activities, HIPPIY helps demystify the role of teaching, which in turn enhances parents' confidence in taking up this role and strengthens their ability to contribute to their child education. Furthermore, having this confidence may help parents to more easily deal with the school system, and consequently become more engaged in their child's schooling. The benefit of this engagement can go far beyond the preschool age. As research has shown, parental involvement in child education and school enables students to achieve higher grades, improves school attendance, conduct and attitude, and increases the chances of a child going on to higher education (Henderson & Berla 1994)

## 6 Parent wellbeing and social inclusion

Enhancing parents' wellbeing and social inclusion are secondary goals of HIPPY that have rarely been examined in previous research. However, consistent with an ecological perspective, parental health, wellbeing and community conditions including social inclusion, have been posited as pathways through which stress associated with poverty and low income can affect both parenting style and a child's readiness to learn (Brooks-Gunn & Duncan 2000; Hilferty & Redmond 2009).

HIPPY is expected to enhance parents' wellbeing through a range of mechanisms. Parents learn new ways of teaching their children and have the opportunity to learn a range of other skills by participating in HIPPY. This may in turn enhance their confidence and self-esteem, their capacity to manage their child and the quality of their relationship with their child, and their relationships with other children and family members. Parents' social inclusion is expected to be enhanced because parents often meet and form relationships with other parents and staff in the program, and get involved with other events in their communities through HIPPY. Staff can also provide access to information about other services and activities in their communities, which can be especially valuable when families have only recently moved to an area or where they are at risk of social isolation and exclusion for other reasons.

This section examines the impact of HIPPY on parents' wellbeing and social inclusion using standard measures of these constructs derived from previous research. The impact of HIPPY on parents' wellbeing is examined in the first section. In the second section we examine parents' social inclusion and how it has been affected by HIPPY.

### Parent wellbeing

We assessed the impact of HIPPY on parents' subjective wellbeing using the Personal Well-being Index (PWI), conceived by Cummins and Eckersley (see Cummins et al. 2001; Cummins & Lau 2006). The PWI measures average level of satisfaction across seven aspects of personal life: health, personal relationships, safety, standard of living, achievements, community belonging or connectedness, and future security (Cummins et al. 2001). Each domain is then averaged to produce a summary measure of subjective wellbeing. In previous research, the scale items have been found to form a single tight factor with high construct validity.<sup>8</sup> While this index was designed for use on the general population, Cummins et al. (2001; Cummins & Lau 2006) argue that the scale content is likely to have cross-cultural validity due to the broad, semi-abstract nature of the domains.

We developed the PWI by summing parents' scores on the seven sub-domains and dividing by the number of items, to yield an average score on a scale of 0 to 100.<sup>9</sup> Parents' mean scores on the index were found to be 74.8 ( $SD = 17.3$ ) when they first enrolled in HIPPY and 74.8 ( $SD = 18.3$ ) at the end of their first year in the program ( $N = 57$ ).<sup>10</sup> These means are, notably, identical. They are also almost exactly the same as the mean for a representative Australian sample of adults, which was found to be 74.9 ( $SD = 12.36$ ) by Cummins and Lau (2006).

The fact that we have found no change in parents' reports of life satisfaction over time using the PWI, and find their levels of life satisfaction are the same as those found in a general sample, may be explained by other research which finds that life satisfaction is held relatively constant, and that people adjust their goals and expectations to circumstances in order to stay fairly contented.

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<sup>8</sup> It has been tested in Australia in several studies using representative surveys of adults living in all states and from metropolitan and country areas.

<sup>9</sup> Prior to this, each item was also converted to the standard 0–100% distribution from a 1–10 rating.

<sup>10</sup> Only cases with responses on each item were included. We may want to change this given the large loss of cases.

Cummins et al. (2001) suggest people's responses to questions about life satisfaction normally only change under particularly adverse circumstances.

In addition to the PWI, we included a single item measure of global life satisfaction based on the question: 'How satisfied are you with your life as a whole?' Cummins and Lau (2006) say this is an excellent measure of subjective wellbeing, but is less reliable than multi-item scales. While considered less reliable than the index, parents' responses to this question are easier to interpret. Of the HIPPY parents who were interviewed at the beginning and end of the first year of the program, the majority (80%) said they were either satisfied or very satisfied with their lives as a whole and this did not significantly change between baseline and time 1 assessments. Only five parents reported that they were either very dissatisfied or dissatisfied with their lives at the beginning of the program, and none at the end of their first year.<sup>11</sup> This suggests that HIPPY may have had a positive impact on parents who were least satisfied with their lives.

Parents' mean scores on the single item measure of life satisfaction were also standardised to a 0 to 100 scale so they could be compared to a national estimate. After standardising, parents' mean score on the single item measure at baseline was 78.46 ( $SD = 24.95$ ),<sup>12</sup> which was slightly higher than that found by Cummins et al. (2001) using a random national Australian sample (75.48). Cummins et al. (2001) suggest that a mean above 75 indicates that most parents were fairly satisfied. The mean global life satisfaction score for HIPPY parents at the end of the first year was slightly higher, at 82.31 ( $SD = 19.6$ ), but a dependent means (or paired samples) t-test showed that there is a high likelihood that the observed difference between the means could occur by chance ( $t(64) = -1.182$ ;  $p > .1$ ).

In response to a question about how they felt HIPPY had affected their lives as parents, parents talked about many things, including how HIPPY had enhanced their skills, knowledge and confidence as parents and teachers, their skills in other areas, their relationships with their children and other family members, and their satisfaction with themselves and their lives overall. Consistent with findings outlined in the section on parent-child relationships, many parents said that their understanding of their child's needs had increased since doing HIPPY, as had their understanding of child development generally, and their range of effective strategies for communicating with, guiding and disciplining their child. All of this had the effect of enhancing parent's confidence in themselves and their child's future, and making parenting easier. For a substantial minority of parents who did not initially see it as their role to teach school-related skills (for example, maths, reading), there was also an enhanced awareness of their role as their child's first teacher, which expanded their sense of identity and purpose:

*Teaching your own child. I am not just his mum. I am also teacher and I'm proud of it.*

*Before I was just a mum, now I am a teacher as well. He listens more to me because I am in the position of teacher.*

Enhancing parents' understanding of how schools work also made them more confident talking to their child's teachers and getting involved in activities at their child's school. While research suggests parental involvement in their child's school is not as important as parental involvement in the child's learning at home in promoting school achievement, involvement in the school has been found to have effects on moderating discrepant behaviour in children (Desforges & Abouchaar 2003). Where parents become involved in school this enables a better flow of information from school to home (about child progress, curriculum, courses, school rules and assessments, for

<sup>11</sup> One mother moved from being very dissatisfied at the beginning of the program to neither satisfied or dissatisfied at the end of the first year, one moved from very dissatisfied at the beginning of the program to satisfied at the end of the first year, two mothers moved from dissatisfied to satisfied, and one mother from dissatisfied to very satisfied.

<sup>12</sup> All data were standardised to a 0 to 100 point distribution. Conversion enables comparison with results from a national sample. The values were converted through the use of the formula  $(VAR-1)/(5-1) * 100$ .

example) and might serve to increase participation in the child’s education and learning at home (Desforges & Abouchaar 2003). Parent involvement in their child’s school also allows communication from home to school, for example, about the child’s needs or problems at home, which might allow teachers as well as parents to better support the child.

As well as having a positive impact on outcomes for children, parental involvement in their child’s school can be positive for parents. Involvement in schools might make parents feel more helpful and involved in their child’s life and community, help parents to build ties with other parents as well as teachers, and enhance parents’ sense of social recognition, involvement and social inclusion (Desforges & Abouchaar 2003).

As discussed in the section on parent–child relationships, many parents reported that their relationships with their children had improved as a result of doing HIPPY, because of enhanced communication, time spent with their child, respect from their child and so on. Twenty-nine per cent of parents also said that HIPPY had a positive impact on their relationships with other family members, including their other children and family members outside the household:

*My sister’s over here and her seeing me spend that amount of time with my son has made her look up to me and encouraged her to do it as well.*

*People look at you respect-wise, because they know you’re working towards helping him.*

When asked whether they felt that the way their family appreciates them had changed since doing HIPPY, 24 per cent said they thought it had.

Parents also have the opportunity to gain other skills through HIPPY, including English language skills, time management skills, communication skills and relationship skills. These in turn can enhance parents’ relationships with their children and wellbeing generally, for example, how they cope with life and feel about themselves and their children’s future. Table 6.1 (below) shows the majority of parents said that doing HIPPY had a positive impact on their time management, communication and relationship skills. In addition, 47% of parents said their English language skills had improved since doing HIPPY (11% said their English language skills had improved greatly and 36% said they had improved somewhat). This reflects the high proportion of HIPPY parents for whom English is a second language (although some parents for whom English was a first language also agreed with this question). Many parents for whom English was a second language said that one of the reasons they wanted to do HIPPY was to enhance their child’s English language development. They also found that their own English language skills improved through doing HIPPY.

**Table 6.1 Impact of HIPPY on parent skills**

Parent skill type	Increased a lot	Increased somewhat	No change
	%	%	%
English language skills ( <i>n</i> = 72)	11	36	53
Time management skills ( <i>n</i> = 70)	27	43	30
Communication skills ( <i>n</i> = 69)	28	43	29
Relationship skills ( <i>n</i> = 55)	18	35	47

Note: The categories for English language skills were ‘greatly improved’, ‘improved’ and ‘no change’.

All of these areas of skill development explain why participating in HIPPY can enhance parents’ wellbeing. When asked how HIPPY had affected their lives as parents, a few parents said they simply enjoyed doing HIPPY, while others mentioned that the rewards and benefits of doing HIPPY for themselves and their children made them feel more satisfied with their lives overall:

*Yes, I think I feel content or happy that I've been able to help him begin his learning process.*

*It's helped me in my parenting and I am really enjoying it, it's fun.*

*It makes me feel rewarded to be respected by him and stuff.*

In contrast to these overwhelmingly positive comments, two parents said that doing HIPPY had a negative impact on their life at times because of the additional time pressures:

*It just made it an extra thing to fit in.*

*Sometimes it's hard when I've got to do homework with his brother too.*

In addition, at least 11 parents (15.3%) reported that there had been no significant change in their lives (as parents) as a result of doing HIPPY.

## **Parent social inclusion**

One of the secondary goals of HIPPY is to enhance family involvement in local community activities and promote the social inclusion of otherwise disadvantaged families and children. People are socially included if they are able to participate fully in social and economic life, and have good relationships with family, friends and the wider community (Edwards 2004, p.7). Thus the sub-concepts and indicators attached to the concept of social exclusion focus on access to resources as well as integration across a range of social and economic systems.

We drew on social capital theory as well as social inclusion theory in selecting a framework for measuring social inclusion. While there has been much debate about its precise definition, social capital can be understood as networks of social relations characterised by norms of trust and reciprocity that act as a resource for individuals, families and communities (Edwards 2004; Stone & Hughes 2002). Interest in the concepts of social inclusion and social capital derive from recognition that the social and cultural dimensions of poverty, wellbeing and disadvantage have often been neglected in trying to understand and measure these concepts (Morrison 2008; Stone & Hughes 2002).

Theorists distinguish between three different types of social capital, all of which are seen as essential for an inclusive community. 'Bonding social capital' refers to relationships we have with people like us, in dense or closed networks, such as members of families or ethnic groups. These networks are important for everyday support and help the process of 'getting by' in life. 'Bridging social capital' refers to trust and reciprocity in overlapping, heterogeneous or diverse networks, which is argued to make accessible the resources and opportunities which exist in one network to a member of another and thereby facilitates 'getting ahead' in life. 'Linking social capital' involves social relations with those in authority, which might be used to garner resources or power (Woolcock 2000; Stone & Hughes 2002). An understanding of these different types of social relation is important in understanding the circumstances and mechanisms that reinforce (or alternatively mitigate) social exclusion and disadvantage. Social exclusion may imply an absence of any social connections, or it may imply having strong internal connections but no bridges or links to the rest of the community or to people or institutions with power (Edwards 2004).

The HIPPY parent interviews included an extensive set of questions about social inclusion which aimed to measure its social, cultural and economic elements. This includes items on the extent and quality of parents' informal networks (with friends and family), their sense of community and level of community participation, their access to services and information, and their economic participation. This section examines whether parents report an improved sense of social inclusion on these measures over time.

### Informal social networks

Parents' ties to friends, family and neighbours were assessed using a series of questions derived from the Families, Social Capital and Citizenship survey, the Longitudinal Study of Australian Children (both developed by the Australian Institute of Family Studies), and the Australian Bureau of Statistics Framework for Measuring Social Capital.

The first set of questions covered the frequency of contact parents had with relatives, friends and neighbours. Table 6.2 (below) shows that the vast majority of parents had regular contact with friends, family and neighbours, and that there was little change in the frequency of contact parents had with these people over the first year of the HIPPY program. If anything, we may have expected HIPPY to have had most impact on parents' level of contact with friends or neighbours outside the household, given that parents often meet other parents through the program. However, no change was apparent in their responses to these questions, and statistical tests show there was in fact a small decrease in levels of contact with family between entry into the program (baseline) and the end of the first year (time 1).

**Table 6.2 Frequency of contact with family, friends and neighbours at baseline and time 1 (N = 69)**

Frequency	Family		Friends		Neighbours	
	Baseline %	Time 1 %	Baseline %	Time 1 %	Baseline %	Time 1 %
No contact	1.4	2.9	4.3	7.2	7.2	14.5
Rare, or a few times a year	4.3	5.8	7.2	4.3	20.3	13.0
At least monthly	11.6	15.9	18.8	17.4	13.0	10.1
At least weekly	34.8	39.1	36.2	36.2	30.4	34.8
At least daily	47.8	36.2	33.3	34.8	29.0	27.5
<b>Total</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>100</b>

Notes:

Family ( $z = -2.2$ ;  $p < .05$ ); Friends ( $z = -.127$ ;  $p > .1$ ); Neighbours ( $z = -.174$ ;  $p > .1$ ). Frequency of contact with family was made up of several separate questions on frequency of contact with parents, siblings, in-laws and other relatives.

Similarly, Table 6.3 (below) the following table shows that the vast majority of parents reported strong norms of reciprocity among their networks of family and friends and virtually no change in these over the first year of the program. Almost all parents felt that their close family and friends were willing or very willing to help each other out. Only three per cent suggested that family and friendship networks were less helpful.

**Table 6.3 Perceived reciprocity among informal networks at baseline and time 1**

Families' and friends' willingness to help each other	Baseline	Time 1
	%	%
Very willing	70.1	71.6
Willing	26.9	25.4
Neither unwilling or willing	1.5	1.5
Unwilling	1.5	1.5
<b>Total</b>	<b>100</b>	<b>100</b>

Notes:  $z = -2.2$ ;  $p < .05$

While the above measures of contact and reciprocity with family and friends suggest no change over time, we also asked parents whether they met new people in their community and built a support network through HIPPY, and most said they had. Some 70% of parents said they met new parents and people in their community through HIPPY, and a similar proportion (71.8%) said they had found support this way. Further, 45% felt they had established a support group through HIPPY.

Comments from parents suggest they met other people mainly through group meetings. Some parents noted conversely that they had not built a network through HIPPY because they were unable to attend group meetings, or were too busy, confirming that group meetings are important for the informal network-building objective of HIPPY.

Several parents said they had become good friends with their tutor and/or coordinator, even if they had not met other parents through HIPPY.

Of those who met new people through HIPPY, a couple said they had made some very good friends. Others talked about how they now visit each other and/or organise events outside HIPPY, suggestive of more established networks. A couple of mothers said they knew many of the other parents in their program before they started, because the other parents were friends or neighbours, but doing HIPPY together had strengthened the bond or brought them closer together:

*I've met some of the parents from HIPPY. Most of my friends are doing HIPPY, so HIPPY makes us more connected because we are doing the same things for our kids.*

*I met other parents during group meetings, and I am neighbours with most of them. We develop a bond, good relationship. Before HIPPY I just knew them, but now we feel more close.*

Some parents who had met new people through HIPPY gave specific examples of the benefits they gained. The main benefit mentioned was the opportunity to share with other parents their experiences in raising children. One parent said she really appreciated this because her family was not around:

*We exchange information about child rearing and I am very happy to have this support because my relatives are not here in Australia.*

Other parents talked about how helpful it had been to share information about specific aspects of raising children, such as child behaviour management (for example, how to handle problem behaviours, discipline) and children's diet.

### **Sense of community**

Sense of community has been defined as the level of connection, sense of belonging and support people provide to one another in a community (Dugas & Schweitzer 1997). Parents' sense of community at neighbourhood level was measured using the Sense of Community Index developed by Chavis, Hogge and McMillan (1986), one of the most widely used measures of psychological sense of community (Obst & White 2004). It consists of 12 items to which participants reply 'true' or 'false'. The items are:

- It is important to me to live in my particular neighbourhood.
- I think my neighbourhood is a good place for me to live.
- I expect to live in my neighbourhood for a long period of time.
- I feel at home in my particular neighbourhood.
- Neighbours share the same values.
- Neighbours want the same things from the neighbourhood.
- People get along.
- If there is a problem in my neighbourhood people can get it solved.
- I care what my neighbours think of me.
- I recognise most people.
- Most people know me.

- I have no influence over what my neighbourhood is like.

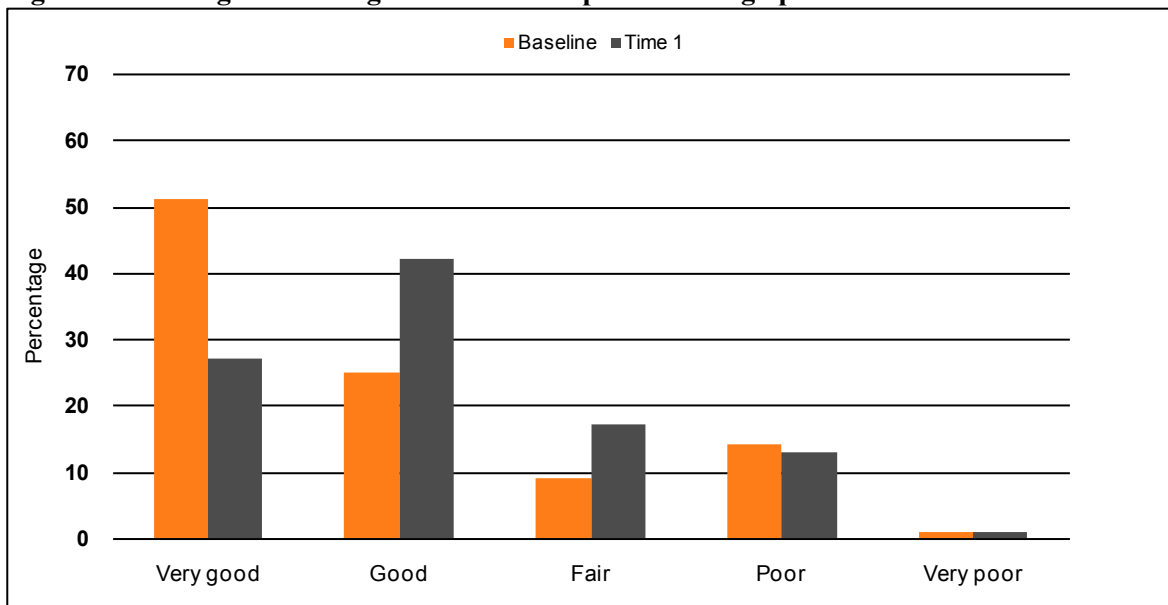
These items are designed to form four subscales or dimensions: membership (a sense of belonging and identification, personal investment, common symbols); influence (a sense that members of the community feel empowered to have an influence over what the group does, and feeling influenced by the group); integration and needs fulfilment (shared values, acknowledged interdependence and willingness to maintain this); and emotional connection (getting along). The twelve items can also be combined to form a single measure. In our analyses, the four subscales were not used because they have been shown in previous research to lack reliability (Obst & White 2004; Forster 2004), and our analyses confirmed this was true for our sample.<sup>13</sup>

A composite measure of Neighbourhood Sense of Community was formed by summing scores, producing a 12-point scale<sup>14</sup>. Comparison of means at the beginning and end of the first year in the program show a fairly high average score on the Sense of Community Index for parents, and very little change over time. The mean score for parents at baseline was 8.28 ( $SD = 2.87$ ) and the mean at time 1 was 8.31 ( $SD = 3.04$ ), and a t-test confirmed there was not a significant difference between these means ( $t(34) = -.051; p > .1$ ).

These results suggest either there has been no change in parents' sense of community over time, or that this measure is not sensitive enough to pick up a change. The latter is plausible given the reliance of this scale on 'true' and 'false' items rather than Likert type scales.

Parents were also asked a couple of questions about their local community in addition to those included in the Chavis et al. (1986) Sense of Community Index, including one question from the Longitudinal Study of Australian Children on whether they think their neighbourhood is a good place to bring up children; and one question from the Families, Social Capital and Citizenship Survey on whether they think people in their neighbourhood are willing to help each other out. Responses to these questions are outlined in the graphs below (Figure 6.1 and Figure 6.2).

**Figure 6.1 Feelings about neighbourhood as a place to bring up children**



<sup>13</sup> A series of Principal Components Analyses and Confirmatory Factor Analyses showed that the 12 items derived from the scale did not fall into the four constructs outlined by Chavis et al. (1986). Four factors were consistently found but items loaded differently on the factors to that suggested by Chavis et al. (1986). In addition, more than half the 12 items were strongly correlated with each other in bivariate analysis and often grouped together on a single factor, suggesting they could form a single composite measure.

<sup>14</sup> After reverse coding some items.

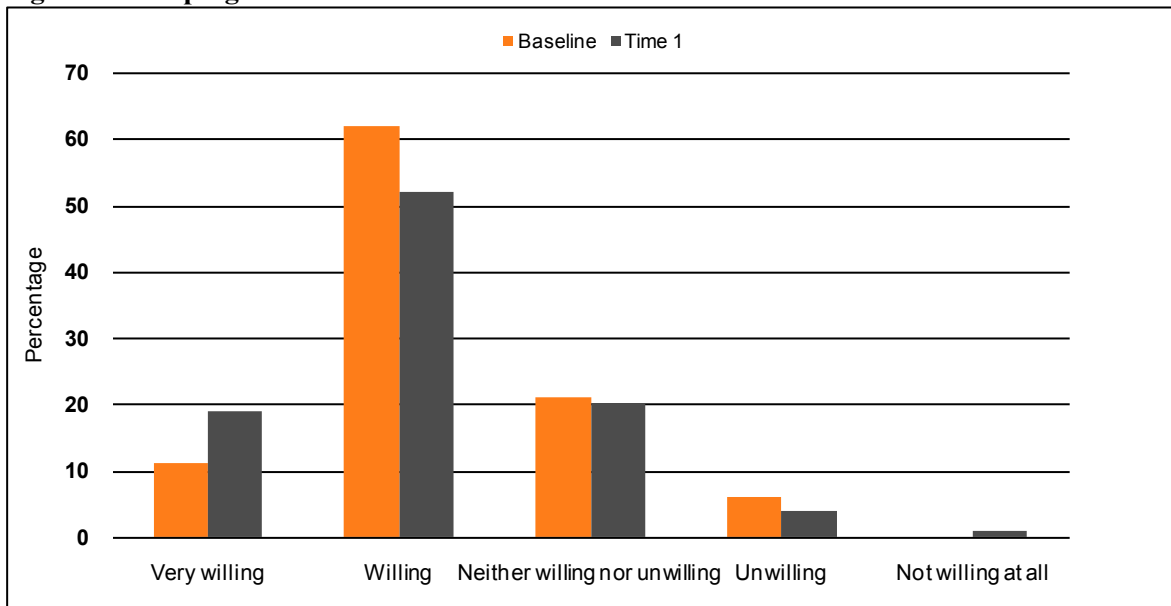
**Figure 6.2 Helping each other out**

Figure 6.1 and Figure 6.2 (above) show that the direction of change in these two measures differs. Between baseline and time 1, parents' perceptions of how suitable their neighbourhood is as a place to bring up children shows a negative shift, with a significantly smaller proportion judging their neighbourhood as a good or very good place to bring up children at the end of the first year in the program (69% compared with 76% at baseline;<sup>15</sup>  $z = -1.94$ ;  $p = .05$ ). In contrast, there was a small positive shift in parents' perceptions of the extent to which community members were willing to help each other out, but the change was not statistically significant ( $z = -.304$ ;  $p > .1$ ).

Figure 6.2 shows that a larger proportion of parents said that community members were 'very willing' to help each other out, and a smaller percentage of parents said that community members were just 'willing' to help each other out. There was no change in the proportion of parents who felt members of their community were unwilling to help each other out (or neither willing or unwilling).

It is difficult to know how to interpret these findings but it may be that after one year in the program parents were more connected to and aware of what was going on in their environment and therefore more ready to report dissatisfaction with their neighbourhood as a place to bring up children, while also having a perception that more people were willing to help each other out. For example, if some parents meet more people in their communities through HIPPY, they may exchange more informal support with other community members, but also become more informed about the lack of public facilities available for children. Parents may also be more willing to judge their neighbourhoods as not up to scratch if their standards and expectations change as a result of their engagement in the program. However, it is difficult to know with any certainty what explains these patterns, and whether there have been any other real or perceived changes in their communities over this time period which might explain them.

### Community participation

When they first entered the program, parents were also asked whether they had been involved in a voluntary capacity in any community groups and organisations in the previous six months and 59%

<sup>15</sup> Only three parents included in this analysis had moved to a different area between baseline and time 1 interviews.

said they had been.<sup>16</sup> The list of types of groups parents were asked about included community/welfare groups; sports/recreation groups; school-related groups; ethnic community groups; arts/cultural/music activities; business/professional associations or unions; church or religious groups; and any others. At the end of their first year in the program, parents were asked whether their involvement in community activities and events had increased or decreased since doing HIPPY, and as shown in Table 6.4 (below), approximately 35% said that their involvement in such activities and events had increased.

**Table 6.4 Parents' involvement in community activities  
(N = 72)**

<b>Involvement in community activities since doing HIPPY</b>	
	<b>%</b>
Increased a lot	11.1
Increased	23.6
Neither increased or decreased	63.9
Decreased	1.4

When parents were asked to provide examples, several reiterated that they had met more people in the community through HIPPY, especially other parents:

*Going to HIPPY and getting together with other parents.*

*I met more people that I didn't know before and we share experiences.*

*With most of the mums in my community who are doing HIPPY we discuss more and meet more.*

*I've met two families from the same country like me that I didn't know before and I feel very connected and close to their families and we see each other all the time.*

Others noted that they found out information about what was going on in their community:

*We can find more about what is on in my community like festivals.*

*Find out more about events and what's going on around.*

One said they had enrolled in a course in the community:

*Starting a course next week, downstairs at the flats, on safety and good parenting.*

One mentioned making work-related contacts:

*Because with HIPPY there's a few things that came up where we all worked together and I made a few work-related contacts.*

Several gave examples of roles they had taken on in community groups or community actions they had been involved in:

*We had units going up in the street and I went door to door to try and stop it.*

Several said they became more involved with their child's school or kindergarten:

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<sup>16</sup> Parents were also asked about their membership of community groups at the end of the program but we were not able to analyse change over time because the questions changed between the beginning and end of their first year of the program.

*It's increased because I've taken on a few more voluntary roles at the school.*

*Well, I've started forming my own playgroup and volunteering, like Jordan's starting school next year and I want to be part of that and HIPPY's given me the confidence to do that.*

*Going to school, helping my daughter with things, getting involved in things, like Australia day picking up rubbish.*

And one mentioned joining a church and getting involved in the programs there:

*Well, I just joined a new church, I go to an alpha program every Tuesday and go to crafts every Wednesday with my neighbour and a mothers group on Friday.*

### Access to services

One way that HIPPY can be expected to enhance parents' social inclusion is by providing them with information about, and facilitating access to, other local services and resources in their communities. The concept of social inclusion implies that formal structures, institutions and informal relationships work to remove barriers to participation that might be experienced by some individuals (Edwards 2004). If parents lack knowledge and information about local affairs and services, this is one barrier which might prevent their full participation in society, and that of their children. This might be especially pertinent for families who have recently moved to the country or local area.

When parents first entered the program they were asked how much they agreed with two statements about their knowledge of local affairs and services. The first asked whether parents were well informed about local affairs, and the second asked parents whether, if they needed information about services, they would know where to find it. As outlined in Table 6.5 (below), approximately 66% of parents said they were well informed about local affairs (they either agreed or strongly agreed with this statement), with 11% neither agreeing nor disagreeing with this statement, and 23% of parents disagreeing with this statement. A higher proportion of parents (approximately 84%) said that if they needed information about services they would know where to find it. However 11% disagreed with this statement. Thus a substantial minority of parents suggested they were not well informed about local affairs and services when they started the program.

**Table 6.5 How well informed did parents feel about local affairs and services in their community at baseline?**

Parent response	Well informed about local affairs? (n = 70)	Know where to find information? (n = 72)
	%	%
Strongly agree	23	49
Agree	43	35
Neither agree nor disagree	11	6
Disagree	23	11
<b>Total</b>	<b>100</b>	<b>100</b>

At the end of their first year in the program, parents were asked whether they thought HIPPY had helped them find out about other services that might help their child or family, and whether they had ever asked their home tutor or coordinator for help or advice about other aspects of their lives outside HIPPY, including how to connect with services (for example, housing, financial assistance, health). As outlined in Table 6.6 (below), approximately half said that HIPPY helped them to find out about other services, and 29 per cent of parents said they had asked their tutor or coordinator for advice about areas or issues outside of HIPPY.

**Table 6.6 Did HIPPY facilitate access to information and services?**

Parent response	Helped you find out about other services? ( <i>n</i> = 70)	Asked home tutor or coordinator for other advice? ( <i>n</i> = 72)
	%	%
Yes	51	29
Somewhat	17	
No	31	71
<b>Total</b>	<b>100</b>	<b>100</b>

The kinds of things parents asked their tutors and coordinators for advice about included information about schools, holiday programs and out-of-school programs; tutoring, swimming lessons and computer lessons (6 or 7 parents); details about free recreational activities for children in their areas (1 mother), children's health and dietary issues (2 parents), sleeping and behavioural problems (1 mother mentioned this); housing (1 mother); support (for example, counselling) for family relationship problems (2 parents), and information about Centrelink (1 mother). Parents said tutors and coordinators provided information and advice about these issues and services, and passed on pamphlets and contact numbers.

### Economic participation—employment and education

Information was also collected on parents' education and employment experiences and plans, and whether they were influenced by HIPPY. Improving the education of parents is not a specific aim of the program but, through HIPPY, parents are offered many learning experiences and are exposed to many opportunities that may enhance their skills and readiness for employment and, therefore, their economic and social inclusion.

Table 6.7 (below) shows the education level of parents at baseline. The table shows that 11% had a university degree. The majority (65%) had some kind of vocational certificate or diploma: half of these had completed Year 12 prior to undertaking this vocational training or diploma, and half had not completed Year 12. Some 9% had completed Year 12 only and 14% had less than Year 12 education and no further training.

**Table 6.7 Parents' highest level of education**

Education level	<i>n</i>	%
Did not go to school	2	3
Year 8 or Year 9	2	3
Year 10	3	4
Year 11	3	4
Year 12	6	9
Vocational certificate or diploma	22	31
Year 12 and vocational certificate or diploma	24	34
University degree	8	11
<b>Total</b>	<b>70</b>	<b>100</b>

At the end of their first year in the program, parents were asked whether they had become interested in continuing their own education since doing HIPPY. More than half had either enrolled in further education or were thinking about it (19% of parents had enrolled in a course or training, and a further 37% said they had thought about undertaking further studies). A substantial number had enrolled in or were considering studies in child care, early childhood education or services (at least 10); and a number had enrolled in an English language course or decided they wanted to improve their language skills (at least 6). For example, one mother said that doing HIPPY made her realise she needed to improve her English, and another said she wanted to improve her English because she was reading to her son and wanted to get better at that.

Other courses of study that parents had enrolled in or were considering were in the areas of nursing or aged care, community services, social work and land conservation. Not all attributed their

motivation to study to the HIPPY program, but a few said HIPPY had made them consider pursuing work in specific areas such as child care or education, and others said they had learnt a lot from HIPPY and that this experience would help them get back into their studies.

There were 67 parents interviewed at baseline and time 1 for whom we have employment data. At baseline, approximately 25% were in some kind of work and 75% were not working or not looking for work. Of those working, three were working full time, nine were working part time, and three were working casually. One mother was on maternity leave and two were studying.

At the end of the first year in the program, a larger proportion of mothers were in paid work—an increase from 25% to 33%. Of those working, five were working full-time, 13 were working part-time and four were working casually<sup>17</sup>. All parents, whether or not they were working, were asked whether their experience of HIPPY had influenced their decision to work or the kind of job they were seeking, and approximately 27% said that it had. A couple of parents said it had been influential because they were going to become HIPPY home tutors. A few other parents had decided they might pursue work with children or in child care:

*I would like to work in child care.*

*I may be interested in working with children.*

*I really like helping out in classrooms and that sort of thing so it helps me understand how things work and that kind of thing.*

A couple of parents talked about the skills they had learned in helping people and had become interested in working in other care-providing industries:

*Helping people and stuff like that, I'm thinking of doing massage and we did a thing on child massage in HIPPY.*

A couple of parents said their opportunities or work-related contacts had increased through HIPPY:

*I wouldn't have the opportunities I've got if I hadn't done HIPPY.*

*Because with HIPPY there's a few things that came up where we all worked together and I made a few work-related contacts.*

Some 48% of parents said HIPPY had no influence on their decision to work or the type of work they were seeking, and 25% reiterated they were not looking for a job or thinking about working.

## Summary

These analyses of the wellbeing and social inclusion of parents and how it has changed during the first year of the program show somewhat diverging findings, depending on the questions used. Most HIPPY parents reported consistently high levels of wellbeing, and high levels of informal contact and support within informal their networks of friends and family, and this remained constant over time. However, parents' responses to more focused, qualitative questions show many parents have built new networks through HIPPY and these networks are perceived by parents to have been an important source of support, information and advice. In addition, one-third of parents reported increased engagement in their communities since doing HIPPY, including in festivals and events held locally, and in voluntary activities in their local communities, such as holding playgroups and getting involved in their children's school. The fact that we found no change over time using standardised

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<sup>17</sup> Parents were also asked at time 1 whether they had started a new job since doing HIPPY, and approximately 17% said they had. This would include parents changing jobs as well as parents moving from no work into paid work.

measures is likely to be explained by the lack of sensitivity of these measures, especially those aiming to measure broad constructs like sense of community, and the fact that some of these constructs have also been shown by other research to remain stable over time.

These findings clearly show that parents' participation in paid work and study increased during their first year of the program. While it is difficult to attribute these changes to HIPPY (especially as mothers' economic participation often increases as their children get older), responses from parents provide evidence that HIPPY had at least influenced the employment and study plans of some parents, with several parents saying they had been inspired to pursue studies and/or employment in child care, education or other care-related industries.

Interpreting these results in terms of social capital theory, HIPPY can be said to have some impact on 'bonding', 'bridging' and 'linking' types of social capital for parents. HIPPY builds bonding social capital by connecting parents with other parents and families in their communities who provide social support and share information about family and child-rearing practices, helping the process of 'getting by' in everyday life. While informal networks are typically conceptualised as bonding social capital, where these networks are also diverse (made up of people who are not all like oneself), then bridging social capital is also enhanced. The comments of parents also show that in some cases HIPPY enhances bridging and linking social capital outcomes. For example, HIPPY was reported to provide parents with access to information and advice about work, study and welfare-related issues, as well as information about community services, resources and events. HIPPY enhances bridging and linking social capital by providing parents with access to support, advice and information from people outside their pre-existing social networks and from people in positions of relative power, who can provide information and advice about community resources, and help parents 'get ahead' in life.

## 7 Tutor wellbeing and social inclusion

This section examines the impact of HIPYPY on home tutors' wellbeing and social inclusion. The key outcomes of interest include whether HIPYPY improves tutors' confidence, wellbeing and attachment to community, and facilitates employment outcomes and the building of community leadership skills.

Interviews with tutors included questions about the effect of HIPYPY on their lives, especially in terms of gaining work and education skills, and about their self-esteem, social inclusion and social capital, as well as some demographic information about themselves. The responses of 34 tutors were analysed for this report. Almost all had previously completed HIPYPY with one of their own children (20), or were currently doing the program with one of their own children (8).

Responses indicate that tutors perceive HIPYPY helped them develop job skills and that the skills they have learnt working at HIPYPY will be useful when they apply for other work. Many had either enrolled in further education because of HIPYPY or were thinking about it, mostly in early childhood education and childcare courses or community services and development.

Tutors' self-reported wellbeing was slightly higher than that found in a normal population, and most said that doing HIPYPY had a positive impact on their lives, especially in relation to building relationships and support networks, and enhancing their engagement in and sense of inclusion in their communities.

### About the tutors

All 34 tutors who participated in this research are women, as are all home tutors currently employed in Australia. Their ages ranged from 20 years to 50 years, with a mean of 35 years ( $SD = 6$ ). The majority of tutors (59%) were born in Australia, and speak English as their first language (62%). One was born in Scotland, also speaking English as her first language. Five tutors were born in Somalia, speaking Somali as their first language, and an additional tutor was born in Australia but also spoke Somali as her first language. Two tutors were born in Vietnam, speaking Vietnamese as their first language. A range of other countries of birth (Sudan, Eritrea, Lebanon, Morocco, Iraq, Pakistan) and languages (Dinka, Arabic, Chaldean and Urdu) were represented. Four tutors identified as Aboriginal or Torres Strait Islander.

Tutors' educational attainments and household incomes varied. Just over half (19) had completed Year 12 (or equivalent), but all except seven had a post-school educational qualification of some kind (5 had completed a university degree and 22 had completed a vocational certificate or diploma). Some 20 (59%) of the tutors lived in households where wages or salary earned by them or a partner was the main source of household income (rather than government benefits). However, 19 qualified for a Health Care Card, indicating low income. Of the 25 tutors who gave us their household income range, the mode was \$800 to \$1499 per week, and the median was \$500 to \$599 per week. Incomes ranged from a minimum income range (\$1 to \$299 per week) to a maximum income range (\$1500 or more per week).

We compared tutors' education levels and household incomes to the education levels and incomes of mothers of 4 to 5-year-olds in the Longitudinal Study of Australian Children (LSAC)<sup>18</sup>. The proportion of tutors who had completed Year 12 was slightly lower than the proportion of LSAC mothers who completed Year 12. However, reported household incomes of HIPYPY home tutors appeared much lower than those reported by LSAC mothers. Only a little over 29% of the LSAC

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<sup>18</sup> LSAC provides a nationally representative sample of parents (mostly mothers) of 4-year-old children. We made comparisons to this sample because HIPYPY tutors all have children who are either currently participating in HIPYPY or who have recently participated in HIPYPY, indicating that they have children of roughly the same age or slightly older.

mothers reported combined household incomes of less than \$800 per week, compared with 59% of HIPPY home tutors. Conversely, only 10% of HIPPY home tutors had incomes in the top income category of \$1500 or more per week, compared with almost 34% of LSAC mothers. Similar proportions had incomes in the \$800 to \$1499 income range (31% of tutors compared to 37% of LSAC families). Clearly, HIPPY home tutors' income is skewed towards lower levels as compared to the LSAC sample of mothers with 4 to 5-year-old children.

## Tutor wellbeing

Tutors' subjective wellbeing was assessed in the same way as for parents, using the Personal Well-being Index (PWI) conceived by Cummins and Eckersley (2001; Cummins & Lau 2006), and a single measure of satisfaction with life as a whole.

Findings indicate higher than average feelings of personal wellbeing among HIPPY home tutors. The mean score for tutors on the Personal Well-being Index was 79.3 ( $SD = 14.9$ ),<sup>19</sup> which is higher than the mean (74.9,  $SD = 12.36$ ) for a representative sample of Australian adults (Cummins & Lau 2006), and higher than for HIPPY parents.

The mean global life satisfaction score for HIPPY tutors was 93.4 ( $SD = 12.8$ ),<sup>20</sup> which was substantially higher than that found using a random national Australian sample (75.5) (Cummins et al. 2001). In response to the question 'How satisfied are you with your life as a whole?', 26 tutors said they were very satisfied, 7 tutors said they were satisfied, and only 1 tutor reported less positive feelings, saying they were neither satisfied or dissatisfied. These findings indicate that tutors are very satisfied with their lives generally.

Home tutors were also asked to tell us in what ways they thought working as a home tutor had affected their lives. Three tutors did not respond to this question and one tutor said there was no change. The remaining tutors reported positive changes in their lives as a result of working as a home tutor. Several tutors reported improvements in their relationships with their own family (8) or other families (3):

*It made me more tolerant with my children.*

*It brought me closer to my children.*

*I feel more confident, built a relationship with my daughter and learnt to be happy with other kids.*

Other tutors said that being a HIPPY home tutor had a positive impact on their social lives (4) and/or involvement in their communities (3):

*I made more friends and have good relationships with other families.*

*I socialise more, I go out more and am more confident about asking for information when I need it, and am more confident with other people.*

*Before HIPPY I was a stay-at-home mum, but now, I go out and help other kids.*

Several tutors (5) said the interpersonal skills they had gained through HIPPY, like flexibility, patience, understanding, and awareness of issues and of other people's problems, had contributed to improvements in their lives and relationships:

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<sup>19</sup> Only cases with responses on each item were included. This includes 32 of the 34 tutors interviewed.

<sup>20</sup> All data were standardised to a 0 to 100 point distribution. Conversion enables comparison with results from a national sample. The values were converted through the use of the formula  $(VAR-1)/(5-1) * 100$ .

*I have become more patient. I have learnt a lot through the family I am visiting. I have learnt to be more flexible and to have new priorities for my kids.*

*HIPPY made me aware of many things: people's problems, their needs, and made me feel happy and wanting to help them.*

Other tutors (5) said that being a HIPPY tutor had changed their lives because it got them back into the workforce and a couple said HIPPY was important because it was a job that allowed them to balance work and family responsibilities:

*I have started working again and able to manage family and work.*

*Re-enter the workforce and accommodate my role as a parent.*

Other tutors said HIPPY had enhanced their employment prospects or made them more job-ready, for example, by improving their organisational skills and professionalism:

*I am more organised, I am planning my life.*

*Makes me feel more professional, more organised and very busy.*

Many said that being a HIPPY tutor had a positive impact on other aspects of their lives that would enhance wellbeing, for example, their sense of independence (4), confidence (4), self-esteem (2), sense of purpose or happiness in life (3). Many tutors mentioned more than one of these changes as a result of working on the HIPPY program:

*I got involved and help people. I am very happy and now for me it is easy to get another job. I can do something now by myself and I don't depend on my husband anymore. I can send money to my family. HIPPY is very important for me because I don't get Centrelink. I am very proud of myself.*

*It has changed me a lot, I met so many people, it was my first job, I feel confident about myself.*

*Help you to learn how to juggle. Gives you the sense of purpose you are self-sufficient, don't need to be on parent pension, and it is good for your self-esteem.*

*I am happy when I see the happiness on HIPPY children's faces.*

To further explore the impact of HIPPY on tutors' sense of financial independence, tutors were asked an additional question about whether they felt more independent financially compared to their experience prior to being a HIPPY tutor. Some 23 tutors (70%) said they felt more financially independent, and 10 tutors said they did not (30%):

*Earning my own [income,] I feel more independent and contribute more in paying bills.*

Tutors reiterated that it made them feel good about themselves to earn their own money:

*I am happy to earn my own money, I feel more independent financially.*

*It makes me feel good to have my own income.*

Others talked about being able to plan their lives and manage their lives better because they had more money or regular money coming in:

*Having a job that I know is going to last. I manage better my money and don't have to live week to week.*

Others said they had a better standard of living because they had more money coming in:

*Have more luxuries, the kids can do more activities and we can save a little bit.*

*More money is coming means more able to pay bills.*

One parent mentioned being able to afford more things for the family and more things for themselves specifically:

*The money I earn from HIPPY helps to pay for my kid's after school activities and my hobbies.*

In sum, the HIPPY home tutors interviewed for this evaluation report above average levels of wellbeing, and the vast majority say that being a HIPPY home tutor has had a positive effect on their lives, and ultimately their wellbeing. The types of positive impacts related to improved relationships, social connections and community involvements; improved financial and employment prospects; enhanced skills, and increased sense of independence, self-confidence and self-esteem.

## Tutor social inclusion

The HIPPY tutor interviews included an extensive set of questions about tutors' social inclusion; the extent and quality of their informal social networks (with friends and family); their connections to their local communities and sense of community cohesion; and their community and economic involvement. These domains were measured in the same way as for HIPPY parents, except there was more emphasis in the tutor interviews on economic participation. Tutors were asked extensive questions about the impact of HIPPY on their economic participation and capacity for economic participation (their employment skills) and prospects, given this is one of the main objectives of the program in relation to the employment of tutors.

### Informal social networks

Tutors' social ties to friends, family and neighbours were assessed using the same questions used with HIPPY parents. A first set of questions covered the frequency of contact tutors had with relatives, friends and neighbours. Table 7.1 (below) shows that the vast majority of tutors had regular contact with friends, family and neighbours.

**Table 7.1 Frequency of tutor contact with family, friends and neighbours**

Frequency of contact	Family (n = 34)	Friends (n = 34)	Neighbours (n = 33)
	%	%	%
No contact		2.9	3.0
Rare, or a few times a year		5.9	15.2
At least monthly	5.9	14.7	9.1
At least weekly	58.8	41.2	39.4
At least daily	35.3	35.3	33.3
<b>Total</b>	<b>100</b>	<b>100</b>	<b>100</b>

Notes: Frequency of contact with family was made up of several separate questions on frequency of contact with parents, siblings, in-laws and other relatives.

The vast majority of tutors also reported strong norms of reciprocity among their networks of family and friends. All but one tutor felt their family and friends were very willing (75.8%) or willing (21.2%) to help each other out. Only one tutor felt her family and friends were not that helpful.

Tutors were also asked whether they built a support network through HIPPY (i.e. a group of friends or people who are available when needed) and 82% said they had. If tutors had a support group, they were asked how good it was, and 95% said it was either good (32%) or excellent (63%).

Tutors were also asked about their relationship with the other home tutors, and the vast majority said it was excellent (59%) or good (38%). Comments suggest they have good working relationships, sharing information about work, for example:

*We share information and help each other for work.*

*We enjoy working together, share experiences about children, cooking and culture.*

*We share our problems and seek for advice from each other.*

Some 58 per cent of tutors said they socialised with other home tutors outside of work. A few of their comments suggest a personal relationship that extends outside of work-related matters:

*We talk, share our experiences, we help, advise each other about our personal life and this is important for me to have someone to talk to.*

Tutors were also asked about their relationship with HIPPY parents, and they all classified it as either excellent (60%) or good (40%). Reflecting on this, tutors talked about good communication between parents and tutors, and mutual respect and sharing of knowledge between parents and tutors, and about building strong relationships and friendships with parents:

*We send messages to each other and all of them are my friends.*

*My support group has grown since HIPPY. With HIPPY families, we get on well and they trust me and their houses are opened and they share their life.*

*I have developed an enormous respect for families and appreciate being in their life.*

*We get on really well and have fun.*

### **Sense of community**

Tutors' sense of community at the neighbourhood level was measured in the same way as for HIPPY parents, using the 12-item Sense of Community Index developed by Chavis et al. (1986). Tutors' scores on this index were high overall, with a mean of 9 and a mode of 11 (out of 12). This was again slightly higher than for HIPPY parents (who reported a mean of 8.28 at baseline and 8.31 at time 1).

Like parents, tutors were asked a couple of questions about their local community in addition to those included in the Chavis et al. (1986) Sense of Community index, including one question on whether they think their neighbourhood is a good place to bring up children, and one on whether they think people in their neighbourhood are willing to help each other out. Responses to these questions are outlined in Table 7.2 (below).

**Table 7.2 Tutor perceptions of neighbourhood norms**

Perception of neighbourhood	Percentage (N = 33)
<i>My neighbourhood is a good place to bring up children?</i>	
Very good	51.5
Good	36.4
Fair	12.1
<b>Total</b>	<b>100</b>
<i>People in this neighbourhood are willing to help each other out</i>	
Very willing	15.2
Willing	57.6
Neither willing or unwilling	24.2
Unwilling	3.0
<b>Total</b>	<b>100</b>

The above responses show the majority of tutors felt their neighbourhoods were a good or very good place to bring up children, and that there were strong norms of reciprocity within their local community.

### Community participation

Tutors were also asked whether they had been involved in any community groups and organisations in the previous six months in a voluntary capacity and 25 of the 33 tutors said that they had been. The most common types of groups were school-related groups (16), and community/welfare groups (13). Between two and eight tutors cited voluntary involvement in all the other types of groups or organisations listed, including sports/recreation groups; ethnic community groups; arts/cultural/music groups; business/professional associations or unions; and church or religious groups.

When asked to describe their level of involvement in community overall, 73 per cent of tutors said they were either involved or very involved in their communities, as outlined in Table 7.3 (below).

**Table 7.3 Tutor involvement in community activities**

Involvement in community activities since doing HIPPY	Percentage (N = 34)
<i>How would you describe your involvement in your community?</i>	
Very involved	35.3
Involved	38.2
Neither involved or uninvolved	20.6
Not very involved	5.9
<b>Total</b>	<b>100</b>

Many gave examples of their community involvement:

*I'm involved in Family Food Patch and Playgroup Tasmania.*

*I'm a chairperson in the neighbourhood. I run craft workshops in the community,  
I'm part of the local fire authority and involved in music for youth.*

*I'm involved with netball, little athletics committees, and a lot of sporting activities.*

*I work in the school as a volunteer.*

Tutors were also asked whether their involvement in community had increased or decreased since doing HIPPY. As show in Table 7.4 (below), 24 tutors said their involvement in community activities and events had increased, and only one tutor said it had decreased.

Several tutors said their involvement in community had increased because they were going to more meetings; joining more groups, especially in relation to schools, parenting and early childhood education; and acting as a contact person and source of information for other people:

*I go more to meetings and I am the contact person for HIPPY in my community.*

*I attend early years meetings and help to create networks.*

*I have joined a Vietnamese mothers group and feel confident to help them. I have also joined homework classes.*

*I talk to everybody about HIPPY. I am more involved in my child's school doing supporting activities.*

*I am involved in the School community.*

Others talked about more diverse forms of community engagement:

*Through my work with HIPPY I got involved in diverse activities such as chamber of commerce, helping people with depression and kinder in my community.*

Several tutors emphasised that they had more confidence now to get involved in their community:

*I feel like I can go volunteer now. Before I was uncomfortable. I know now how valued they are.*

*I work with the school with kids that have learning disabilities, and I have more idea about how to help my community, have more confidence in getting out there for my community.*

Others talked about how being a HIPPY tutor helped them to build their own networks because previously they did not know many people locally:

*I have been living here for eight years and hardly met anyone. But with HIPPY I have meet a lot of people in my community and I am more aware of the activities and services in my community.*

*I participate more in organising school activities at athletics days; I also work at community centre and helped start a community centre volunteer list at school.*

As well as being asked whether their involvement in community had increased or decreased, tutors were also asked whether they felt their role in their community had changed. As shown in Table 7.4 (below), over 74% felt it had.

**Table 7.4 Change over time in tutor involvement in community**

Change in level of involvement	Percentage
<i>Has involvement in community activities increased or decreased since doing HIPPY? (n = 41)</i>	
Increased a lot	35.5
Increased	41.9
Neither increased nor decreased	19.4
Decreased	3.2
<b>Total</b>	<b>100</b>
<i>Has role in community changed since doing HIPPY? (n = 31)</i>	
Yes	74.2
No	25.8
<b>Total</b>	<b>100</b>

Several talked about how people recognised them as a community leader or mentor:

*I help in playgroup, homework group and I am seen as a leader.*

*They see me as a leader and I am more involved with them.*

*I am recognised as a leader and I am more respected.*

*They see me as a community leader, someone that can help them in several ways.*

*People perceive me as a mentor.*

One tutor said she felt like she was recognised as more than just a mother:

*People see me not only like a mum, but someone doing something else. I am well respected.*

Many emphasised how they felt more respected in their community because of their role as tutors:

*Yes, have an important role, and people do look up to you.*

*I am well respected.*

*I am more involved and they respect me more, I have gained a lot more respect because through HIPPY I have them the proof that I was able to do something good.*

### **Access to services**

Another important way that HIPPY can enhance tutors' wellbeing and social inclusion is by providing them with information about, and facilitating access to, other local services and resources in their communities. Tutors were asked whether they had ever asked their home tutor or coordinator for help or advice about other aspects of their lives outside HIPPY. Approximately two-thirds of tutors said they had asked their tutor or coordinator for advice about areas or issues outside of HIPPY. When asked to provide examples of the kinds of things they asked their coordinators about, a couple said 'everything':

*I ask her advice on everything: my life, my children's education. She is like a leader for me. I don't see her as a boost, but as a friend and sister.*

The most common things mentioned included information about career or work plans; time management; child behaviour, development and school-related issues; personal issues; and advice about family relationship problems and issues.

### **Impact of HIPPY on tutor's education and job skills**

According to the Australian Industry Group (2007), there is a mismatch between the skills in demand and the skill level of a large number of job seekers. This gap is likely to be bigger for people living in rural areas, those with low educational levels and migrants. By targeting people who may be viewed as less employable or a poor match for traditional jobs, HIPPY offers the possibility of overcoming this gap through ongoing training and on-the-job experience. Most home tutors interviewed perceive HIPPY as a pathway to a mainstream job or a pathway to re-enter the workforce after an absence in order to have, and raise, children. For example, one home tutor said:

*I live in a rural area with limited opportunities and HIPPY was a good way for me to re-enter to work place.*

A couple said HIPPY helped them get back into work after a break:

*HIPPY offered me the opportunity to get back into the workforce after having a child.*

*I have been out of work for eight years, HIPPY was a good helping stone to get back into work.*

Another tutor said HIPPY was her first job in Australia.

Most tutors believed the skills they developed working at HIPPY would help them gain employment in the future. Some 32 of the home tutors responded to this question: 28 of them (88%) believe the skills they gained through HIPPY will be very useful if they look for other work. The remaining four tutors (12%) believe these skills will be quite useful.

In addition, some home tutors had enrolled in further education because of their experience in HIPPY. Some 13 tutors said they had enrolled in education or training because of HIPPY and 15 said they were thinking about enrolling. The most popular courses were in child care, early childhood education and children's services, and in community services and development. One tutor said:

*I have completed Certificate III and am now doing Certificate IV in community development. If it was not for HIPPY, I wouldn't have thought about it.*

According to a report published by Government Skills Australia (2006), key employability skills include: communication, teamwork, problem solving, initiative and enterprise, planning and organising, self-management and learning. These are all skills a home tutor should have the opportunity to develop. For example, a home tutor can develop communication skills by taking part in meetings, preparing weekly materials to go through with parents, delivering this material to parents in a way which helps them to work through it with their children, and completing the necessary paperwork. Home tutors were asked whether they had gained these skills through working with HIPPY, already had these skills, or had not yet gained them. We collected data to be able to report on five of these dimensions.

### **Communication skills**

Some 19 tutors (61%) out of 31 said they had gained communication skills through the program, while 12 (39%) said they already had these skills.

Given that more than 40% of tutors interviewed were born overseas and 38% spoke English as a second (or later) language, working as a tutor may also be expected to enhance the English language skills of some HIPPY tutors. When tutors were asked to rate their written and spoken English, the vast majority felt that their written and spoken English was either good or very good—only three said their *spoken* English was average, and two said their *written* English was average. However, 12 tutors said that working as a HIPPY home tutor had improved their English (7 said it helped a lot and 5 said it helped a bit).

### **Teamwork skills**

A home tutor has the opportunity to develop teamwork skills by working with the HIPPY staff—the other home tutors and the coordinator—including, for example, working together at group meetings and discussing their work as a team during home tutor meetings. Of those interviewed, about half (15) said this was a skill they had gained working as a home tutor, and about half (15) said they already had it prior to becoming a home tutor. One parent felt she did not have these skills and had not gained them through HIPPY.

### **Problem-solving skills**

Problem solving is also an important aspect of the home tutors' work. In particular, tutors need to discuss problems parents are having with their children and suggest possible ways around these problems. Some 19 tutors (61%) said this was a skill they had gained working at HIPPY, and nine tutors (29%) said they had this skill before starting HIPPY. Three tutors (10%) said they had not gained these skills.

### **Initiative and enterprise**

Home tutors also have the opportunity to develop initiative and enterprise, such as skills in adapting to new situations and taking initiative. Many home tutors are re-entering the workforce after a lengthy absence. Being a home tutor also means entering other people's homes and working in these new surroundings. Some 21 of the home tutors (70%) said they learnt initiative and enterprise skills working at HIPPY, seven (23%) said they had these skills before and two (7%) felt they had not gained these skills.

### **Planning and organisational skills**

Planning and organisation and self-management are other skills home tutors can develop. They need to arrange and keep meetings with families and support the coordinator in organising group meetings. Some 17 tutors (55%) felt they had gained planning and organisation skills at HIPPY, 12 (39%) said they had them before, and two (6%) said they had not gained these skills. Some 16 tutors (52%) felt they had learnt self-management skills from HIPPY, 14 (45%) reported already having this skill, and one tutor said she did not gain these skills.

### **Self-management and learning**

Finally, tutors have the opportunity to develop generic learning skills through HIPPY—that is, the ability to learn in any setting. This occurs both through continually developing their skills in working with parents and through more formal training sessions. Some 18 tutors (58%) felt they had learnt this skill in their work at HIPPY, 12 (39%) said they already had these skills and one tutor said she did not learn these skills through HIPPY.

As well as the aforementioned skills, tutors were asked whether their computer skills had improved since being a HIPPY tutor, and whether there were any other employability skills they felt they had

gained through HIPPY. Nine tutors (29%) said their computer skills had improved, 17 (55%) said they already had these skills and five (16%) said they had not gained these skills from being a HIPPY tutor. When asked what other employability skills they felt they had gained through HIPPY, many mentioned increased understanding of education, child care and child development issues (15 tutors mentioned this). Other skills mentioned included interpersonal skills (3 tutors), how to deal with different kinds of people and different kinds of family issues (3 tutors), community work skills (3 tutors) and writing skills (1 tutor).

Tutors were also asked whether doing HIPPY had enhanced their confidence in themselves and were asked to rate their confidence overall. Almost all (33 of 34) said they were either confident or very confident, and the vast majority (all but four) said that being a HIPPY tutor had increased their self-confidence. Several tutors gave examples, many of which focused on their communication skills and confidence in communication:

*With HIPPY I realised that I could do stuff and become more aware of my skills and abilities.*

*I felt more professional and aware of my skills. They helped me to develop rapport-building skills.*

*Before I could not consider myself going into the work force, but now after my experience with HIPPY I am able to do that, and HIPPY boosted my self-confidence.*

*Before HIPPY I was not able to talk in public, but after HIPPY my mum asked me: 'what happened to my shy little girl?' Now I have a lot of friends and I am very proud of myself.*

*When I was in a group environment I use to be very nervous but not anymore. The group meeting helped me to talk in front of people and now I know what I am talking about.*

*I am more confident to communicate, more diplomatic in my way of communicating.*

*Now I am able to go into situations that are unfamiliar and feel okay.*

*You have to deal with problems, and when you see that you are able to help someone, and empower them, it makes you feel confident.*

*Before I started HIPPY I knew nothing, My English was not good and I would not go out for shopping because I could not speak or ask information. Now with my work I speak English everyday. I am very confident and not shy. I can ask whatever I need.*

*The training and meeting with parents helped me a lot to be confident. I feel confident to engage with people from different cultural backgrounds.*

## **Summary**

Interviews with HIPPY home tutors suggest that their involvement in HIPPY has had a positive impact on their wellbeing and social inclusion, especially in relation to their confidence in themselves, relationships and support networks and level of community engagement. In addition, one strong finding from this evaluation is the positive outcome for home tutors in terms of job

skills and education. Most home tutors said they believed the skills they had developed working at HIPPY would help them gain employment in the future. Most felt that they had gained a series of core job skills. The educational outcomes for home tutors are also very positive. Almost all tutors had either enrolled in further education because of HIPPY, or are considering it. Such outcomes have only been investigated in passing in earlier studies (for examples see Lovejoy & Westheimer 1993 and Burgon et al. 1997). While these findings are very positive for HIPPY, these results should also be read with some caution because of our reliance on a single source for our assessment of outcomes for tutors, and the potential for bias in tutors' reports, given that home tutors are paid. While home tutors' views and opinions are important, future reports will also include evidence from other sources including the views and opinions of HIPPY coordinators.

## 8 Context and implementation

In this section we analyse data collected that relate to the question: ‘To what extent, and in what ways, do contextual factors impact on the design, implementation and outcomes of HIPPY?’ While HIPPY is a structured and manualised intervention, it is delivered by different staff located in different sites and contexts to different groups of people. The study sites vary in setting from high density inner urban communities (Fitzroy and Moonee Valley) to regional (Geelong) and remote (Smithton) communities. Forty-three per cent of families enrolled in HIPPY speak a language other than English as the main language spoken at home and our data show this is not a homogeneous group. Given these different contexts, target populations and administering organisations it is unlikely that HIPPY was implemented in the same way in all sites. Adaptation of the program is therefore likely and even desirable if the standardised version of HIPPY is to have the best possible chance of success at the local level. We want to know how the program has been differentially delivered and taken up. This is often referred to as evaluation of the integrity of the program. This kind of evaluation can help in finding out how a program has been changed and for what reasons and, therefore, what parts of the program appear to be working well, and how program adaptations can impact on the intended outcomes. This information can be useful in further refining and adapting the program for best possible success in the future.

We used the framework developed by Dane and Schneider (1998) to measure program integrity. In addition we asked some open-ended questions of participants to explore reasons why some aspects of the program seem to work better than others. Dane and Schneider (1998) suggest assessing five aspects of program integrity: adherence, exposure, quality of delivery, participant responsiveness and program differentiation. In the following section we analyse responses to each of these aspects separately, and then discuss the creation of an overall index of program integrity before examining how program integrity impacts on outcomes.

It is worth noting, however, the inherent tension that exists between program integrity and adaptation. On the one hand, weaker program effects or poorer outcomes have been associated with poorly implemented programs (Dane & Schneider 1998). It is even possible that effective programs may be incorrectly shown to be ineffective, not due to failure of the program but, rather, failure to implement the program effectively as planned (Drake et al. 2001). On the other hand, programs that do not take account of issues of local relevance and applicability can also fail, particularly as programs are inevitably shaped by those involved in their delivery and take-up (Blakely et al. 1987), and the converse could also be true. We do not immediately jump to the conclusion that low levels of integrity are indicative of program failure. Instead we aim to investigate reasons why certain critical parts of the program appear to be delivered and taken up with various amounts integrity (i.e. as planned) so as to learn ultimately how the program might be designed and reasonably expected to be most effective.

Indeed, a surprising result from our analysis is that program integrity was negatively correlated with change in child school readiness (‘Who Am I?’,  $r = -.37$ ; parent report,  $r = -.27$ ; all  $ps < .05$ ). This would seem to support the notion that flexibility and adaptation of the program may be important elements that can impact positively on HIPPY’s primary outcome of school readiness. However, it may also represent one of the limitations of self-reported assessment and the play of a particular kind of bias known as evaluation apprehension, which relates to the anxiety generated in people by virtue of being tested. This anxiety may lead people to try to give the responses they think are expected by the investigator, rather than their true responses, particularly if their participation in the program has been low, so as to ‘save face’.

### Adherence

Adherence is described by Dane and Schneider (1998) as the extent to which specified program components were delivered as prescribed in the program manual. The specific program components are often also referred to as the core components of the program. In order to identify

the core components of HIPPY we looked at what has been learned from research on positive parenting programs generally over the past 50 years, as well as personal communication with HIPPY Australia on this issue.

In terms of necessary or core components of positive parenting programs generally, Sutton et al. (2004, pp.71–2) have stated that:

- New parenting skills must be actively rehearsed (Bandura 1977; Knapp and Deluty 1989). Approaches such as videotape feedback, role-play and rehearsal are very effective in improving parent behaviours (Webster-Stratton 1998; Hutchings et al. 2002; Hutchings et al. 2004).
- Parenting programmes must teach principles rather than prescribed techniques. When parents learn behavioural principles, they acquire the tools to decide what works best for them and to respond positively and appropriately when new situations arise (McMahon et al. 1981; Hutchings et al. 2004). This also enables them to set and achieve their own goals (Webster-Stratton & Hancock 1998).
- Since parenting practices are involved in both the establishment and maintenance of problematic child behaviour it is essential that parents practise new parenting behaviours at home (Patterson 1982; Webster-Stratton & Hancock 1998).
- Programmes need to include both (non-violent) sanctions for negative behaviour as well as strategies to build positive relationships through play and praise. Work that helps parents to encourage positive behaviour through play and praise, but does not help them to deal with problem behaviour can show early improvements but these positive changes may not be maintained (Wiltz & Patterson 1974; Hobbs et al. 1990).
- Difficulties in the relationships between adults in the family cannot be ignored. For example, Dadds et al. (1987) found that although a behavioural family intervention benefited parents and their children, a 'partner support' programme was needed to achieve sustained improvements in families where the parents had relationship difficulties. *The Incredible Years* 'advanced' course specifically targets adult relationship difficulties (Webster-Stratton 1994).

HIPPY incorporates many of the above features and after direct discussion with HIPPY Australia we have identified the following that can be considered critical or core components of the program:

- tutors are trained and supported (incorporates points 2, 4 and 5 above)
- home visits took place (incorporates points 1 and 3 above)
- role-play was used in home visits and in group meetings (incorporates points 1 and 3 above)
- group meetings took place (incorporates points 2, 4 and 5 above)
- HIPPY parent/care giver did book activities with the child as prescribed (incorporates point 3 above)
- principles learnt are generalised/reinforced at other times and in other settings (incorporates point 2 above).

HIPPY deliberately employs people from the local community to be trained to work as paraprofessionals for the delivery of the program to parents who in turn are expected to do the program with their children. This is one of the unique features of the program designed to strengthen communities and individuals' skill sets. Furthermore, research has shown that parenting programs are most effective when delivered by appropriately trained and qualified staff (Karoly et al. 2005), and that highly qualified home visitors are needed for families with multiple complex issues (Gomby et al. 1999). Holden (2007), who completed a literature review on home visiting research, concludes that in 'less effective home visiting programs, staff receive less training – both pre-service and on-going; these changes have been linked to weaker outcomes' (p.19).

HIPPY Australia provides three-day home tutor training together with the local program coordinator prior to home tutors commencing work with parents. The coordinator provides ongoing training supervision and support for the duration of the program. When tutors were asked ‘What training program have you found useful?’ the most common response was the weekly tutor training with the coordinator (32%). The vast majority of tutors reported being either very satisfied or satisfied with the training (73.6%) and communication and support (70.6%) received from their HIPPY coordinator. This would suggest that tutors received useful and ongoing training and support. However, data were not collected on the number of training and supervision sessions delivered to and attended by home tutors (but this analysis will be included as part of the final two-year evaluation).

The program is designed so that parents receive fortnightly visits from their home tutor for approximately one hour. In this time they go over what the parent is expected to do with their child in the coming week and discuss any issues that may impact on their ability to complete the tasks. Fortnightly group meetings take place in alternate fortnights between home visits. Nearly all tutors (29, or 87.9%) reported that home visits worked either well or very well. Some 57 parents (61.3%) reported that fortnightly home visits were sufficient with six (6.5%) saying that it was too little. However, 10 (or 13.6%) said they were in fact doing HIPPY weekly with their home tutor. From this we can conclude that fortnightly, at least, home visits were being done with a high level of satisfaction reported from both parents and tutors.

One of the prescribed and critical elements of home visits and the program in general, is that of role-play. Role-play helps people practice new skills acquisition in the home with the support of their home tutor. Some 60 parents (84.5%) reported they felt either comfortable or very comfortable doing role-play and only five (6.9%) said they did not do the role-play. Even with parents’ relative high level of reported comfort doing role-play, it does seem that many find role-play challenging. One in five parents said they felt either silly or embarrassed doing role-play, often due to the simplicity of the work. Role-play can involve playing the role of either the child or the parent/tutor and it would seem that feelings of silliness and embarrassment may be more associated with the former. One parent who was comfortable with role-play commented that the tutor discussed the work as if they were both tutors and that role-playing helped her pre-empt her child’s answers.

Data at the individual level on the number of group meetings offered was not used in this wave of the evaluation but will be collected from HIPPY coordinators during the second year of the program. Nonetheless, preliminary discussion with coordinators suggests there is considerable variation in the number of group meetings offered at each site. Even if group meetings were offered we found some resistance among parents toward attending group meetings. When we asked parents ‘How often were you able to attend parents’ group meetings?’ only 25.6 per cent of parents reported they were either always or usually able to attend the parent group meetings. Parents were twice as likely to report that home visits worked well, as compared to the group meetings having worked well.

A considerable number of parents appeared not to deliver all the weekly activities with the HIPPY child as prescribed. Only 59.1% of parents reported they either always or usually completed all the weekly activities with their child before the meeting with the home tutor. However, 80% of tutors reported that parents had completed more than 50% of the required tasks when they visited the parents. In the high density inner urban sites of Moonee Valley and Fitzroy, half the home tutors said that parents had completed more than 50% of the required tasks, and half said they had completed less than 50% of the required tasks. There were two main reasons reported by parents for not always completing the required tasks with their child. Twenty-six parents (36.2%) said they were too busy and found HIPPY difficult to fit in. In only four of these cases the reason for the parent being too busy was because of paid work. The next most common reason, reported by eight people (11.1%), was related to sickness or health issues associated with either the parent or the child. Two people said the reason was that the child did not like doing the activities and one parent

reported on their own low commitment to the program. Half of the parents, however, did not give a reason. Informal discussions with tutors and parents suggest that when parents fall behind, many make up lost time in later weeks.

This finding that parent adherence to the program is impacted upon by a combination of time constraints ('too busy') relative to the amount of HIPPY work that is expected ('difficult to fit it in'), and caring responsibilities—especially during periods of illness—needs particular acknowledgement and attention. In the first instance, as Miriam David (2001) suggests, many strategies that aim to address social exclusion for those living in situations of relative disadvantage focus on often gendered notions of obtaining paid work. Such strategies remain silent to the work and provision of care, which ironically may include an increased expectation and responsibility for increased involvement in their children's early years education:

Thus the strategies have contradictory implications for mothers, who are increasingly expected and enjoined to be involved in their children's education, in increasingly sophisticated ways. At the same time mothers, particularly those at risk of social exclusion are also increasingly expected to be involved in paid employment... This places additional burdens on mothers living in poverty and especially where they have little support and help from partners and family members (David 2001, p.117).

This helps us understand why HIPPY parents may not adhere to the program as designed. Careful consideration needs to be given to this reality as reported by parents in this evaluation, and to the amount being asked of them for what is a fairly intensive program. This finding echoes that of other research which suggests that those with fewer resources and higher levels of stress and personal life challenges are less able to successfully engage with program content than their better-off middle-class counterparts (Wagner et al. 2003).

It is important that principles discussed and taught in HIPPY are understood and applied more generally by the parent. However, there is evidence that the more the former is done the better will be the learning outcomes for the child (Hutchings et al. 2004). We find strong evidence that suggests HIPPY is teaching principles and that parents are applying these principles and what they have learnt in HIPPY to other situations more generally. When we asked parents 'What (if anything) are you doing differently as a parent since you began participating in HIPPY?' nearly one in three reported that they were doing more learning activities together with their child and many gave examples of how they are applying what they have learnt more generally:

*Before HIPPY we just go to the playground. Now we do activities together and more educational activities.*

*Now we don't only watch we do more reading, writing and counting.*

*Pointing out the things that we've learnt at HIPPY.*

*How to apply in real word what we have learnt.*

*You probably use it as a basis to extend knowledge.*

## **Exposure**

While adherence refers to correct delivery of the program and its core components, exposure refers to the extent of take-up of the program. It is often referred to as participant 'dose', that is to say, how much of the program the participants actually did.

While this analysis did not include individual level data on the actual number of training sessions, home visits, group meetings and parent-child sessions completed, much of the information presented above on the delivery of the core components of the program can provide us with a good

indication of the level of dose or exposure. For example, we know that 94 per cent of tutors felt they were well trained to do their work and it appears tutors received useful and ongoing training and support. It is reasonable to suggest, therefore, that with such high levels of satisfaction, tutors did engage and participate at a fairly high level with the training and support offered by the HIPPY coordinators.

Nearly all tutors (87.9%) reported that home visits worked well, and 57 parents (61.3%) reported that the fortnightly home visits were sufficient. Nevertheless, parents were twice as likely to report that home visits worked well as compared to group meetings having worked well. When we asked parents to respond on a five-point Likert scale to the question ‘How often were you able to attend parents’ group meetings?’, only 25.6% of parents reported they were either always or usually able to attend the parent group meetings. This would suggest that for many parents, participation in group meetings was not as high as their participation and engagement in home visits.

Role-play was felt to be difficult, problematic or awkward to do by many parents and reasons for this have been given above. Again we used a five-point Likert response scale and asked parents ‘Were you comfortable role-playing HIPPY activities with your home tutor?’, which we take as a proxy measure for participation in and exposure to role-play. Sixty parents (84.5%) reported they felt either comfortable or very comfortable doing role-play and only five (6.9%) said they did not do the role-play. Thus, although many reported finding role-play a bit ‘weird’, it would appear as if participation in role-play was fairly high and grew as comfort with role-play developed:

*Bit weird—sometimes. Feels a bit strange acting like a child. I find the activities so easy if doesn’t seem necessary.*

*I felt a bit silly though when she’s reading out to me like I’m one of the kids.*

*It’s a bit weird to begin with, but you get used to it.*

*Much more comfortable discussing the work as if we were both tutors. Role-playing encouraged me to pre-empt my child’s answers.*

*It’s easy when you can laugh at yourself—my home tutor and I have no problem with doing that.*

Finally, with a finding that only 59.1% of parents were either always or usually able to complete all the weekly activities with their child before meeting with the home tutor, it is reasonable to suggest that many of the parents did not do HIPPY with their children as prescribed. Reasons for this have been given above along with the consequences in relation to measuring any possible impact of the program.

More detailed and objective data on take-up of the core components of the program would provide a more accurate measure of dose or exposure and this type of data will be used for the final two-year evaluation.

### **Quality of delivery and participant responsiveness**

We suggest that quality of delivery and participant responsiveness interact and are positively correlated. It is reasonable to suggest that high quality delivery begets high levels of participant responsiveness and that the reverse is also true. Quality of delivery of the program is described by Dane and Schneider (1998) as a measure of qualitative aspects of program delivery that are not directly related to the implementation of the prescribed content, such as implementer enthusiasm, leader preparedness, global estimates of session effectiveness, and leader attitudes toward the program. Participant responsiveness is a measure which may include indicators not only of participation but also of enthusiasm.

Thus, in this section we report on data collected that relate to participant's attitudes, enthusiasm and estimates of effectiveness of HIPPY in order to make judgements about quality of program delivery and participant responsiveness. We asked parents and tutors not only about how satisfied they were with the various core components of the program, but also how satisfied they were with their relationship with their home tutor and HIPPY coordinator, respectively, as satisfaction with such relationships is known to impact on quality of program delivery and participant responsiveness (Korfmacher et al. 2007; Raikes et al. 2008).

## Tutors

Overall, there were very high levels of satisfaction among home tutors with their work. Only one tutor reported that they were neither satisfied nor dissatisfied and no tutors reported they were dissatisfied or very dissatisfied. The vast majority of tutors reported being very satisfied or satisfied with both the training (73.6%) and the communication and support (70.6%) received from HIPPY site coordinators. Only two tutors reported having neither a good nor bad relationship with their site coordinator.

When tutors were asked 'What parts of the program did they find difficult?' one in five said they found it difficult overcoming personal feelings and issues associated with working with people in their homes who also may have confronting and complex issues:

*Hard to get out of comfort zone. Going in somebody's house is intimidating.*

*Overcoming my shyness.*

*I found it hard to not take parent issues with me—to stop thinking about that when I finish work.*

*Some of the families can be challenging, e.g. home is dirty, or parent speaks loudly to kids. I learnt not to judge.*

Other concerns reported by home tutors related to the task of engaging parents. Challenges included time constraints, levels of parent enthusiasm, high needs families, role-play and group meetings. The two issues of managing personal responses to working at an intensive level with disadvantaged families, and engaging them, are subjects well covered in professional training of social workers. The two issues are of course interrelated: shyness begets difficulties in engaging with people. However, training can help mitigate personal responses associated with working intensively with disadvantaged families on the issue of engagement. Secondly, it is clear that tutors worked with parents to encourage positive behaviour through play and praise and that this is practised in the home and at group meetings. We were not able to ascertain, however, the extent to which HIPPY explicitly teaches strategies for tutors to assist parents to deal with problem behaviour by the child, or to respond to situations in which it becomes known that there are difficulties in the relationship between the adults in the family. As this is considered a critical element that can impact on the success of parenting programs, we would recommend the teaching of such strategies be made more explicit in HIPPY training for tutors.

All tutors reported having either excellent (59%) or good (38%) relationships with their HIPPY families and regarded the visits as rewarding and positive. No tutors reported having neither a good nor poor, poor, or very poor relationship with their HIPPY parents:

*I am learning from others, too, because of the cultural differences.*

*I have developed an enormous respect for families and appreciate being in their life. I have helped a woman with agoraphobia by taking her to the Lions Club, after that she could go out and attend group meetings.*

As mentioned above, nearly all tutors (29) reported that home visits worked either well or very well (87.9%). Two tutors reported that role-playing was not working well. But twice this number—four tutors—reported that group meetings were not working well with an additional two tutors reporting that group meetings were not working at all well—giving a total 20% of tutors who thought that group meetings were either not working well or not working at all well. While this is not a damning figure in relation to group meetings it does perhaps flag a potential problem with the program if, in fact, group meetings, in particular, and role-play, to a lesser extent, are considered core components of the intervention.

## Parents

We used a five-point Likert response scale to a global question about parent satisfaction with the program. Nearly all parents (97.3%) were either satisfied or very satisfied with HIPPY overall with participants being twice as likely to be very satisfied as satisfied. More detailed indications of satisfaction, enthusiasm and attitudes to the program and its effectiveness are as follows.

The vast majority of parents (72%) felt either comfortable or very comfortable having a home tutor come into their home. However, 5% of parents reported that they did not feel completely comfortable with visits to the home by tutors, plus 23% of parents refused to answer this question—perhaps due to a fear about confidentiality and the potential for disclosure.

Parents' attitudes toward role-play have been described previously in the section on exposure. Sixty parents (84.5%) reported they felt either comfortable or very comfortable doing role-play and only five (6.9%) said they did not do the role-play. While, at first, parents appear hesitant their comfort with role-play seems to change positively over time as they become more familiar with it.

As mentioned above, only 25.6% of parents reported they were either always or usually able to attend the parent group meetings and parents were twice as likely to report that home visits worked well as compared to the group meetings. We asked parents for the main reason they did not always attend group meetings as this could be instructive in developing strategies to address the low levels of participation. The most frequent comment was that 'being too busy' (43%) was the main reason for not attending group meetings. Some 20% of parents suggested that HIPPY could do more to make it easier for parents to attend group meetings. Of the 19 parents who made suggestions, and apart from the one in three who requested simply another day or time, the top three most common requests were for:

- reminder messages (e.g. SMS messages) to be sent (4)
- a better location (4)
- more than one session within the week to be offered (2).

One parent could not see a relevant link between group meetings and the program, stating that instead she puts 'focus into parenting and counselling'. It would seem that this parent did not see the connection between the purpose or work of the group meetings and her role as a parent. However, only one parent reported that the group meetings were not interesting.

Nearly all parents reported that their child either liked or very much liked doing the HIPPY activities (on a 5-point scale). Only five (6.9%) said their child neither liked nor disliked the HIPPY activities and no parents reported their child disliked the activities.

In terms of perceived effectiveness, we asked parents to rate on a five-point Likert scale (where 1 = much better; 5 = much worse) how much they believed HIPPY helped improve their child's pre-reading, reading, language (receptive and expressive) and fine motor skills and emotional development. We found no significant difference in parents' responses to each of these dimensions, except in relation to believed improvement in reading. Most parents (52.5%) believed HIPPY made 'much better' their child's pre-reading, language and fine motor skills and social-emotional

development. In relation to reading, however, most parents (42.5%) believed that their child's reading skills were 'about the same', even though they had done HIPPY. This is perhaps not surprising given that, at the start of the program, children's average age was 4.4 years and, at time 1, they had only completed the first year of the program. Nonetheless, parents appear to have a positive attitude to and strong belief in the effectiveness of HIPPY on their child's early learning and development.

### **Program differentiation**

Dane and Schneider (1998, p.45) define program differentiation as 'a manipulation check that is performed to safeguard against the diffusion of treatments', that is, to ensure that the subjects in each experimental condition received only planned interventions. There are two reasons why we did not perform this check. The first is that the research design at this stage is not comparative or randomised so the matter of diffusion of treatments to two or more experimental groups is not relevant. However, this check will be done as part of a later analysis of the two-year data in which we will make comparisons to a control group derived from the Longitudinal Study of Australian Children. Secondly, diffusion of treatments from other programs, including parents' groups, child care and kindergarten, is actually welcomed as HIPPY is one of a suite of activities that will most likely combine with other programs to achieve an improvement in the child's school readiness, parent-child relationship and the sense of social inclusion and wellbeing.

### **Summary of implementation integrity**

The above analysis provides insights into which core components of HIPPY appear to be delivered with relatively high or low levels of integrity in terms of adherence, exposure, quality of delivery, participant responsiveness and program differentiation. Also given are some explanations and suggestions as to how integrity may be improved for certain aspects of the program. Where suggestions are not explicitly given by parents or tutors, explanations that are provided can be helpful for developing strategies to address issues of program integrity in the future. For example, group meetings appear to be delivered with relatively low levels of integrity with the main reasons being lack of time and perceived value or relevance. Strategies that target these issues explicitly could help. Suggestions made by parents are perhaps more pragmatic and include reminder messages and consideration of the most appropriate location for holding group meetings.

We noted that research has shown a large correlation between home tutor skill and quality of program delivery and impact. Given that HIPPY deliberately works with paraprofessionals, and even though the vast majority of home tutors reported being very satisfied with their training and support from their HIPPY site coordinator, we suggest that attention should be given to the areas in the program that tutors reported finding difficult. This would mean better preparing tutors with respect to working at an intensive level with disadvantaged families, who often face complex and challenging issues (engagement strategies, managing difficult behaviour of the child, and relationship problems between adults in the household) and management of their own personal feelings and responses to home visits and the work. However, we would stop short of recommending the use of professionally trained home visitors such as nurses, counsellors, psychologists or social workers unless they can be recruited from within the same target group as HIPPY parents. Firstly, it is not clear that professional training has any significant impact on the effectiveness of home visiting programs when compared to those that make use of trained and supported paraprofessionals (Nievar & Martinez-Cantu 2009) and, secondly, the employment of highly trained professional home visitors when combined with the socio-demographic and personal characteristics of families involved in targeted home visiting programs such as HIPPY, may have a negative impact on the success of the program (Curtis 1995).

Many parents found role-play a bit 'weird' at the start, but participation in it grew as comfort with role-play developed over time. Main reasons reported for their discomfort focused on feeling 'silly' and that the material was too simple or too easy to warrant such acting out and role-play. Some possible strategies to address this can be gleaned from parents' reasons for their comfort or

discomfort in role-playing. It appears as if the roles taken up within role-play by tutors and parents vary. Choices include taking on the role as the child, the parent or the teacher, in which one option might include the parent and tutor discussing work ‘as if we were both tutors’.

One critical component of the program that appears to be delivered with fairly low levels of integrity is parent completion of the weekly activities with their child. It is obvious that if the program is not being delivered, any change in outcomes cannot be attributed to HIPPY itself, but rather to some other factor, and the converse is also true. The finding that parent adherence to the program is impacted upon by a combination of time constraints (‘too busy’) relative to the amount of HIPPY work that is expected (‘difficult to fit it in’), and caring responsibilities—especially during periods of illness, needs particular acknowledgement and attention. Careful consideration needs to be given to this reality as reported by HIPPY parents in this evaluation, and to the amount being asked of them in what is a fairly intensive program. Engagement is a key success factor in home visiting—the quality of the parent–visitor relationship is fundamental in this regard and has been shown to be critical in fostering parent participation (Korfmacher et al. 2007; Raikes et al. 2008).

Parents’ attitudes and enthusiasm toward HIPPY appear to be very positive, along with their level of comfort with the relationship with their home tutor and a firm belief that the program is having a positive impact on their child’s early learning and development. We suggest that the cultural competence of locally recruited home visitors as paraprofessionals is an important aspect and strength of HIPPY that can assist in the development of positive parent–visitor relationships and program engagement, as has been shown in other research of home visiting programs (Barnes-Boyd et al. 2001; McCurdy et al. 2003).

### **Other personal and household characteristics that impact on implementation and integrity of HIPPY**

We created an overall index of program integrity based on responses to six of the measures reported above. The six measures cut across four out of the five aspects of program integrity. We excluded program differentiation as this is more of a check to determine the extent of contamination or diffusion of other treatments to participants. We constructed two sub-domains of program integrity based on the four aspects of program integrity. The first sub-domain was a grouping of parent adherence and exposure, and included measures as described above associated with role-play, parent completion of weekly tasks with child, and attendance at group meetings. The second sub-domain was made up of a grouping of measures of quality of delivery and participant responsiveness, which focused on participant’s attitudes toward the program, enthusiasm and global estimates of effectiveness. This included measures on overall satisfaction with HIPPY, how much HIPPY is liked by the child, and parents’ perceived effectiveness of the program. Results from these two sub-domains were then added to form an overall index of program integrity.

The creation of an overall index of program integrity enables us to statistically investigate which aspects of context appear to impact on program implementation and integrity. In addition, we can investigate the impact of program integrity on program outcomes.

#### **Characteristics that impact on integrity**

We found three personal and household characteristics that significantly impact on the successful delivery and take-up of HIPPY. The strongest correlation was found between language spoken at home and take-up of the program. HIPPY was more successfully implemented and taken up in households that have English as the main language spoken at home. This is perhaps not surprising but it does attest to the difficulty that home tutors sometimes report of working with parents who have English as a second language:

*Not enough time to go through all the activities with parents who don’t speak English very well. With them I need to do extra time without being paid.*

However, families where the main language spoken at home is not English comprise one of the groups to which HIPPY is targeted and it is both the parent's and the HIPPY child's English ability that, it is hoped, will improve, more than they would have otherwise, as a result of doing HIPPY. While this analysis does not allow us to answer the question of whether the HIPPY child's English language ability has improved as a result of doing HIPPY more than it would have otherwise, we have seen that there is a large and significant improvement during the first year of the program, not only in the HIPPY child's English language ability but also in their overall readiness for school as measured by parent report and direct assessment with the child.

**Table 8.1 Regression analysis: personal and household characteristics that impact on implementation and integrity of HIPPY**

Model		Coefficients				95% confidence interval		
		Unstandardised coefficients		Standardised coefficients	t	Sig.	for B	
		B	Std error	Beta			Lower bound	Upper bound
1	(Constant)	2.378	.319		7.449	.000	1.737	3.019
	English spoken at home	.276	.121	.278	2.283	.027	.033	.519
	Working full-time	-.658	.315	-.255	-2.087	.042	-1.291	-.025
	Index of life satisfaction	-.167	.064	-.550	-2.618	.012	-.295	-.039
	Partner in household	-.199	.142	-.200	-1.399	.168	-.484	.087
	Satisfaction with personal relationship	.115	.041	.602	2.785	.007	.032	.197

Dependent variable: Index of total integrity. Model 1  $R^2 = .30$ ;  $p = .002$

As Table 8.1 (above) shows, the only other two characteristics that were found to significantly impact on the implementation and integrity of the program were: whether the parent was working full-time, and the parent's level of satisfaction with their personal relationship and life overall. Whether or not a second parent or a partner was in the household, in itself, does not appear to significantly impact on the delivery and take-up of the program. In fact, our analysis finds that HIPPY is working just as well, if not slightly better, with single-parent households. Taken together, these factors were found to explain a total of 30% of the variance in program integrity.

We investigated whether program integrity significantly varied by site. We found only a significant difference in program integrity between Fawkner and Geelong, with Geelong showing higher levels of program integrity. There were no significant differences in program integrity between any other sites. We examined the socio-demographic factors of Fawkner and Geelong and found that the only socio-demographic characteristic that was significantly different between the two sites was whether English was the main language spoken at home. All parents in Geelong reported that English was the main language spoken at home, while in Fawkner 85% of parents reported that a language other than English was the main language spoken at home. Interestingly, change in HIPPY children's school readiness over the course of the year was higher in Fawkner than in Geelong, but not significantly so. Once again this testifies to the difficulty of delivering the program with high levels of integrity to populations that do not have English as the main

language spoken at home, but also that this is the group that would appear to benefit most from the program<sup>21</sup>.

### **The impact of program integrity on HIPPY outcomes**

We wanted to know if program integrity had an impact on program outcomes. If the program was deemed to have been delivered well, and taken up well by participants with high levels of enthusiasm and satisfaction, then we would expect to see better outcomes than if the reverse were true. We tested this and found program integrity was highly and significantly correlated with the parent's report of HIPPY having helped their English ( $r = 0.49; p < .001$ ). It was moderately correlated with: the parent's ability to find out about local children's services ( $r = 0.37; p < .001$ ), a view that HIPPY had helped them get more involved in their community ( $r = 0.25; p < .05$ ), and a view that the program had positively affected their decision to work or look for work, and on the kind of job they might seek ( $r = 0.28; p < .05$ ). These are all aspects of what we defined as the parent's sense of social inclusion, and all were found to have significantly improved between baseline and the end of the first year of HIPPY.

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<sup>21</sup> Change in HIPPY children's school readiness, as reported by parents, was moderately greater for those parents who reported that a language other than English was their first language and this result was significant at the  $p = .07$  level ( $f(1) = 3.21, p = .07, D = .43$ ).

## 9 Conclusion

HIPPY (the Home Interaction Program for Parents and Youngsters), a program operating in several countries, targets children from disadvantaged communities and aims to improve their school readiness in a program which takes in preschool children and assists them over a two-year period concluding with the end of their first year at school. The program uses structured materials that tutors introduce to parents whom they visit fortnightly at home. Parent group meetings with tutors are held every alternate fortnight, also for the purpose of familiarisation in the use of the materials. Parents then work through the materials with their children. While the primary aim of HIPPY is to improve the school readiness of children, there are additional aims: improving the parenting skills of parents, the parent–child relationship, and parents’ sense of connectedness and inclusion, and providing additional skills to the home tutors recruited from within the local community (many of whom are people who are, or have previously been, parents who have been tutored in the program themselves).

This evaluation studied the impact of the Home Interaction Program for Parents and Youngsters on the school readiness of children from disadvantaged areas in which the program was operational in Australia in 2008. Additional objectives were to examine the impact of the program on parents and the program’s tutors. HIPPY sites in 2008 were located in Victoria, Tasmania and New South Wales. Interviews were conducted with parents and tutors, and direct assessments were carried out with the children. Details of the research into the impact of poverty and disadvantage on children and, particularly, their school readiness, together with details of other evaluations of HIPPY, are included in chapter two. In short, the research shows that:

- inequalities and disadvantage are related to poor school readiness and school performance later in the young person’s life
- such disadvantage cannot be fully addressed by programs aimed at parents, children and communities but that these can have an mitigating effect on disadvantage and help close the gap between disadvantaged children and their peers
- HIPPY has the characteristics of programs which are effective in playing such a mitigating and remedial role.

Details of the sample and methodology are included in chapter three.

### Key findings

The findings from this study show that HIPPY possesses some of the key features of effective early childhood development programs. They build on previous research evidence in Australia that supports the notion that HIPPY has an important role in:

- preparing children from disadvantaged communities for school readiness
- assisting parents in their parenting role generally and in their capacity to promote the positive development of their children
- increasing parents’ sense of inclusion and connectedness with their community
- developing the skills and self-esteem of tutors (who are usually parents currently or formerly involved in HIPPY).

There are, however, limitations in this study which impact on our ability to generalise from the findings. The sample is relatively small, both in terms of numbers of parents, children and tutors and in terms of the number and range of communities from which they came. The lack of a comparison group also limits our ability to say with confidence whether the gaps in school readiness of children

were narrowed because of HIPPY or by normal processes of parental support and guidance and maturation. Nevertheless, the findings from this evaluation are positive and helpful.

### **Potential development of HIPPY**

Possible areas for development of the program itself must be advanced with caution given the limitations outlined above. However, the following are suggested as areas warranting further research and consideration by HIPPY Australia for the purpose of program development.

#### **Further training**

Tutors have reported difficulties in relating to and responding to the behaviours of challenging families and review of their training in this area appears to be warranted.

#### **Better engaging the less engaged**

A more fine-grained analysis of the characteristics of those parents and children who derive lesser benefit from HIPPY is warranted in order to develop strategies most suited to their needs. A similar study of tutors is warranted in order to clarify those tutor characteristics most suited to delivering HIPPY (noting the evidence in this evaluation that the work of the great majority of tutors seems very effective). The age appropriateness of the HIPPY curriculum also warrants further investigation, given that our analysis shows that the children who benefited most from the program were aged over 4½.

#### **Questions about the design and implementation of HIPPY**

Questions about the design and implementation of the program itself have also been raised and warrant further investigation.

#### **Parent meetings**

Why are parent meetings less valued and attended by many parents? Are such meetings viable given pressures on some parents? Are they timely, or can some redesign enhance their effectiveness? Are additional supports such as childcare or other domestic assistance required by some parents? One notes here the comments of several parents that they lacked time to attend parent groups or to do the HIPPY activities daily; and while there might be a range of factors leading parents to say this, it is not surprising that the time and energy possessed by many parents, in such groups as HIPPY targets, are limited.

#### **Program integrity**

While the finding that program integrity is more difficult to achieve when English is not the family's first language is not surprising, it still prompts questions about how the program can be improved for such families. Could additional coaching in English be provided parallel with the delivery of HIPPY? Are the materials translated into enough non-English languages, or are translated materials sufficiently culturally sensitive? Further investigation might also be conducted into whether limited English leads to limited participation in parent groups, and whether the educational experience of people from certain cultures is of highly directive models of teaching, so they are less comfortable with the interactive learning models which are more familiar to people in many western countries.

#### **Community participation**

The finding that parents in general reported high levels of interaction with the community before involvement with HIPPY but greater levels of participation afterwards warrants further examination as this was not the case for all families. There is room for further examination to discover which families are more isolated, what the impact of this is, and how their greater social participation might be promoted. What is clear is that HIPPY plays a very important role in this area of developing 'social capital'; what is less clear is which families benefit from this, why, and whether additional strategies for some families might be considered.

The findings from this study support the general proposition that programs with certain characteristics which HIPPO possesses help to strengthen the home learning environment as an important proximal factor in mitigating the effects of socioeconomic disadvantage, improving children's readiness for school and enhancing future life chances.

## References

- Arnold D, Ortiz C, Curry J, Stowe R, Goldstein N, Fisher P, Zeljo A & Yershova K 1999, 'Promoting academic success and preventing disruptive behavior disorders through community partnership', *Journal of Community Psychology*, vol.27, no.5, pp.589–98.
- Arnold, C, Bartlett, K, Gowani, S & Merali, R 2007, *Is everybody ready? Readiness, transition and continuity: reflections and moving forward*, Working Paper 41, Bernard van Leer Foundation, The Hague, Netherlands.
- Australian Industry Group 2006, *New National Skills Fund Initiative*, media release, viewed 1 February 2008, <<http://www.aigroup.com.au>>.
- Baker, A & Piotrkowski, C 1996, 'The effects of the Home Instruction Program for Preschool Youngsters on children's school performance at the end of the program and one year later', *Early Childhood Research Quarterly*, vol.13, no.4, pp.571-578.
- Bakermans-Kranenburg, MJ, van IJzendoorn, MH & Juffer, F 2003, 'Less is more: meta-analyses of sensitivity and attachment interventions in early childhood', *Psychological Bulletin*, vol.129, pp.195–215.
- Bandura, A 1977, *Social learning theory*, Prentice-Hall, Englewood Cliffs, NJ.
- Barhava-Monteith, G, Harre, N & Field, J 1999, 'A promising start: an evaluation of the HIPPY program in New Zealand', *Early Childhood Development and Care*, vol.159, pp.145–57.
- Barnes-Boyd, C, Norr, KF & Nacion, KW 2001, 'Promoting infant health through home visiting by a nurse-managed community worker team', *Public Health Nursing*, vol.18, pp. 225–35.
- Blakely, CH, Mayer, JP, Gottschalk, RG 1987, 'The fidelity–adaptation debate: implications for the implementation of public sector social programs', *American Journal of Community Psychology*, vol.15, pp.253–68.
- Bradley, RH & Whiteside, L 1995, *Evaluation of HIPPY Program: a look at outcomes for children at the end of second grade*, Center for Research on Teaching & Learning, University of Arkansas at Little Rock.
- Bradley, RH 1999, *Evaluation of the HIPPY Program in Arkansas: a look at outcomes for children at the end of 3rd and 6th grades*, Home Instruction Program for Preschool Youngsters: Arkansas State HIPPY Program.
- Bronfenbrenner, U 1995, 'Developmental ecology through space and time: a future perspective', in P Moen, GH Elder Jr & K Luscher (eds), *Examining lives in context: perspectives on the ecology of human development*, American Psychological Association, Washington, DC.
- Brooks-Gunn, J 2003, 'Do you believe in magic? What we can expect from early childhood intervention programs', *Social Policy Report*, vol. 17, no. 1, pp.3–15.
- Brooks-Gunn, J & Duncan, G 2000, 'Family poverty, welfare reform, and child development', *Child Development*, vol.71, no.1, pp.188–96.
- Burgon, J, Dominick, C, Duncan, D, Hodges, I, Roberts, E & Weenik, M 1997, *Final report: Family Services Centres evaluation*, NZ Ministry of Health, Wellington.
- Calkins, SD & Hill, A 2006, 'Caregiver influences on emerging emotion regulation', in JJ Gross (ed.), *Handbook of emotion regulation*, Guilford, New York.
- Carneiro, P & Heckman, JJ 2003, *Human capital policy*, NBER working paper 9495, National Bureau of Economic Research, Inc., Cambridge, USA, viewed 12 December 2009, <[http://www.ecdgroup.com/pdfs/heckman\\_article-20\\_05\\_2003-17\\_59\\_04.pdf](http://www.ecdgroup.com/pdfs/heckman_article-20_05_2003-17_59_04.pdf)>.
- Chavis, D, Hogge, J & McMillan, D 1986, 'Sense of community through Brunswick's lens: a first look', *Journal of Community Psychology*, vol.14, pp.24–40.

- Cummins, RA, Eckersley, R, Pallant, J, Van Vugt, J, Shelly, J, Pusel, M & Misajon, R 2001, *Australian Unity wellbeing index*, Survey 1, Report 1, June 2001, Australian Centre on Quality of Life, Deakin University, Melbourne.
- Cummins, R & Lau A 2006, *Personal Wellbeing Index Manual*, 4th edn, Australian Centre on Quality of Life, Deakin University, Melbourne.
- Curtis, L 1995, 'Nurturing children and their schools', in Families International, Inc., *The state of families: family, employment and reconstruction: policy based on what works*, Families International, New York.
- Dadds, MR, Schwartz, S & Sanders, M 1987, 'Marital discord and treatment outcome in the treatment of childhood conduct disorders', *Journal of Consulting and Clinical Psychology*, vol.55, pp.396–403.
- Dane, A & Schneider, B 1998, 'Program integrity in primary and secondary prevention: are implementation effects out of control?', *Clinical Psychology Review*, vol.18, no.1, pp.23–45.
- David M 2001, 'Gender equity issues in educational effectiveness in the context of global, social and family life changes and public policy discourses on social inclusion and exclusion', *Australian Educational Researcher*, vol.28, no.2, pp.99–123.
- de Lemos, M 2002, *Patterns of young children's development: an international comparison of development as assessed by Who Am I?*, Applied Research Branch Strategic Policy, Human Resources Development, Canada, viewed 10 June 2009, <<http://www.hrsdc.gc.ca/eng/cs/sp/sdc/pkrf/publications/research/2002-002358/SP-520-09-02.pdf>>.
- de Lemos, M 2008, 'Assessing developmental readiness for school across different culture and language groups', *Australian Journal of Learning Difficulties*, vol.13, no.2, pp.73–98.
- de Lemos, M & Doig, B 1999, *Who Am I?: Developmental Assessment*, ACER, Melbourne.
- Desforges C & Abouchaar A 2003, 'The impact of parental involvement, parental support and family education on pupil achievement and adjustment: a literature review', Research Report Number 433, Department for Education and Skills, Nottingham, UK.
- Drake, R, Goldman, H, Leff, H, Lehman, A, Dixon, L, Mueser, K & Torrey, W 2001, 'Implementing evidence-based practices in routine mental health service settings', *Psychiatric Services*, vol.52, pp.179–82.
- Dugas, KJ & Schweitzer, JH 1997, *Sense of community and the development of block culture*, Research Paper, submitted to fulfill requirements for the 1997 Ronald E McNair Post-Baccalaureate Achievement Program, January–October 1997.
- Duncan, G, Claessens, A, Huston, A, Pagani, L, Engel, M, Sexton, H, Dowsett, C, Magnuson, K, Klebanov, P, Feinstein, L, Brooks-Gunn, J & Duckworth, K 2007, 'School readiness and later achievement', *Developmental Psychology*, vol.43, pp.1428–46.
- Edwards, R 2004, *Measuring social capital: an Australian framework and indicators*, Information Paper, Australian Bureau of Statistics (ABS), Belconnen, ACT.
- Farrar, E, Goldfeld, S & Moore, T 2007, 'School readiness', Centre for Community Child Health, The Royal Children's Hospital, Murdoch Children's Research Institute, Melbourne, viewed April 2009, <[http://www.aracy.org.au/publicationDocuments/TOP\\_School\\_Readiness\\_2007.pdf](http://www.aracy.org.au/publicationDocuments/TOP_School_Readiness_2007.pdf)>.
- Forster, PM 2004, 'Psychological sense of community in groups on the Internet', *Behaviour Change*, vol.21, pp.141–6.
- Gilley, T 2002, 'Enhancing learning in early childhood within the family: evaluation of practice and theory in a multicultural context', PhD thesis, School of Social Sciences and Psychology, Victoria University.

- Godfrey, C 2006, 'Responses to an early childhood educational intervention with disadvantaged families: an exploratory study', Doctor of Psychology thesis, School of Social Sciences and Psychology, Victoria University.
- Gomby, SD, Culross, PL & Behrman, RE 1999, 'Home visiting: recent program evaluations – analysis and recommendations', *The Future of Children: Home Visiting*, vol.9, no.1, pp.4–26.
- Goodman, R & Scott, S 1999, 'Comparing the Strengths and Difficulties Questionnaire and the Child Behaviour Checklist: is small beautiful?', *Journal of Abnormal Child Psychology*, vol.27, pp.17–24.
- Goodman, R 1997, 'The Strengths and Difficulties Questionnaire: a research note', *Journal of Child Psychology and Psychiatry*, vol.38, pp.581–6.
- Goodman, R 1999, 'The extended version of the strengths and difficulties questionnaire as a guide to child psychiatric caseness and consequent burden', *Journal of Child Psychology and Psychiatry*, vol.40, pp.791–9.
- Government Skills Australia 2006, *Fact sheet 3: employability skills*, Government Skills Australia, Adelaide, viewed 22 November 2009, <[http://www.governmentskills.com.au/dmdocuments/General%20GSA/employability\\_skills.pdf](http://www.governmentskills.com.au/dmdocuments/General%20GSA/employability_skills.pdf)>
- Grady, J 2002, 'Evaluation of a home based early childhood education intervention: Process, family relationship and cross-cultural dimensions', Doctor of Psychology thesis, School of Social Sciences and Psychology, Victoria University.
- Green, J 2007, 'Challenging disadvantage: the social outcomes of an early childhood educational intervention within the family', PhD thesis, School of Social Sciences and Psychology, Victoria University.
- Gregory, A & Rhimm-Kaufman, S 2008, 'Positive mother–child interactions in kindergarten: predictors of school success in high school', *School Psychology Review*, vol.37, pp.499–515.
- Hanson, T, McLanahan, S & Thomson, E 1997, 'Economic resources, parental practices, and child well-being, in G Duncan & J Brooks-Gunn (eds), *Consequences of growing up poor*, Russell Sage Foundation, New York.
- Hart, B & Risley, T 1995, *Meaningful differences in the everyday experience of young American children*, PH Brookes, Baltimore.
- Heckman, JJ 2000, 'Policies to foster human capital', *Research in Economics*, vol.54, pp.3–56.
- Heckman, J & Masterov, DV 2007, 'The productivity argument for investing in young children, *Review of Agricultural Economics*, vol.29, 446–93.
- Henderson, AT & Berla, N 1994, *A new generation of evidence: the family is critical to student achievement*, National Committee for Citizens in Education, Washington, DC.
- Hilferty & Redmond 2009, *The implications of poverty on children's readiness to learn*, Australian Research Alliance for Children and Youth, viewed December 2009, <[http://www.aracy.org.au/cmsdocuments/REP\\_the\\_implications\\_of\\_poverty\\_on\\_childrens\\_readiness\\_to\\_learn\\_2009.pdf](http://www.aracy.org.au/cmsdocuments/REP_the_implications_of_poverty_on_childrens_readiness_to_learn_2009.pdf)>.
- Hinshaw, SP 1992, 'Externalizing behavior problems and academic under-achievement in childhood and adolescence: causal relationships and underlying mechanisms', *Psychological Bulletin*, vol.111, pp.127–55.
- HIPPY USA 2001, *What we know about how HIPPY works: a summary of HIPPY evaluation research*, HIPPY USA, New York, viewed February 2009, <<http://www.hippyusa.org>>.
- Hobbs, SA, Walle, DL & Hammersley, GA 1990, 'The relationship between child behaviour and acceptability of contingency management procedures', *Child and Family Behaviour Therapy*, vol.12, pp.95–102.

- Holden, T 2007, *Home visiting research, training and infrastructure: a literature review*, Council for Families, British Columbia, Canada, viewed 12 December 2009, <<http://www.bccf.bc.ca>>.
- Hutchings, J, Appleton, P, Smith, M, Lane, E & Nash, S 2002, 'Evaluation of two treatments for children with severe behaviour problems: child behaviour and maternal mental health outcomes', *Behavioural and Cognitive Psychotherapy*, vol.30, pp.303–19.
- Hutchings, J, Lane, E & Kelly, J 2004, 'Comparison of two treatments for children with severely disruptive behaviours: a four-year follow-up', *Behavioural and Cognitive Psychotherapy*, vol.32, pp.15–30.
- Jacobson, AL & Ramisetty-Mikler, S 2000, *The HIPPY Corps Initiative: getting things done*, 1999–2000 Annual Program Evaluation Report, Center for Parent Education, University of North Texas, Denton.
- Janus, M & Offord, DR 2007, 'Development and psychometric properties of the Early Development Instrument (EDI): a measure of children's school readiness', *Canadian Journal of Behavioural Science*, vol.39, pp.1–22.
- Kagitcibasi, C 1996. *Family and human development across cultures: a view from the other side*, Lawrence Erlbaum, New Jersey.
- Karoly, LA, Kilburn, MR & Cannon, JS 2005, *Early childhood interventions: proven results, future promise*, Rand, Santa Monica, CA.
- Kiernan, G, Axford, N, Little, M, Murphy, C, Greene, S & Gormley, M 2008, 'The school readiness of children living in a disadvantaged area in Ireland', *Journal of Early Childhood Research*, vol.6, pp.119–44.
- Knapp, M & Deluty, RH 1989, 'Relative effectiveness of two behavioural parent training programs', *Journal of Clinical Child Psychology*, vol.18, pp.314–22.
- Knight, D & Rizzuto, T 1993, 'Relations for children in grades 2, 3, and 4 between balance skills and academic performance', *Perceptual and Motor Skills*, vol.76, pp.1296–98.
- Korfmacher, J, Green, B, Spellman, M & Thornburg, K 2007, 'The helping relationship and program participation in early childhood home visiting', *Infant Mental Health Journal*, vol. 28, no.5, pp.459–480.
- Ladd, GW, Kochenderfer, BJ & Coleman, C 1997, 'Classroom peer acceptance, friendship, and victimization: distinct relational systems that contribute uniquely to children's school adjustment', *Child Development*, vol.68, pp.1181–97.
- Le Mare, L & Audent, K 2003, 'The Vancouver HIPPY Project: preliminary evaluation findings from a multicultural program', in Miriam Westheimer (ed.), *Parents making a difference: international research on the Home Instruction for Parents of Preschool Youngsters (HIPPY) Program*, Magnes, Jerusalem.
- Lombard, AD 1994, *Success begins at home: the past, present and future of the Home Instruction Program for Preschool Youngsters*, 2nd edn, Dushkin Publishing Group, Guildford, CT.
- Lovejoy, M & Westheimer, M 1993, *Voices from the field: a case study on one inner-city HIPPY program*, NCJW Center for the Child and HIPPY USA, New York, NY.
- Mahler, V & Jesuit, D 2004, *Luxemburg Income Study, Working Paper No.392*, viewed 22 January 2009, <<http://www.lisproject.org/publications/liswps/392.pdf>>.
- McClelland, MM, Morrison, FJ & Holmes, DL 2000, 'Children at risk for early academic problems: the role of learning-related social skills', *Early Childhood Research Quarterly*, vol.15, pp.307–29.
- McCurdy, K, Gannon, RA & Daro, D 2003, 'Participation patterns in home-based family support programs: ethnic variations', *Family Relations*, vol.52, pp.3–11.

- McDonald, K 2004, 'Exploring the parents' experience and perception of the HIPPY program in Geelong', Psychology Honours thesis, School of Social Sciences and Psychology, Victoria University.
- McMahon, RJ, Forehand, R, Griest, DL & Wells, K 1981, 'Who drops out of treatment during parent behavioral training?', *Behavioral Counseling Quarterly*, vol.1, pp.79–85.
- Meisels, SJ 1999, 'Assessing readiness', in RC Pianta & M Cox (eds), *The transition to kindergarten*, Brookes, Baltimore, MD.
- Meisels, SJ 2006, 'The relationship of young children's motor skills to later school achievement', *Merrill-Palmer Quarterly*, vol.52, pp.755–78.
- Morrison, Z 2008, *Place, social inclusion and 'cultural justice': reflections on the British experience – a place-based social exclusion policy case study*, Brotherhood of St Laurence and the Department of Planning and Community Development Social Inclusion and Place Based Disadvantage Workshop Proceedings, Fitzroy, Vic., 13 June 2008.
- Morrison, Z 2009, 'Children and child poverty', in *Equality speaks: challenges for a fair society*, Catalyst series 1, Catalyst Australia, viewed 30 November 2009, <<http://www.catalyst.org.au/catalyst/component/content/article/272>>.
- Nievar, AM & Martinez-Cantu, V 2009 (unpublished), Intervention in early childhood: links to school success, paper to be presented at the annual meeting of the American Educational Research Association, San Diego, CA, 13–17 April 2009.
- New South Wales Parenting Centre 2003, *School readiness*, Discussion Paper 1, New South Wales Department of Community Services, Sydney.
- Obst, P & White, K 2004, 'Revisiting the Sense of Community Index: a confirmatory factor analysis', *Journal of Community Psychology*, vol. 32, no.6, pp.691–705.
- O'Neil, R, Welsh, M, Parke, RD, Wang, S & Strand, C 1997, 'A longitudinal assessment of the academic correlates of early peer acceptance and rejection', *Journal of Clinical Child Psychology*, vol.26, pp.290–303.
- Patterson, D & Barnard, K 1990, 'Parenting of low birth weight infants: A review of issues and interventions', *Infant Mental Health Journal*, vol.11, pp.37–56.
- Patterson, GR 1982, *A social learning approach*, vol.3, *Coercive family process*, Castalia Publishing, Eugene, Oregon.
- Phillips, B 2005 'Emergent literacy: what it is and why it matters', presented at the Kids Incorporated 14th Annual Early Childhood Conference, Tallahassee, FL, March 2005, viewed 12 December 2009, <<http://www.fcrr.org/science/sciencePresentationsPhillips.htm>>.
- Piaget, J 1952, *The origins of intelligence in children*, International Universities Press, New York.
- Piaget, J 1977, *The development of thought: equilibrium of cognitive structures*, Viking Press, New York.
- Pickett, KE & Wilkinson, RG 2007, 'Child wellbeing and income inequality in rich societies: ecological cross-sectional study', *British Medical Journal*, vol.335, no.7629, pp.1080–6.
- Pinta, RC & Harbers, KL 1996, 'Observing mother and child behavior in a problem-solving situation at school entry: relations with academic achievement', *Journal of School Psychology*, vol.34, pp.307–22.
- Raikes H, Roggman L, Cook, G & Peterson, C 2008, 'Who drops out of early head start home visiting programs?', *Early Education and Development*, vol.19, no.4, pp.574–99.
- Sanson, A, Oberklaid, F, Pedlow, R & Prior, M 1991, 'Risk indicators: assessment of infancy predictors of preschool behavioural maladjustment', *Journal of Child Psychology & Psychiatry & Allied Disciplines*, vol.32, no.4, pp. 609–26.

- Shonkoff, JP & Phillips, DA 2000, *From neurons to neighborhoods: the science of early childhood development*, National Academy Press, Washington, DC.
- Smart, D, Sanson, A, Baxter, J, Edwards, B & Hayes, A 2008, *Home-to-school transitions for financially disadvantaged children*, Australian Institute of Families Studies, Melbourne.
- Snow, C, Burns, MS & Griffin, P (eds) 1998, *Preventing reading difficulties in young children*, National Academy Press, Washington, DC.
- Sroufe, LA 2005, 'Attachment and development: a prospective, longitudinal study from birth to adulthood', *Attachment and Human Development*, vol.7, pp.349–67.
- Sroufe, LA, Egeland, B, Carlson, E & Collins, WA 2005, *The development of the person: the Minnesota study of risk and adaptation from birth to adulthood*, Guilford Publications, New York.
- Stevenson, HW & Newman, RS 1986, 'Long-term prediction of achievement in mathematics and reading', *Child Development*, vol.57, pp.646–659.
- Stone, W & Hughes, J 2002, *Social capital: empirical meaning and measurement validity*, Research Paper no.27, Australian Institute of Family Studies, Melbourne, Victoria.
- Sutton, C, Utting, D & Farrington, D (eds) 2004, *Support from the start: working with young children and their families to reduce the risks of crime and anti-social behaviour*, Research Report 524, Department for Education and Skills, DfES Publications, Nottingham, UK, viewed November 2009, <<http://www.dcsf.gov.uk/research/data/uploadfiles/RR524.pdf>>.
- Tymms, PB 1999, 'Baseline assessment; value-added and the prediction of reading', *Journal of Research in Reading*, vol.22, pp.27–36.
- Wagner, M, Spiker, D, Linn, MI, Gerlach-Downie, S & Hernandez, F 2003, 'Dimensions of parental engagement in home visiting programs: exploratory study', *Topics in Early Childhood Special Education*, vol.23, pp.171–87.
- Walker, D, Greenwood, C, Hart, B & Carta, J 2008, 'Prediction of school outcomes based on early language production and socioeconomic factors', *Child Development*, vol.65, no.2, pp.606–21.
- Watson, J & Tully, L 2008, *Prevention and early intervention update: trends in recent research*, Centre for Parenting and Research, New South Wales Department of Community Services, Sydney.
- Webster-Stratton, C 1994, 'Advancing videotape parent training: a comparison study', *Journal of Consulting and Clinical Psychology*, vol.62, no.3, pp.583–93.
- Webster-Stratton, C 1998, 'Preventing conduct problems in Head Start children: strengthening parent competencies', *Journal of Consulting and Clinical Psychology*, no.66, pp.715–30.
- Webster-Stratton, C & Hancock, L 1998, 'Parent training for young children with conduct problems: content, methods, and therapeutic process', in CE Schaefer (ed.), *Handbook of parent training*, Wiley, New York.
- Wilkinson, RG & Pickett, KE 2007, 'The problems of relative deprivation: why some societies do better than others', *Social Science and Medicine*, vol.65, no.9, pp.1965–76.
- Wiltz, NA & Patterson, GR 1974, 'An evaluation of parent training procedures designed to alter inappropriate aggressive behaviour of boys', *Behaviour Therapy*, vol.5, pp.215–21.
- Woolcock, M 2000, 'Social capital and its meanings', *Canberra Bulletin of Public Administration*, no.98, pp.17–19.