

**The benefits of investing in Early Child Development:**  
An SROI analysis of the Responsive Parenting Program  
ChildFund International, Ecuador

# The benefits of investing in Early Child Development:

## An SROI analysis of the Responsive Parenting Program

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## **Glossary of terms**

The following abbreviations are used throughout this report:

CBA	Cost Benefit Analysis
ECD	Early Childhood Development
RPP	Responsive Parenting Program
SROI	Social Return on Investment
WTA	Willingness to Accept
WTP	Willingness to Pay

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## Executive summary

The principal objective of this research is to evaluate ChildFund's Responsive Parenting Program (RPP) using a Social Return on Investment (SROI) approach. The Responsive Parenting Program aims to promote child development by supporting the primary care givers (parents). By increasing the skills, knowledge and awareness of primary care givers *vis-à-vis* all components of child development, it is hoped they can then implement this learning with their children.

In order to evaluate the RPP, we conducted an SROI case study in Carchi, Ecuador. The case study's objectives were:

- To understand the impact of the program. We looked at providing a holistic understanding of the potential impacts of Early Child Development (ECD) interventions. Previous return on investment analyses of ECD have tended to focus on a restrictive number of economic outcomes (or 'benefits'). This analysis is deliberately broader, and aims to investigate how, and to what extent, wider impacts can be accounted for when undertaking socio-economic appraisals of ECD interventions;
- To inform internal decision-making by interrogating the value-for-money of investing in programs such as the RPP: Is the RPP an efficient and effective approach to promote child development?
- To provide ChildFund with a greater understanding of how to measure the outcomes and impact of the RPP.

### Theory of Change for the SROI

Ecuador has been investing heavily in statutory health and educational services over the past ten years. However, State investments will take some time to achieve full coverage, and there can be a mismatch between the increasing availability of public services (the supply-side) and the extent to which local people use them (the demand-side). Moreover, despite a non-negligible reduction in malnutrition, health and nutrition problems as well as psychomotor delays are still widespread. Finally, unlike existing statutory services, ChildFund's RPP aims to address broader aspects of child development, including cognitive, social and emotional developments. This involves working with communities to tackle broader aspects of children's rights by slowly transforming social norms and parental behaviour. In short, the RPP does not aim to replace statutory services but rather to work in parallel with them; to complement them, and act as the demand-side catalyst which can improve children's rights within communities.

Existing data gathered through the RPP shows that children progress in the five areas of development. Anecdotal and qualitative evidence also indicates wider changes for parents, trainers and the community. This research attempts to define and quantify those wider changes which result from and contribute to the program's success.

Through a qualitative approach, we identified the following outcomes, deemed

to be those which matter most to each stakeholder group (as defined by them). These are the outcomes tested through the SROI analysis (Table A).

Table A: Outcomes tested in SROI analysis

Stakeholder group	Outcome
<b>Children</b>	Improved physical development
	Improved emotional development
	Improved social development
<b>Parents</b>	Improved knowledge and skills
	Increased self-esteem
	Empowerment (agency and participation)
	Improved economic circumstances
	Improved family relationships
<b>Trainers</b>	Increased employability
	Improved knowledge and skills
	Improved family relationships
	Improved self-esteem
	Empowerment (agency and participation)
<b>Community</b>	Increased awareness, knowledge and skills in child development

## Research approach

The study tested the RPP community-based approach, using empirical research to gather quantitative data on outcomes and impact for children, parents, trainers and the community. The research focused on changes experienced by stakeholders over a 2–5 year period, for a sample of 73 households and 31 trainers. Traditional cost-benefit analyses of ECD programs tend to focus on the long-run, typically the economic effects of an intervention. These longitudinal studies rely upon the assumption that investments in the short term have a direct impact on long-run changes in children’s lives, without considering (or valuing) changes that may happen in the medium term, which can act as a catalyst for longer-term change. This analysis brings to the light these intermediary steps.

In addition to data on the outcomes experienced by each group, we also collected data to estimate the deadweight (what would have happened anyway), attribution (credit the program can take) and the investment of cash and other resources (including time). Finally, a combination of revealed and stated preference approaches was used, to estimate the *value* of those outcomes for

which there does not exist a 'market price'. Data was analysed through a Social Return on Investment (SROI) model, the results of which can be found below.

## Findings

Overall, we found that respective stakeholders report a positive change across all outcomes considered in this analysis. This change, however, is not uniform across outcomes:

- For children, we find there is greater change related to social and emotional developments compared to those reflecting physical development.
- For caregivers/ parents (mainly mothers) we find the biggest changes reported are in indicators used to reflect improvements in agency and participation and self-esteem.
- For trainers, the biggest amount of change came from increased employability, improvement in self-esteem and improvement in agency and participation.
- Only one outcome was measured for the community: the number of families outside the program benefitting from increased knowledge. It was found that, on average, 9 further families gained knowledge of parenting, per family that participated in the survey.

The data collected to inform an understanding of the net impact is, perhaps, as interesting as the outcomes. Trainers attributed to the program 100% of the changes experienced in respect of increased employability, and almost 60% of the personal and emotional changes they experienced. Parents felt there was more of a balance between the program and local health services; this illustrates the way in which program activities 'wrap around' local State provision, enhancing the effectiveness of local services.

In addition, many values for 'non-market' outcomes were derived through willingness to pay, and choice experiment exercises. These exercises highlighted the value of the RPP in people's lives. When asked to place a value on what they would pay to attend the course, trainers estimated on average that they would pay \$708 (per year) and parents \$427.5.

When asked to prioritise those things most valuable in their lives, participants and trainers consistently ranked good relationships with their children and family and the community as a priority in their lives, over and above a stable job. This provided a framework for putting a financial 'proxy' on outcomes, but also further reinforced an understanding of elements which contribute to the success of the program: the strength of the family and community relationships, that people hold most dear.

The cost-benefit analysis summarised all of the outcomes across all stakeholders, and compared this to the cash and other economic investments (including trainers' and parents' time). The resulting model found that the RPP is an effective intervention from a return-on-investment perspective (Table B). At a minimum, it generates double the amount of value than it requires for implementation, for the stakeholders sampled for our analysis. At a maximum, our estimates show that for each \$1 invested, \$3.5 of social value is created.

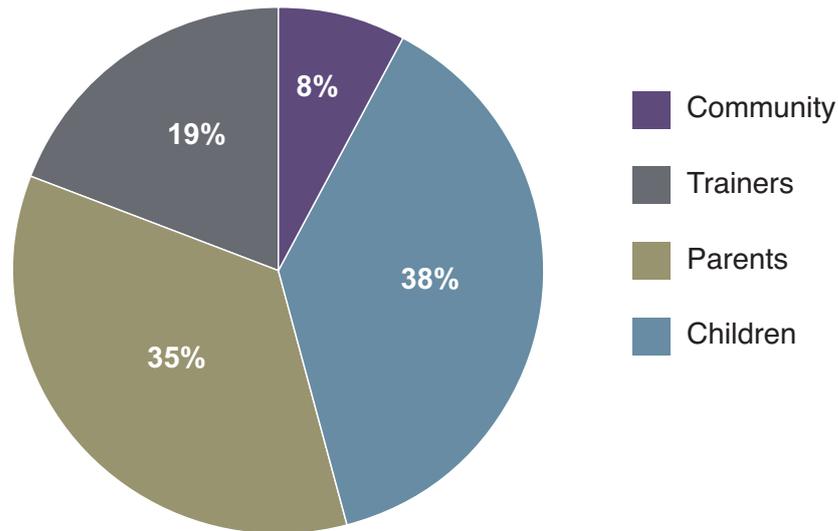
Table B: The social returns on investment to RPP (US Dollars)

EVALUATIVE ANALYSIS				FORECASTIVE ANALYSIS		
<i>Discount rate:</i>	0%	3%	10%	0%	3%	10%
<b>Present Value of Benefits</b>	117,900	111,165	97,733	196,501	178,432	163,686
<b>Present Value of Costs</b>	56,763	55,110	51,603	56,763	55,110	51,603
<b>Net Present Value (NPV)</b>	61,137	56,054	46,130	139,737	123,322	112,083
<b>SROI ratio</b>	2.08	2.02	1.89	3.46	3.24	3.17

When viewed both in evaluative and forecastive terms, the results are very encouraging for interventions related to ECD. Indeed, if by focusing on short-term impacts only we find results are positive, even when excluding potential life-long impacts, then there is a strong rationale for investing in programs such as RPP. Similarly, our results also suggest that factoring for broader societal benefits derived through ECD interventions into traditional cost-benefit analysis could mean that returns on investment are considerably higher than previously thought. If combining a) a long-term approach (as previous analyses do) with b) broader social valuation (as this research does), then the returns on investment could be substantially higher than the existing evidence suggests. Combining the two approaches could also 'bridge the gap' between the economics literature on ECD and the literature stemming from other social sciences, which typically entails broader societal impacts.

From the standpoint of program effectiveness, it is equally important to know where the value generated by the RPP is accruing. Overall, we find that the majority of the benefits generated accrue to children and parents (Figure A). This is indicative of the RPP's allocative effectiveness, since the vast majority of the benefits created accrue to the intended beneficiaries.

Figure A: Percentage of benefits generated accruing to respective stakeholders



## Discussion

This analysis has equally brought to light some of the areas for development and improvement of the RPP. Firstly, the fact that the RPP builds parents' awareness, skills and knowledge around early child development does not mean that parents subsequently have the capabilities to act in their everyday lives – independent of their circumstances. This is especially true in the case of nutrition, where a lack of access to land or finance can prevent families from developing vegetable gardens or orchards. This, we feel, is the main area for development in the program.

Secondly, in Carchi, approximately 17% of the total inputs to the RPP are non-financial, i.e. unpaid and not included in the budget for the program. Although this is linked to the delivery model of ChildFund's program, whereby communities and community members are deliberately and voluntarily involved, it can pose a risk for the financial viability of the program itself. This may not be a concern in the short run; however, if in the medium to long term the contribution of stakeholder and community members was to be reduced, then the effectiveness and cost-effectiveness of the RPP could be reduced as well.

Finally, the survey tools that were developed proved an efficient and effective way of capturing change for stakeholders over time, using retrospective questioning to establish a baseline and understanding of change. For the researchers, one of the most notable parts of the research was conducting the value and attribution exercises; hearing the parents' and trainers' view of who they felt was responsible for change, and how much that was worth. This exercise can help to inform program design - understanding where value is created, who contributes, and how this may change over time. We would recommend that ChildFund continues to measure these wider changes for children, parents, trainers and communities, to continue to contribute to the growing body of literature on the effectiveness of ECD interventions.

# 1. Introduction

This report presents the findings of an evaluative Social Return on Investment (SROI) analysis of the Responsive Parenting Program, funded by ChildFund International and delivered in the Carchi region of Ecuador.

ChildFund International has been implementing social development programs in Ecuador since 1984. Their mission is to help socially and economically excluded and vulnerable children to have the capacity to become young adults, fathers, mothers and leaders - who are able to make positive and lasting changes in their communities.

## 1.1 Our understanding of the Responsive Parenting Program

The Responsive Parenting Program (RPP) aims to enable children under 5 years old, to develop and flourish, by training and supporting their primary caregiver(s) (parents) to gain the knowledge, practical tools and confidence to support their children through each development stage.

The program was established in response to the needs of children and families in ChildFund communities. These were: to train caregivers to be able to better support their children and to understand their development and care needs, especially where there was a lack of childcare and pre-school education in their area. Since the program commenced in the 1990s, the Ecuadorian government has invested heavily in pre-school education and primary healthcare; however provision is more concentrated in cities.

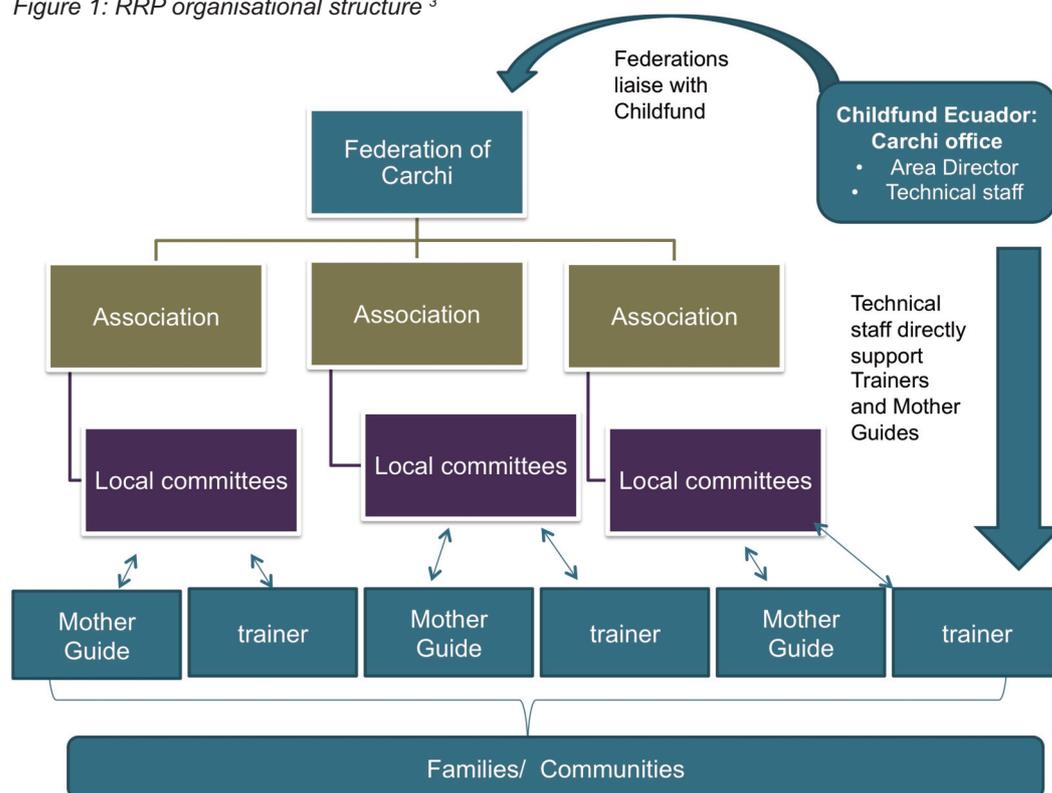
“ECD programs are based on the family; parents are primary caregivers.”<sup>1</sup>

The program operates in five provinces in the north and central Andes, in 500, mostly rural, communities<sup>2</sup>. ChildFund designed the program to work within existing network and organisational structures. This recognises the need for the intervention to be ‘owned’ by the community; it ensures activities are relevant, and builds the capacity of community members and organisations to respond to local families’ needs. Figure 1 presents the organisational structure of the RRP.

1 Guevara Castro, N (2012) Document on the Best Practices in the Early Childhood Development Program, ChildFund Ecuador.

2 ‘Rural’ areas – defined by ChildFund – are ones that suffer higher shortages/ lack of public services (53%) compared with urban areas (22%)

Figure 1: RRP organisational structure <sup>3</sup>



The program is funded and coordinated at a national level by ChildFund Ecuador, which offers technical assistance, materials and monitoring and evaluation support. At a regional level, the program is coordinated by Federations of Community Associations that provide staff and resources for local implementation. Local Associations, operating at a parish level, maintain representation of the local community, link to other partners at a local and regional level, and have specific Child and Youth Protection Committees. They are also responsible, through specially appointed community mobilisers, for promoting the program and recruiting participants, both families and trainers.

At a micro-level, Mother Guides and trainers are responsible for liaising and supporting each family involved in the program. The Childfund Office provides technical and administrative support to these actors, helping them to monitor the development of children, and effectively support families with specific issues as they navigate available public services (e.g. health and child protection).

The program targets those families who are experiencing deprivation, exclusion and vulnerability; the most common issues identified are domestic violence, malnutrition, lack of access or use of health services, lack of parenting knowledge and gaps in a parent's own psychosocial development<sup>4</sup>.

### Summary of program activities

The program is comprised of the following six areas of activity:

<sup>3</sup> Adapted from Lee, B and Petrova, V (2013), Empowered and Responsive Parenting: Childfund International Research Report, Childfund International for illustrative purposes.

<sup>4</sup> Petrova, V and Lee, B (2013), Empowered and Responsive Parenting: Childfund International Research Report, Childfund International

1. **An analysis of the conditions of children in the local area:** the program leader coordinates a participatory community diagnosis of children's home and community environments, including information from family health cards and information from local Mother Guides<sup>5</sup> from each area. In addition, meetings are held with community committees to present the results and identify other risks affecting infants and young children.
2. **Selection of participants in each of the communities:** following the participatory community diagnosis, a number of families with children under 5 years old are selected by local Child and Youth Protection Committees to participate in the training. Parents complete an initial questionnaire setting out their understanding of development, risks and their attitudes to parenting. In addition, a number of mothers or fathers perceived as leaders in their community are selected to become trainers by the local Committee.
3. **Training of trainers:** the trainers attend training each month, delivered by an ECD specialist. They learn the content and methodology to share with parents, participatory learning techniques and monitoring processes for tracking change, as described in Box 1.

#### Box 1: Training content

The content of the training evolved from the United Nations Children's Fund 12 messages for care and development, into 26 key messages organised into five units. In summary<sup>6</sup>:

Unit 1 covers general messages of child development, including the importance of parental roles and children's rights.

Unit 2 covers physical development; maternal health and well-being, nutrition, the importance of breastfeeding, vaccines, and risk reduction.

Unit 3 covers emotional development; the importance of affection and physical contact, caregivers' emotional well-being and the importance of praise and recognition.

Unit 4 covers social development; strategies to help children develop moral values, socially acceptable conduct, the ability to share, the ability to take care of themselves, and how to be independent.

Unit 5 covers intellectual and creative development; encouraging children to use their senses and explore, creating child-friendly spaces within the home, communicating with children in a way that is respectful and appropriate for their development abilities.

4. **Delivery of training to parents:** over eight to ten months, the trainers deliver one two-hour session per week, to 9-15 parents in the local community. There are accompanying guidelines for parents to follow as the program progresses, which include how to do stimulating activities in the home. Parents are supported to make toys for their children, identify an area of their

5 Mother/Father Guides are volunteer women or men who receive training from ChildFund and serve as community focal points for Child Protection. The Guides also support parents in working on positive growth and development for children: understanding developmental milestones; providing developmental stimulation; etc

6 Adapted from Petrova, V and Lee B (2013), Empowered and Responsive Parenting: Childfund International Research Report, Childfund International for illustrative purposes.

house that can be used as a 'play corner' and identify land that can be used to grow fruit and vegetables. In addition, Mother Guides visit homes and work with individual families to support them in identifying and acting upon what is needed for their children.

5. **Measuring change:** Alongside the training, a measurement scale is implemented by the Mother Guides, who assess the developmental status of each child at the start of the training and at the end. This scale measures 15 development indicators (activities the children should be able to do) in five areas: gross motor skills, fine motor skills, communication/ language, socio/emotional and cognitive ability. The scale is categorised into 10 different age groups, reflecting the developmental milestones expected in each. Each child is classified as 'advanced', 'expected' or 'at risk or high risk of developmental delay'.
6. **Graduation:** at the end of the training, parents and children attend a graduation ceremony. This is in addition to self-reflection by the parents on their parenting practices, child protection and risks.

The method and basic materials have been developed and standardised by ChildFund Ecuador, with support from international experts. The program was originally delivered in Ecuador and Colombia, and the tools and methods have been refined, based upon initial pilot programs.

### The program in Carchi

The program operates in five provinces in Ecuador. Of those, Carchi is in the North of Ecuador, next to the border with Colombia. It has around 150,000 inhabitants across six Cantons (provinces).

Although it is not the poorest province of Ecuador, it is certainly among the most vulnerable: 56.6% of its population live below the poverty line, 31.7% in conditions of extreme poverty<sup>7</sup>. Nationally, these outcomes are 26% and 13% respectively. Unsurprisingly, this translates into higher rates of malnutrition, mortality and stunting compared to national averages, as is illustrated in Table 1.

Table 1: Key indicators of Children's living conditions in Carchi

	Carchi	National Average
<b>Malnutrition</b>	26%	11%
<b>Mortality rate of under 5-years old (per 1000 births)</b>	39	26
<b>Stunting rate</b>	24%	23.1%

Source: compiled from Ecuador's Observatory for the Rights of Children and Adolescents<sup>8</sup> and the World Bank<sup>9</sup>.

7 Information available at: [http://www.pnud.org.ec/art/frontEnd/images/objetos/brochure\\_carchi.pdf](http://www.pnud.org.ec/art/frontEnd/images/objetos/brochure_carchi.pdf)

8 Data available on website of the Observatory for the Rights of Children and Adolescents at: <http://www.odna.org.ec/idn1.html>

9 The World Bank (2007), Nutritional Failure in Ecuador, Causes, Consequences and Solutions, The World Bank, USA

The program is implemented across the Carchi region and is coordinated by Fedacc (Federation of Community Associations of Carchi). Between 2010 and 2013 it supported around 2200 low income and vulnerable families.

## 1.2 Objectives of this research

The objectives of this research are twofold:

- To understand and communicate the impact the program creates through an evaluative study (Prove);
- To inform internal decision-making: interrogating ways of working, the effectiveness of investments and resource use, and to ensure an understanding of how to measure outcomes and impact (Improve).

A Social Return on Investment (SROI) approach has been used to meet these objectives owing to the following characteristics of the methodology:

1. SROI results can depict the extent to which the intervention is cost effective, and the way in which outcomes are realised for each stakeholder group;
2. The SROI process can support ChildFund to maximise its impact for a given amount of resources (financial and in-kind). Indeed, through a holistic analysis combining quantitative and qualitative methods it is possible and desirable to analyse which factors, internal or external to the RPP, are preventing or enabling its success;
3. SROI can be used in a comparative way to analyse the relative effectiveness of different interventions, or of the same intervention in different countries. Whilst this study focuses on one region in Ecuador, it serves as a starting point for ChildFund to evaluate its Early Childhood Development programs across Ecuador and beyond.

This report is structured as follows:

Chapter 2 provides context by presenting a brief summary of the existing evidence on the cost effectiveness of ECD programs. Chapter 3 summarises the research methodology with further details provided throughout the report and in the appendices. Chapter 4 presents a theoretical understanding of how the program creates change for children, parents, trainers and the community, based upon their testimony. It is this theory that is tested by the SROI process which is presented in more detail in Chapter 5. Chapter 6 contains the results of the SROI modelling. These are the changes observed for each stakeholder group and how this translates into impact and value. Finally we present what we have learned from the research, and a number of discussion points relating to program delivery, future monitoring and advocacy in Chapter 7.

## 2. The returns on investment to ECD: What do we know?

To date, cost-benefit analysis (CBA) has been the predominant tool used to examine the returns on investment of development interventions. CBA is a methodology that compares the costs incurred to implement an intervention relative to its impact, or benefits. In theory, the 'benefits' considered in a CBA can be holistic, in the sense of encompassing the maximum possible amount of outcomes. In practice, however, owing to an overwhelming focus on strict economic benefits, most CBAs tend to capture a relatively restrictive set of impacts<sup>10</sup>. As such, the application of CBA can skew the returns on investment of an intervention, since numerous non-economic, or less tangible, impacts are left aside and therefore become 'invisible'.

This is where SROI fits in: by refusing to consider *only* what is easier to measure (typically tangible economic impacts), SROI extends traditional CBA by including harder-to-measure impacts into the equation, such as well-being and empowerment. SROI is based on the principle of 'measuring what matters', whereby the outcomes and impacts included in a return on investment analysis are those considered important by stakeholders themselves – regardless of whether or not these are tangible and easy-to-measure<sup>11</sup>.

Reviewing the existing literature to date, we found no application of SROI to ECD interventions. To provide context for this research we briefly reviewed a sample of existing research into returns on investment in ECD. The objectives of this brief review were:

- To critically examine the application of CBA in the context of ECD programs, including their strengths and weaknesses.
- To position the present research by comparing with previous analyses. We are particularly interested in how the application of SROI differs to existing CBAs of ECD programs.

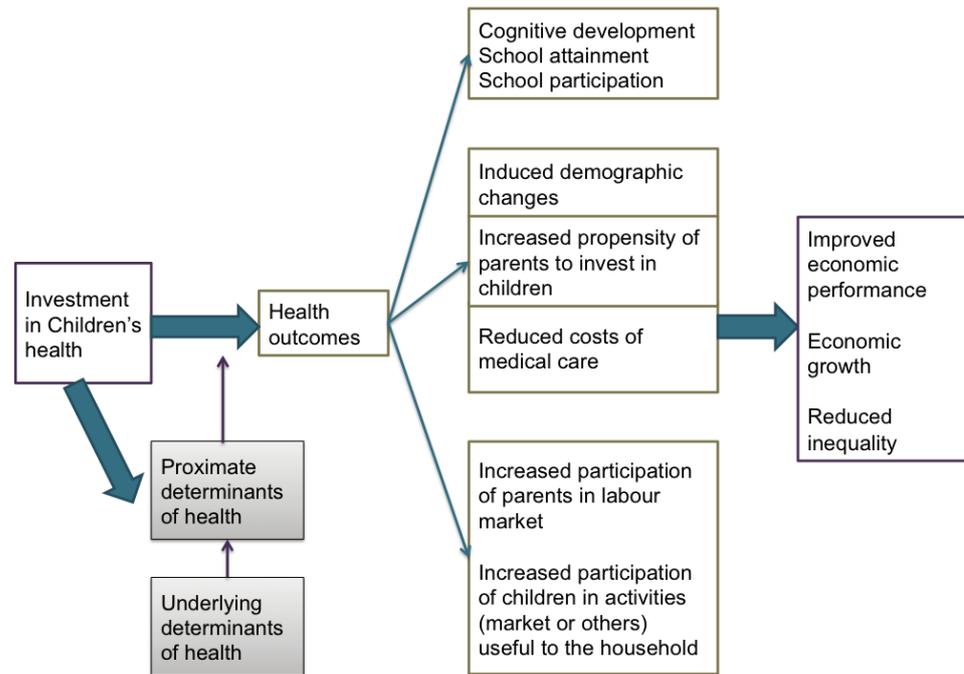
### 2.1 A typology of impacts considered in previous analyses

Investing in ECD potentially induces a number of economic benefits to accrue for direct beneficiaries of interventions as well as the broader society and State in question. The World Health Organization has synthesized the routes through which investment in children's health can enhance economic development, see Figure 2. Although the present study does not deal with ECD interventions per se, this type of approach has been replicated by most CBAs applied to ECD programs or interventions.

<sup>10</sup> Vardakoulias, O (2013), NEF Economics in Policy-Making No 4: Social cost-benefit analysis and SROI, New Economics Foundation. Available at: [http://b.3cdn.net/nefoundation/ff182a6ba487095ac6\\_yrm6bx9o6.pdf](http://b.3cdn.net/nefoundation/ff182a6ba487095ac6_yrm6bx9o6.pdf)

<sup>11</sup> Lawlor, E., Nicholls J., and Neitzert, E. (2009), Seven principles for measuring what matters: A guide to effective public policy-making. New Economics Foundation (NEF) report. Available at: [http://b.3cdn.net/nefoundation/8a00225ba456155613\\_xum6bzye0.pdf](http://b.3cdn.net/nefoundation/8a00225ba456155613_xum6bzye0.pdf)

Figure 2: The impacts of investment in children's health according to the WHO



Source: World Health Organization

In short, existing research measures two intertwined dimensions:

1. The extent to which children will grow into adults who have participated in education and will therefore be in a better position to compete within labour markets, extrapolating the methods used in the economics of education.
2. The extent to which a more healthy labour force translates into increased productivity, and hence broader economic returns accrue to society as a whole.

As a World Bank report puts it:

“Strong evidence shows that nutritional failure during pregnancy and in the first two years of life leads, ineluctably, to lower human capital endowments, negatively affecting physical strength and cognitive ability in adults. This feeds directly into the reduced earnings potential of individuals and damages national economic growth and competitiveness potential.”<sup>12</sup>

Under this narrative, investing in ECD is thought of, and conceived as, an intermediary step to enhance economic growth, the latter being the ultimate objective. This narrative has been adopted by, and reproduced in, the vast majority of socio-economic analyses empirically analyzing the returns to ECD interventions. Table 2 provides a synthesis of the major benefits considered in a sample of influential CBAs which analyse the returns to ECD.

12 The World Bank (2007), Nutritional Failure in Ecuador, Causes, Consequences and Solutions, The World Bank, USA.

Table 2: A typology of benefits considered in a sample of previous return on investment research

Country	Typology of benefits considered	Reference
<b>USA</b>	Returns/Benefits to direct beneficiaries via increased earnings across lifetime Returns/Benefits to taxpayers via: <ul style="list-style-type: none"> <li>■ Taxes on earning</li> <li>■ Avoided welfare costs</li> <li>■ Avoided crime costs</li> <li>■ Avoided criminal justice costs</li> </ul>	Melhuish, 2004 <sup>13</sup>
<b>USA</b>	Returns/Benefits to direct beneficiaries via increased earnings across lifetime Returns/Benefits to parents via increased earnings Returns/Benefits to taxpayers via: <ul style="list-style-type: none"> <li>■ Avoided spending on special education</li> <li>■ Avoided spending on healthcare in the future</li> </ul>	Melhuish, 2004 <sup>14</sup>
<b>Bolivia</b>	Benefits to direct beneficiaries via direct service delivery (meals and health services) Benefits to society via increased productivity across life span Returns/Benefits to taxpayers via reduced fertility of girls/women (avoided taxpayers costs)	van der Gaag & Tan, 1998 <sup>15</sup>
<b>Turkey</b>	Benefits to direct beneficiaries via increased earnings across life-span – increased productivity through educational impacts	Kaytaz, 2004 <sup>16</sup>

Although the economic dimension of ECD is certainly of importance, it is also restrictive in evidencing the broader benefits of investing in ECD. Indeed, the type of impacts considered in most return on investment analyses contrast with the state of knowledge regarding the broader impacts of ECD, notably in terms of *social development* rather than *economic development only*. These broader impacts have been summarised by R. Myers, as synthesized in Table 3.

13 Melhuish, E.C (2004), Op. Cit.

14 Melhuish, E.C (2004), Op. Cit.

15 van der Gaag, J & Tan, J-P (1998), Op. Cit.

16 Kaytaz, M (2004), Op. Cit

Table 3: Broader impacts of ECD programs

Beneficiary Group	Area of Change	Indicators of Change
<b>Children</b>	Psychosocial development	Improved cognitive development (thinking, reasoning); improved social development (relationships to others); improved emotional development (self-image, security); improved language skills
<b>Adults (program staff, parents) and siblings</b>	Health and nutrition	Increased survival chances; reduced morbidity; improved hygiene; improved height and weight for age; improved micronutrient balances
	Progress and performance in primary school	Higher chance of entering; less chance of repeating; higher learning and better performance
	General health knowledge, general health attitudes and practices	Improved health and hygiene; improved nutrition (own status); preventive medical monitoring and attention; timely treatment; improved diet
	Self esteem Relationships Employment	Improved relationships between husband and wife, between parents and older children; caregivers freed to seek or improve employment; new employment opportunities created by program; increased market for program related goods
<b>Communities</b>	Physical environment Social participation Solidarity	Improved sanitation; more spaces for play; new facilities; greater female participation; greater demand for existing services, community projects benefitting all.
<b>Schools and health service facilities</b>	Efficiency	Better attention to health; changed user practices; reduced school repetition and drop out
<b>Society</b>	Effectiveness Capacity Practice and content	Greater coverage; improved ability, confidence or organization; methods and curriculum content
	Health and education status Participation Productivity Delinquency Fertility Equality	Fewer days lost to sickness; a healthier population; a more literate, educated population; greater social participation; a more productive labour force; reduced delinquency; reduced fertility; reduced social inequality

Source: Myers<sup>17</sup>

17 Myers, R (1992), *The Twelve Who Survive: Strengthening programmes of early childhood development in the Third World*. Routledge and Unesco: London & New York

The dissonance between what is included in return on investment analyses and the broader impact potential of ECD interventions, can have multiple causes. The most plausible interpretation however, is simply that tools traditionally used to assess returns on investment are ill-equipped to analyse broader, non-economic transformations brought about by interventions. Dealing with the social returns of the PIDI program in Bolivia, for example, van der Gaag and Tan assert that:

“Not all benefits of ECD programs are education-related. There are direct benefits to the child (e.g. meals provided at the ECD centres) and indirect benefits to society (e.g. greater community participation or lower future fertility rates). We try to catalog all benefits, but, again, are not always able to place a dollar value on them.”<sup>18</sup>

The difficulty of placing a value on less tangible impacts is seemingly one of the key causes of their exclusion. As such, when faced with a trade-off between either placing an inaccurate value on economically less tangible impacts or excluding hard-to-value impacts, researchers have chosen the latter. While there is certainly a technical rationale for doing so, the implications of excluding non-economic impacts from return on investment analyses are considerable, as this approach will:

- Artificially reduce the value of ECD interventions. This is particularly the case for those ECD interventions that have a weaker economic component (or physical health targets) and a stronger well-being or empowerment focus.
- Adopt a restrictive definition of social value, basically equating it with economic value or public accounting value (savings to the public purse).
- Can potentially exclude the impacts that stakeholders cherish the most, e.g. the value of emotional well-being, family relationships, social capital, public participation or a change in gender dynamics.
- Do not necessarily respond to the objectives set out by development actors when implementing ECD interventions. Indeed, these objectives can be rights-based (e.g. enhancing children’s and mothers’ rights) and/or empowerment-led. While these approaches (or objectives) can entail economic components, they are certainly not restricted to these.

Admittedly, whether certain impacts are included or excluded will depend upon the research question one is seeking to answer. One of the central questions of a return on investment analysis, for example, is to define *whose costs and whose benefits* the research is looking at. If the objective is to compare the costs to taxpayers of investing of ECD with the benefits to taxpayers of investing in ECD, then it makes sense to restrict the number of benefits and include only those relevant to taxpayers in a ‘cashable’ fashion (i.e. actual financial flows). However, the same analysis is very limited when bringing to light the value (or returns) generated for direct beneficiaries (e.g. children and parents) and local communities.

18 van der Gaag, J & Tan, J-P (1998), *The Benefits of Early Childhood Development Programmes: An Economic Analysis*, The World Bank

## 2.2 Key findings and lessons from existing research

The most basic condition for an intervention to be considered efficient and effective from a societal welfare standpoint is that the Present Value of its benefits should be higher than the Present Value of its costs. Put simply, this means that the value created by an intervention should be lower than the costs borne by society to implement it. Equally, this type of analysis allows researchers to evidence the amount of value generated for each \$1 invested in an intervention (the benefit:cost ratio). In this case, the condition for an intervention to be considered efficient and effective is that the benefits divided by the costs are greater than 1. Finally, this approach allows comparison of the relative returns of different interventions, e.g. some ECD programs might generate higher returns than other programs. However, comparisons are useful only insofar as the benefits and costs are considered in a uniform way, i.e. are common to multiple analyses. This is rarely the case.

The existing evidence suggests there has been very little application of cost benefit analysis on ECD programs in developing countries. Although these programs are not directly comparable to the Responsive Parenting Program, two notable exceptions are the evaluation of the PIDI program<sup>19</sup> in Bolivia and an evaluation of a Mother-Child Education Foundation's pre-school program in Turkey<sup>20</sup>. Both studies found that respective ECD programs are efficient and effective, although quantitatively they consider only a restrictive number of outcomes (see Table 2).

- The PIDI program provides food, basic health care and immunisations, and cognitive development services for children aged 6 months to 6 years. The aims of the program are broader than the development of children; they also seek to enhance the status of women through employment and by expanding their knowledge; and to increase the participation of the community and private sector in social development. The PIDI program is found to increase psychosocial development which translates into improved educational and earning outcomes. The outcomes are translated into the dollar values of increased future productivity. Wider societal health such as reduced fertility in girls as a result of participation in education and reduced infant mortality are also counted as benefits. The research found that the program is expensive to implement, partly due to the provision of two meals per day per child (which accounts for almost 40% of the total program costs). The research finds that for each \$1 invested in the PIDI program, between \$1.7 and \$3.7 of social value is generated.
- Kaytaz (2004) finds that investing in pre-school education in Turkey, by seeking to increase participation in education across the country, also yields positive returns: for each \$1 invested between \$1.1 and \$2.4 of social value is generated. The benefits considered in this analysis are even more restrictive than for the evaluation of the PIDI program: the study focuses on the extent to which the state could 'recover costs' as a result of increased attainment and therefore future productivity of beneficiaries. In quantitative terms, the benefits represent the difference between forecasted expected earnings of beneficiaries and a hypothetical scenario where these beneficiaries would not have attended pre-school.

19 van der Gaag, J & Tan, J-P (1998), The Benefits of Early Childhood Development Programmes: An Economic Analysis, The World Bank

20 Kaytaz, M (2004), A Cost Benefit Analysis of Preschool Education in Turkey Mother Child Education Foundation, Boğaziçi University

Beyond the substantial differences between these programs and the RPP, it is worth considering that the way through which these analyses calculate the expected benefits (e.g. in terms of earnings) is hypothetical, or assumptions-based. This is because it is based on an estimation of future average educational attainment, and how this educational attainment can, on average, be translated into higher incomes across the working life of individuals.

Whilst this hypothetical approach is sensible, given there is substantial evidence showing that investment in ECD does increase lifelong prospects on average, it can also be problematic.

Firstly, the fact that this assumption holds on average, does not mean that we can assume that *all* ECD programs will yield the same impacts *regardless of the context*. As such, if the objective of a return on investment analysis is to estimate the potential value-for-money of a specific intervention in order to evaluate it, then basing analysis on a forecast of average returns is likely to give a false impression of 'success' or 'failure'. i.e. it would be impossible to know whether this intervention *will actually* yield this income return.

Secondly, development actors need return on investment analyses which can allow them to a) evaluate the *actual (as opposed to hypothetical)* success or failure of different interventions in order to b) select those interventions that can deliver the higher returns (impacts) and/or c) improve existing interventions. In this circumstance, a hypothetical approach is unlikely to inform development actors and decision-makers on the ground.

Thirdly, this type of analysis assumes that data on longer-term impacts (e.g. long-run school performance of participants vs. non-participants) is already being / can be collected. This can only be done long after an intervention has been implemented, in order to observe the longer-run 'hard' health, educational and income effects. This means, in turn, that it would be impossible to track whether a program is 'on the right track' in delivering change on the short and medium terms, i.e. without waiting for many years to observe the effects. However, obtaining and tracking this short-term information is of critical importance for development actors in terms of program design and for understanding the relative performance of different programs.

## 2.3 Where can SROI contribute to understanding ECD programs?

Although this brief review of existing research is by no means exhaustive, it has highlighted a number of key issues.

- Existing return on investment analyses have dealt with a restrictive number of benefits (impacts), by and large those that are easier to quantify and value in monetary terms. This stems from a) a broader narrative which stipulates that investment in ECD is instrumental for economic growth, focusing more on strict economic development and less on social development, and b) from a difficulty to quantify and monetise less economically tangible outcomes.
- Despite the exclusion of numerous additional impacts of ECD, the returns on investment are still positive. This potentially means that by adding more very plausible benefits (impacts) into the equation, returns to ECD could be even more considerable.

- The existing approaches render the analysis of more short and medium term outcomes/impacts of ECD difficult, thus potentially being less useful to development actors who aim to understand the relative value-for-money of their investments and evaluate existing programs in order to a) improve program design and/or b) select those interventions that are likely to yield more success in terms of change.

Through the use of a Social Return on Investment (SROI) approach, this research aims to fill the gaps of existing literature by **broadening the analytical perspective through a quantitative consideration of those less tangible impacts often disregarded in existing economic analyses.**

Unlike traditional cost-benefit analysis, an SROI approach captures more than strict economic (productivity) returns (direct or indirect) by considering all impacts, tangible and less tangible, which are deemed valuable by stakeholders themselves. Such an approach allows us to unlock issues such as gender equality, empowerment and supportive relationships by expressing typically qualitative outcomes in a quantitative way. By taking this approach we aim **to bring to light all the short and medium-term impacts generated by ECD interventions for relevant stakeholders.**

The peculiarity of ECD interventions is that the transformations brought about by an intervention (e.g. health and educational impacts) can only become observable in the long run. This, however, can pose problems for policy-makers in terms of program design, since the effectiveness of an intervention can only be judged multiple years after implementation. By unlocking the process (building blocks) through which change is brought about (i.e. the logical links between short, medium and long-term outcomes) this analysis aims to investigate the extent to which a focus on short and medium-term changes can allow organisations to test whether and to what extent an intervention is on the 'right track' to deliver its longer-term objective. This sensibly differs from previous analyses which seem to assume a quasi-automatic causal link between activities happening now and long-term impacts, without considering the intermediate steps.

## 3. SROI Methodology

Social Return of Investment (SROI) is a form of cost-benefit analysis recognised by the Cabinet Office in the UK<sup>21</sup>. The method helps organisations manage the intangible, hard to measure, social and environmental value they create. Rather than simply focussing on cost savings, the methodology takes into account the full range of impacts that matter to the main stakeholders.

The SROI methodology includes all the stages of a robust, outcomes-based, impact evaluation. Its stages and guiding principles are summarised in Box 2. It surpasses conventional reporting frameworks, which tend to start by focussing on outputs; things that can be easily counted. Instead SROI seeks to measure the actual *changes* experienced by key stakeholders.

Once the key changes have been identified, they are valued by providing an equivalent monetary value for the social and environmental benefits (or costs). By putting all the outcomes into the same metric it is possible to measure across different domains of value in a common and relatable form.

Box 2: Stages and principles of SROI

The stages of an SROI analysis	SROI guiding principles
1. Establishing scope and identifying stakeholders	■ Involve stakeholders
2. Mapping outcomes	■ Understand what changes
3. Evidencing outcomes and giving them a value	■ Value what matters
4. Establishing impact	■ Include only what is material
5. Calculating the SROI	■ Avoid over-claiming
6. Reporting, using, and embedding	■ Be transparent
	■ Verify the result

Further detail on the SROI methodology is included in Appendix I.

### 3.1 Stages 1 and 2: Setting parameters and Theory of Change for the SROI

#### Setting the scope

Prior to commencing the research, we were provided with details of the program, activities and number of participants.

During the inception stage, it was agreed that the research would focus on the program delivery in the Carchi region of Ecuador. It was felt that an in-depth study on one region would offer ChildFund more insight into the impacts of its programs on marginalised communities. This region was selected on the basis of the consistency of delivery across the region (i.e. it focuses solely on parenting education), the number of program participants, and previous

<sup>20</sup> For full details of the SROI methodology, see the Cabinet Office guide to SROI: [www.neweconomics.org/publications/guide-social-return-investment](http://www.neweconomics.org/publications/guide-social-return-investment)

evaluative work that had been undertaken.

The timeframe and scope for analysis were activities between 2010 and 2013. This reflected a time period during which medium-term changes could be measured, without other activities that participants engage in significantly affecting the results.

### **Theory of Change for the SROI**

A Theory of Change defines the building blocks required to bring about a long-term goal. It is linked to the program logic model, but moves beyond articulating the links between inputs, outputs and outcomes to articulating ‘how’ and ‘why’ change is expected.

A Theory of Change for the SROI was developed through focus group discussions, program documentation, and interviews with key experts involved in the design and implementation of the program.

Refinement of the Theory of Change for the SROI and understanding of the outcomes was undertaken through focus groups with stakeholders in the Carchi region. This included trainers, mother guides, participants and the community leader. A full list of stakeholder engagement can be found in section 4.2 and Appendix I.

The final Theory of Change for the SROI for each stakeholder was mapped diagrammatically to show how change happens over time.

## **3.2 Stage 3 and 4: Data collection (sampling, indicators and valuation)**

### **Indicators**

Appropriate indicators to evidence outcomes were selected, drawing upon data available through the program. Where possible, indicators and data from existing surveys were used. Where gaps existed, new questionnaires were created (see Appendix II for questionnaires for participants and trainers). Questionnaires were cognitively tested with the program staff to ensure a common understanding of each question.

Additional impact data, such as attribution, benefit period, and drop-off, were generated through stakeholder focus groups and secondary research.

### **Data collection and sampling**

Questionnaires were administered to parents by the researchers and ten local community mobilisers, across communities in the region. The sample was constructed using a convenience sampling approach and consisted of parents who had participated in the program between 2 and 5 years previously.

### **Valuation**

A range of techniques were employed to value the different outcomes and these are detailed further in Appendix I. Principal among these were Willingness to Pay (WTP) and Choice experiments, both of which are a form of stated preference valuation. Valuation exercises were conducted with parents and trainers and were included in the questionnaires.

### 3.3 Stage 5: Model and calculate

All the data (indicator, impact, and investment) and projections (benefit period and drop-off) were modelled using an Excel-based cost-benefit model. The model produced:

- SROI ratios for the program, based upon three discount rates;
- Distribution of value across stakeholders;
- Distribution of value across outcomes by stakeholder;
- Comparisons of gross and net change for indicator.

### 3.4 Stage 6: Reporting and learning

The results were shared with stakeholders from Childfund International and Childfund Ecuador and their responses have been taken into consideration in this final report.

Key elements of this report include:

- The Theory of Change for the SROI: the hypothesis we are testing;
- The evidence to support the Theory of Change for the SROI. The distribution of value by outcomes and stakeholders;
- The cost effectiveness of the initiative: the SROI ratio, tested for sensitivity across three discount rates.

The report will be shared with international, national and regional staff to help inform decision-making.

## 4. How does the Responsive Parenting Program create change?

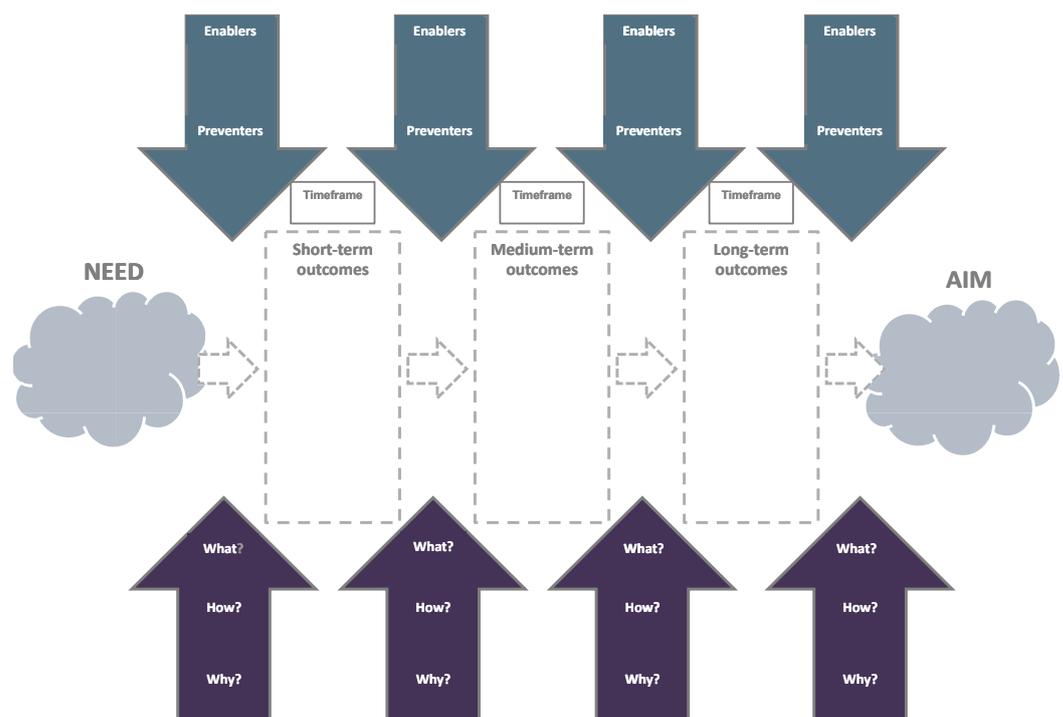
In this chapter we set out an understanding of how the Responsive Parenting Program (RPP) can create change in the lives of children, parents, trainers and communities. By setting out the hypothesis of changes that occur, we can measure the extent to which these outcomes are achieved, and ultimately understand the extent to which the program is effective at delivering change – in the short, medium and long term.

### 4.1 What is a Theory of Change?

This research is underpinned by a clear understanding of the Theory of Change (logic model) of a policy or intervention. A Theory of Change for an SROI defines the building blocks required to bring about a long-term goal. It is linked to the program logic model, but moves beyond articulating the links between inputs, outputs and outcomes, to include 'how' and 'why' change is expected. This theory is tested through rigorous measurement to understand the extent to which the RPP creates the intended change. By moving beyond program components it can help to strengthen understanding of how and why the program is or is not effective.

In developing the Theory of Change for the SROI, we draw upon Figure 3 - the Theory of Change approach developed by NEF Consulting.

Figure 3: An overview of the Theory of Change for the SROI approach



This diagram presents a simplified way in which to understand change. In most social programs change is not linear, and short or medium-term outcomes have a catalytic or reinforcing effect; however, to aid the measurement of change, we present change chronologically, as we understand it.

It is important to note that ChildFund International's use of the term 'Theory of Change' refers to the holistic development of an entire life stage of a child or youth: 0-5 years old, 6-14 years old, or 15-24 years old. This helps ChildFund to tailor its approach to the different developmental tasks and needs of children and youth in each stage of life, while remaining holistic in its thinking about child development and social change for children. For individual projects or interventions, ChildFund tends to use the terms 'logic model' or 'results framework'. Similarly, when ChildFund uses the term 'program' it refers to the entire set of projects, initiatives, and other pieces of work in a given life stage. The RPP is, therefore, rather an individual project implemented as part of the 0-5 years of age life-stage program, guided by the 0-5 years life-stage Theory of Change. We refer to this project as the Responsive Parenting Program in order to remain closer to its title in Spanish.

## 4.2 Engaging stakeholders

Engaging individuals who experience change is vital for understanding what matters and developing a Theory of Change for a Social Return on Investment (SROI).

Stakeholder engagement focused initially on discussions with strategic level staff at ChildFund.

- Staff from ChildFund International:

- Unlocking Potential ECD Campaign Director

- Senior Impact Assessment Specialist

- Impact Assessment Specialist

- Infants and Young Children Technical Team Program Officer

- Americas ECD Regional Advisor

- Americas Regional Program Manager

- Staff from ChildFund Ecuador:

- National Director

- National Program Manager

- Technical Specialist for Infants and Young Children (life stage 1)

Through a two-day facilitated workshop these stakeholders identified the following persons and/or groups as those who had experienced and impact as a result of the RPP, see Table 4.

Table 4: Stakeholders to be included in the SROI analysis

Group	Description <sup>22</sup>
<b>Children</b>	Children are the primary intended beneficiaries of this program. The children involved in the program have been identified as being in need of support due to experiencing “deprivation, exclusion and vulnerability”.
<b>Parents (primary caregivers)</b>	Parents who participated in family training programs within their communities, but did not have leadership roles as Trainers or Mother Guides. In some cases, other family members participated in the training, but for the purposes of engagement and data collection they were classified under ‘parents’.
<b>Trainers</b>	Trainers are volunteer parents who have been selected by their communities to lead family training programs. They receive 8-10 months of training from local ECD specialists, based within the Federation and, while receiving training, they replicate the program content with a group of 9-15 parents within their own communities.
<b>The Community</b>	‘The Community’ is a collective term for the local people in the areas where RPP is implemented. It represents the wider group of families with children under 5, within the area, and those involved in the Community Associations (if not part of the previously mentioned groups).

These groups were deemed material to the analysis – the accountancy term for ensuring that all the areas needed to judge an organisation’s overall performance are captured by the analysis. They were deemed material due either to their close relationship with the target population or because they were significant in terms of numbers.

The groups in Table 5 were not deemed to be material to the analysis.

<sup>22</sup> Descriptions adapted from Table 1, Petrova, V and Lee, B (2013), Empowered and responsive parenting, ChildFund International Research Report, ChildFund International, USA

Table 5: Stakeholders not included in the analysis

Group	Reason
<b>Mother/Father Guides</b>	<p>Mother/Father Guides are volunteer women or men who receive training from local ECD specialists and serve as community focal points for Child Protection. The Guides also support parents to focus on positive growth and development for children: understanding developmental milestones; providing developmental stimulation; etc. The Guides conduct regular home visits and complete family surveys, share information about community events, detect and monitor risks, and work with the Local Committee to develop strategies to reduce risks.</p> <p>It was agreed that this group should not be included, as many Mother/Father Guides had previously been trainers, and as such there would be duplication in the measurement of outcomes. In addition, the Mother/Father Guides play a much broader role within the community.</p>
<b>Members of Federation of Community Associations</b>	<p>Elected leaders and representatives from local community organisations who meet together at provincial level to develop action plans and execute projects in the interests of improving the well-being of children and families.</p> <p>It was felt that this group was not personally impacted by the program in such a significant way that could not be covered by 'The Community' as a composite stakeholder.</p>
<b>ChildFund Program Staff</b>	<p>ChildFund Staff are involved in supporting the program's technical implementation at a national level, and as such, do not experience material changes. The program does not intend to create change for staff.</p>

The initial background research and the two-day workshop with strategic staff were used to identify outcomes and areas to be further explored within the community. The workshop was also used to refine an understanding of the activities and external factors that help and hinder program delivery.

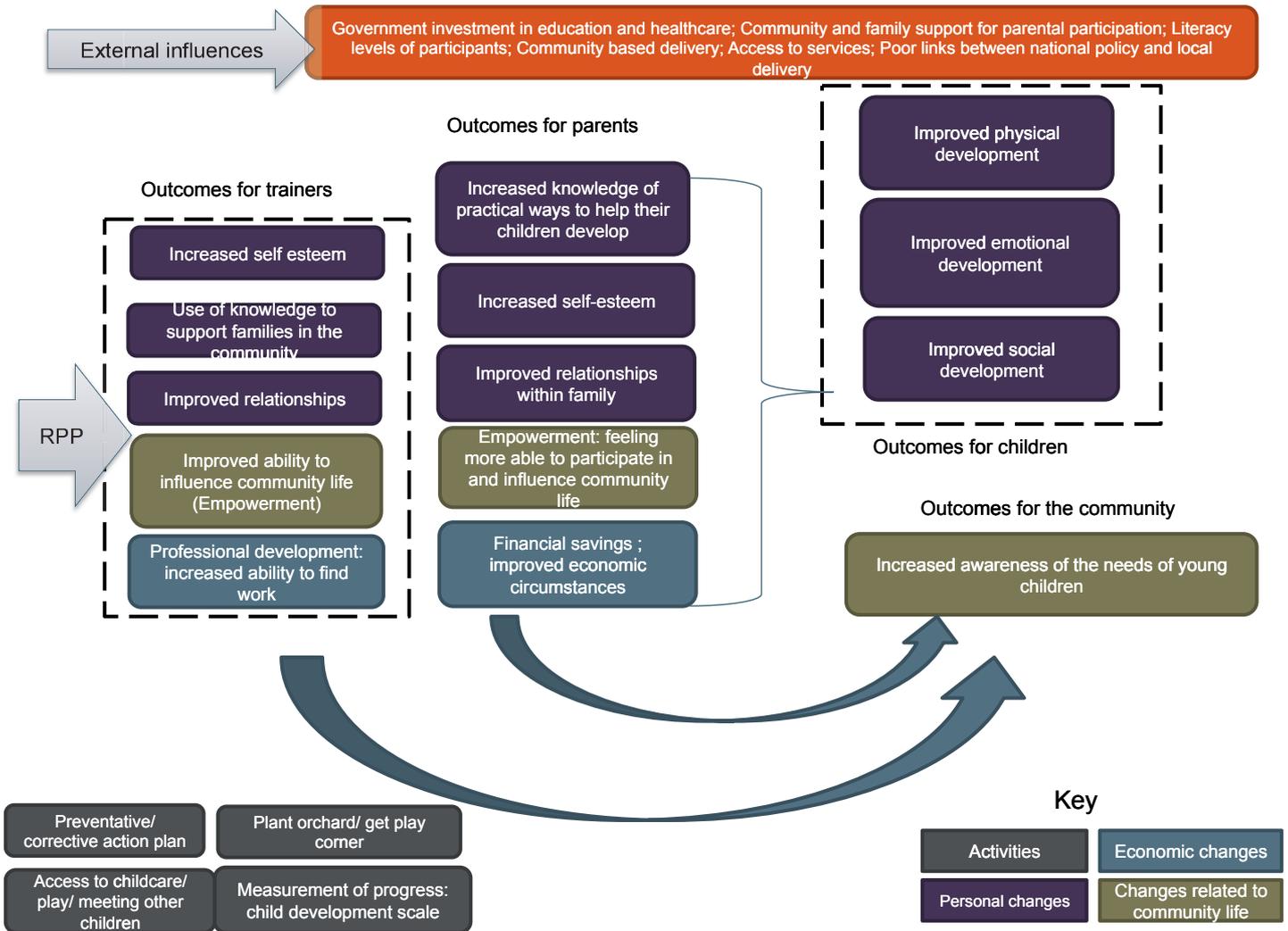
Refinement of the Theory of Change for the SROI and understanding of the outcomes was undertaken through focus groups with stakeholders in the Carchi region. This included trainers, mother guides, participants and community leaders. A full list of stakeholders engaged can be found in Appendix I.

### 4.3 The RPP's Overall Theory of Change for the SROI

The program's overall Theory of Change for the SROI is presented in Figure 4. This sets out a high level of understanding of how the program can create change for all of the stakeholders, as defined by those stakeholders (except in the case of children, where change was defined by other material stakeholders due to their age). **These are the changes that stakeholders define to be most important to them;** and as such may exclude some activities, actors or anticipated outcomes that can be expected from a strategic perspective.

The specific changes that each group experiences are set out in section 4.7; this initial overview shows our understanding of the changes that the program can create as a result of its activities, and how the changes for each group **create change for other stakeholders**. These are the changes that we will seek to measure in the SROI analysis.

Figure 4: The RPP's overall Theory of Change for the SROI



#### 4.4 Need for RPP

Children under 5 years old represent 10.2% of the population in Ecuador (2012)<sup>23</sup>. Primary research conducted by ChildFund<sup>24</sup> found that 85% of children under 5, in the communities they work in, had psychomotor delay and health and nutrition problems. In addition, there was a high incidence of acute respiratory and intestinal infections, which is closely associated with low nutritional status.

A study by the World Bank<sup>25</sup> in 2007 noted a lack of childcare and pre-school activities in rural communities. In addition, the provision of local healthcare was patchy; staff hours and resources were restricted. Anecdotal evidence<sup>26</sup> from those involved in the RPP in Carchi explained how doctors would be available on one day of the week and were based solely in the health centre; there were

23 Unicef (2013), Ecuador country statistics. Retrieved from: [http://www.unicef.org/infobycountry/ecuador\\_statistics.html](http://www.unicef.org/infobycountry/ecuador_statistics.html)

24 Guevara Castro, N (2012) Document on the Best Practices in the Early Childhood Development Program, ChildFund Ecuador.

25 The World Bank (2007), Nutritional Failure in Ecuador, Causes, Consequences and Solutions, The World Bank, USA

26 Gathered during a visit to a Centro de Salud, San Gabriel/ La Paz, February 10th 2014 and during the focus group with international and national ChildFund staff, Quito, February 4th 2014

no home visits. Clinical and program staff reported that parents did not participate in the community and as such, children were not accessing formal educational and health services.

In addition, there are multiple challenges that parents and families face on a day-to-day basis. Data from 2007<sup>27</sup> found that the poverty rate in rural areas remains at around 53% (compared to 22% in urban areas). Anecdotal evidence from those involved in the program suggests that families living in remote communities have few or no opportunities to participate in educational and health services. This is due to the physical proximity of services in disparate communities; comprehensive services do not always reach rural communities to the same extent as in more densely populated areas.

There has been a significant investment in public services to support children and families in Ecuador in recent years<sup>28</sup>. In 2008 the new constitution of Ecuador defined the human rights approach to policy and redefined the rights of children. The National Plan for Good Living (Plan Nacional de Buen Vivir, 2008) sets a target of 75% of children to be involved in child development services by 2015; chronic malnutrition is to be reduced by 45% by 2013 and early neonatal deaths reduced by 35% by 2013, among other targets<sup>29</sup>. The investments by the successive governments are paying dividends: primary school net enrolment ratio (%) between 2008 and 2011 was 98.6%<sup>30</sup>, immunisation rates for major diseases (TB, Diphtheria, Polio, Hepatitis) was 98-99% in 2011, with 85% of newborn babies also immunised against Tetanus.

However, the investments made by the Government will take some time to achieve full coverage, and there can be a mismatch between the availability of public services and the extent to which local people use them, as described by staff involved in the program. The scattered rural communities are often unconnected, “they are the most affected by shortages, which causes the population to be excluded mainly from health and education services, a situation that turns them even more vulnerable due to the lack of information and capacity to respond to the adversities of poverty.”<sup>31</sup>

## 4.5 Aim of RPP

The aims of the program have been articulated at a strategic level by ChildFund staff working at an international, national and local level. Overall, the program is intended to enable infants and young children to be healthy and secure, and develop to their full potential, relative to their life stage. In the longer term it is hoped this will enable them to grow up to be educated and confident children, and skilled and engaged youth, serving as agents of positive change for themselves and their communities. It is about **helping children thrive**.

27 Guevara Castro, N (2012) Document on the Best Practices in the Early Childhood Development Program, ChildFund Ecuador.

28 Ray, R & Kozameh, S (2012), Ecuador’s Economy since 2007, Center for Economic and Policy Research, Washington DC. Available at: <http://www.cepr.net/documents/publications/ecuador-2012-05.pdf>

29 The National Strategy for Well-Being report is available at: <http://www.buenvivir.gob.ec/versiones-plan-nacional;jsessionid=65291690B842D1614E0A50E86B647207>

30 Unicef (2013), Ecuador country statistics. Retrieved from: [http://www.unicef.org/infobycountry/ecuador\\_statistics.html](http://www.unicef.org/infobycountry/ecuador_statistics.html)

31 Guevara Castro, N (2012) Document on the Best Practices in the Early Childhood Development Program, ChildFund Ecuador (p.12).

A number of strategic long-term objectives were identified by ChildFund staff involved in the program:

- Children are given the opportunity to develop; they meet developmental milestones for the early years, which will help them to achieve in the next stages of their lives;
- Adults involved in the program become leaders in their communities;
- Both children and adults involved in the program increase their participation in the community; they feel they have agency (the opportunity and skills to be able to articulate their preferences and interests, and act upon these);
- Both children and adults have a greater resilience to their economic and social situations; they are able to challenge and break negative cycles. There is inter-generational change;
- There is an improvement in the attitudes and practices towards promoting the rights of children within communities, and reducing the risks to and incidences of violence.

These aims and objectives are the aspirational goals that those involved in the program wish to see over time. However, in this research we present the incremental steps that need to happen in order to reach those long-term goals. Section 4.7 sets out what each stakeholder hopes the program will achieve in the short, medium and long term.

## 4.6 How RPP creates change

The program responds to the needs of local communities and the resources available to them. It uses a set of principles and proven practices that have been developed and refined since the program started in the 1990s. There are a number of elements to the program, which ChildFund staff perceive to be key to its success. This is not a comprehensive list of all elements of the program, but is intended to illustrate the *what, how and why* part of the Theory of Change for the SROI.

- The aim of the program is to promote child development by **supporting the primary caregiver**. It is hoped that by increasing the skills of the primary caregivers (parents), they can immediately implement this learning with their children.
- The program **works with communities**, building on existing local structures such as the community network and existing health and social care services. It appreciates that in each location there will be different cultures and traditions, and parents will have different starting points in terms of their skills and confidence in supporting their children.
- The **key messages have been developed by international experts**. The ways in which these messages are delivered has been tested and refined since the program started in 1991. The original themes responded to the interests of mothers: understanding physical aspects of development (especially nutrition) and children's rights. These have been expanded to incorporate elements of social and cognitive development. The tools used to share messages are intentionally engaging and playful, mimicking the way in which children learn, through play. This 'popular education' methodology is

used widely with adults with low education levels.

- The way in which the messages are delivered is **respectful of family situations**; the program goes to where parents are; there is time for the parents to reflect on the key themes and there are practical things that the whole family can do together.
- Training sessions give parents **time and a safe space** to consider issues that affect their family. Challenging topics which affect all members of the family such as domestic violence are viewed in terms of how they affect the child, which can give legitimacy to action. Learning together gives them a chance to reflect on their situation and understand they are not alone.
- In addition to the training, **parents are also supported in their homes** through visits. Mother Guides have a nucleus of households which they cover and visit on a regular basis, working with caregivers and their children to support the attainment of the next development milestone.
- **Children's progress is measured in a way that is meaningful** to different stakeholders. A panel of international experts, including ChildFund representatives, developed a measurement scale which encompasses the five elements of development. The resulting tool does not use a clinical approach to measurement, it uses indicators of behaviours that children should exhibit, which can be used within communities. This gives parents an understanding of what children should be able to do, in terms that they can understand.

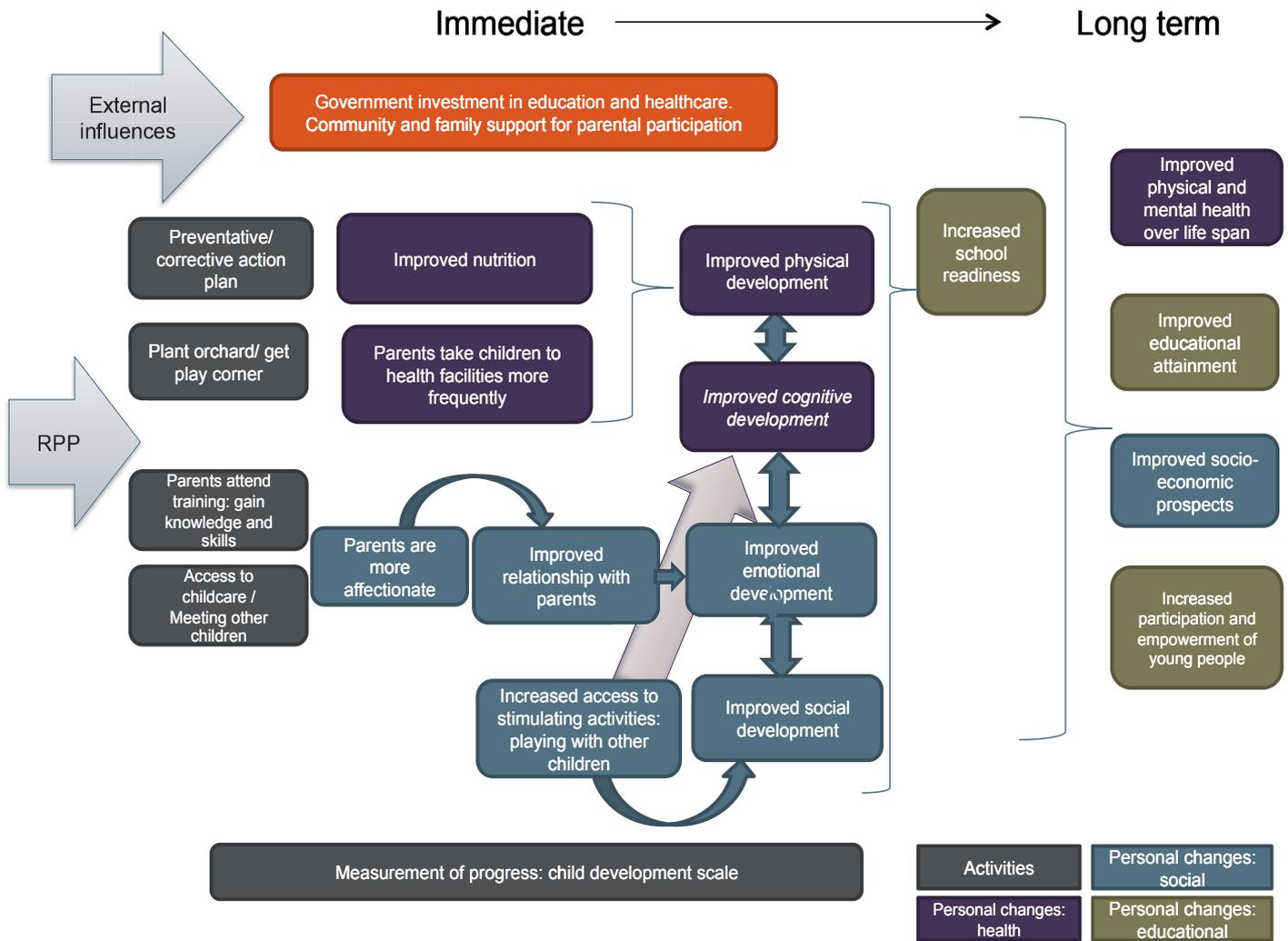
## 4.7 Understanding change over time

Each stakeholder experiences different changes at different time periods. This section explains in detail the outcomes experienced by children, their parents, the trainers and the wider community.

### Changes for children whose parents participate in the training

Due to the age, the children are the only stakeholder group who have not been consulted to define their own outcomes. Their anticipated outcomes have been determined as a result of qualitative research with parents, trainers, child development experts, and program coordinators. In some cases, specific developmental outcomes have been verified by empirical research. Quotes are used throughout to illustrate how other stakeholders described the changes they saw in children. These quotes were gathered from parents of children who had previously participated during focus groups. The Theory of Change for the SROI for children is presented in Figure 5.

Figure 5: Anticipated outcomes for children involved in the RPP



*Short and medium-term changes*

At the start of the program, children are assessed according to their developmental status. This helps parents, with the support of RPP staff/ volunteers, to put together an action plan to maximise healthy development, ensure children meet (and in some cases, exceed) milestones and therefore reduce the chance of developmental delay. Parents learn in the workshops what development should look like, and what they can do practically with their children.

The parents’ increased knowledge of health and educational needs **increases children’s access to relevant health and education services**. Parents have more awareness of when and where to access health support for their children and where educational activities may be taking place. They may also gain access to additional nutritional supplements through health centres. These, combined with the planting of fruit and vegetables, contribute towards an **improved nutritional intake** for children.

As a result of their parents attending the training, children experience an **increase in their access to activities which can stimulate development**, especially play. The training teaches parents to understand the life stages and developmental sequence, and the need for children to relate and share with

others to ensure their social development. It also gives them practical ways to apply their learning in the home, such as through songs and play and through making toys together from household items. Anecdotal evidence suggests that opportunities for children to play in rural communities are very limited, with some parents becoming very emotional during the training as they recall a lack of play in their childhood and think of ways that they can now help their children to explore through play.

“She learned how to be more creative.”

“His self esteem improved, he now has more contact with other children and is making friends.”

Accessing childcare with other children during the training and/ or designating of a play corner within the house **further reinforces the number of opportunities that children have to play and learn.**

“They learned to be more careful with their things and [to understand that] they have to share with others.”

These increased opportunities to access nutrition, stimulation and professional support mean that children have **improved physical development** (in terms of gross and fine motor skills and nutrition) and **improved cognitive and social development** (communication/ language and social/ emotional skills). It is important to note that *parents* (and other caregivers) described many behavioural changes related to social and emotional developments, but not those attributed to ‘cognitive’ development. Our broadening to wider cognitive developments as *intended* outcomes is derived from those ECD experts who participated in the development of the Theory of Change for the SROI.<sup>32</sup>

“Both his/her fine and gross motor skills improved.”

As a result of the training, there is more communication between parent and child and their **social and communication skills increase**. This, in turn, can increase children’s vocabulary; they learn more words and their ability to communicate improves. ChildFund staff report that in rural communities, children are often expected to be silent or not in the way. The training helps parents to understand why they need to change their attitudes to this. In addition, some parents described gaining an understanding about appropriate ways in which to discipline their children through positive reinforcement, rather than physical punishment. For these parents, their increased ability to communicate with their children further stimulates their child’s communication skills.

Through play and other activities together and increased frequency of communication, the children have an **improved relationship with their parents** and an increased quality of their home environment.

“He is more affectionate with us, his parents”

In the medium term, children experience an **improvement in their overall development**, across physical, emotional, cognitive, and communication spheres. This helps them to **become ready for school**; they have the attitude and skills to be able to learn in the school environment.

<sup>32</sup> As these changes were not reported by the parents, and the data collection focused on self-reported change by the parents, a decision was taken not to include this outcome in the measurement approach, thereby making the overall result perhaps more conservative.

“They have the motivation to learn. There is a visible change in terms of being ready for school.”

Overall, all these changes can contribute to children becoming **ready to attend school**; they have developed the skills they need to be able to start learning in a formal environment.

#### *Longer-term anticipated changes*

The longer term changes were articulated by stakeholders from ChildFund, based on their understanding of early childhood development. Additional empirical research further reinforced an understanding of the long-term changes that may occur.

**Improvements to their longer term mental and physical health** as a result of improved relationships, nutrition, and access to appropriate health and educational services are expected to last over their lifetime. This in turn is expected to **improve educational attainment**. There is significant evidence<sup>33</sup> to show that ECD programs can have a positive effect on educational attainment. As referred to in Chapter 2, improved health and educational achievement is proven to **improve the socio-economic prospects** of individuals, as they are able to access higher level jobs, be more productive and less susceptible to health issues.

It is anticipated that as a result of their parents becoming more active, and increased socio/emotional/ communication development, young people feel confident and have the skills to **participate in and lead within their community**. They feel that they are able to share their opinions and preferences and act as role models for younger children. The positive experiences of early childhood stimulation and support will, in turn, help them to become better parents once they become adults.

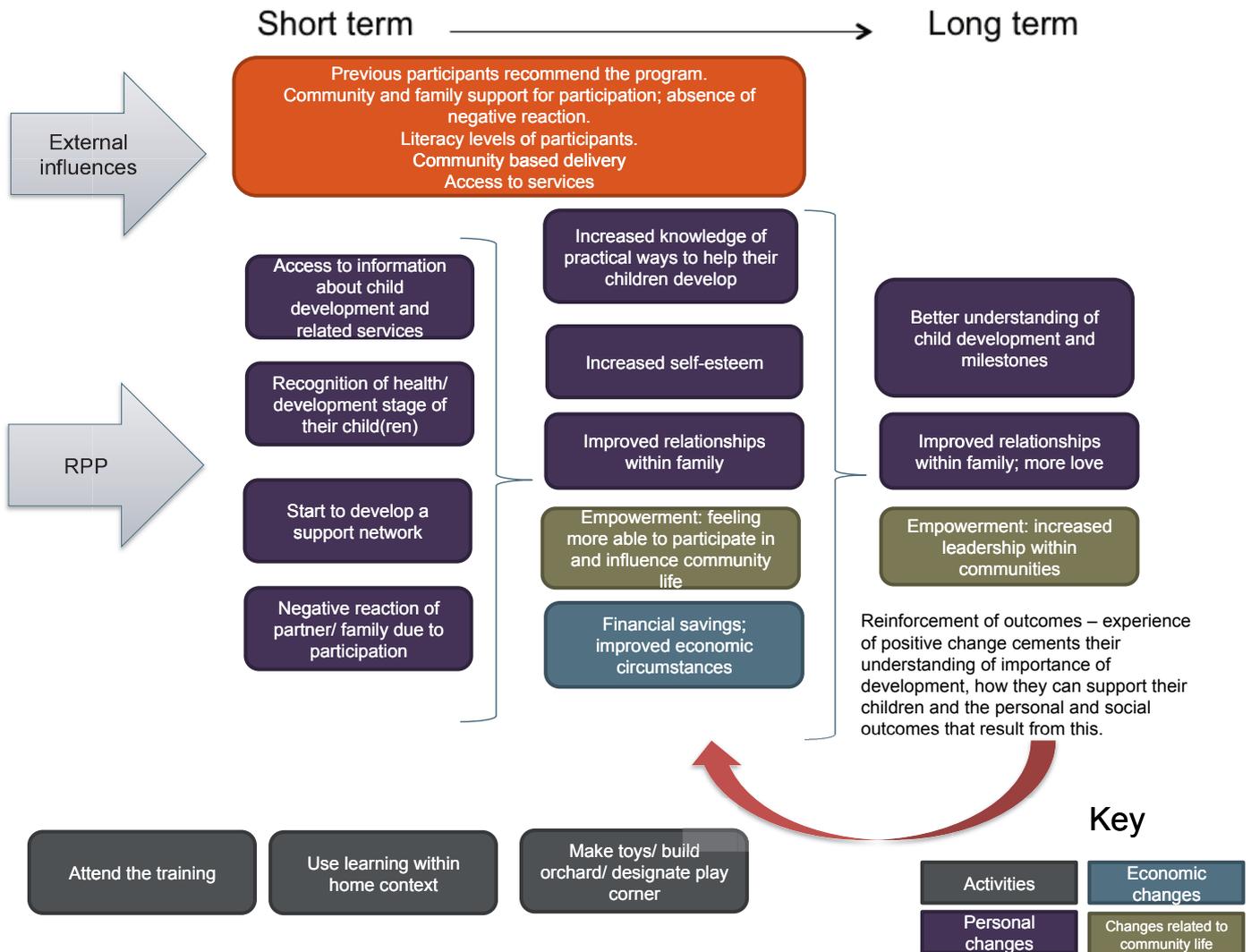
“He has more confidence.”

#### **Changes for parents who participate in the program**

Parents are the stakeholders who receive the most direct support from the program; their achievement of outcomes is instrumental in delivering change for children and the wider community. The Theory of Change for the SROI for parents is presented in Figure 6.

33 A summary of evidence of the benefits of ECD programmes on educational attainment can be found in: van der Gaag, J & Tan, J-P (1998), The Benefits of Early Childhood Development Programmes: An Economic Analysis, The World Bank

Figure 6: Changes for parents involved in the RPP



*Short and medium-term changes*

Initial and tangible changes for parents relate to an **increase in their understanding of child development, and the relevant health, educational and child protection services** which are available to support them and their child(ren). This increased knowledge, alongside the assessment of their child(ren), helps them to gain a **recognition of the health and development stage of their child(ren)**, how they can practically support their healthy development, any risks that they face, and whether any corrective action needs to be taken.

The increase in knowledge of services and experience of learning together with other local parents helps participants to start to **develop a support network**; where they can share their experiences, and advance together. The classes once a month are viewed as a safe space in which they can learn and seek advice and guidance on their own personal circumstances. This helps to maintain engagement and commitment.

As parents progress through the training, they **learn more about the practical ways** in which they can use their theoretical knowledge of development within

their own family (increased skills and knowledge). They are given support as they learn games and activities that they can do with their children. They also make toys and are advised to designate a space within the home that children can use for play and, where possible, are supported to develop a vegetable garden or orchard to grow food for their family. The knowledge and experience of trying new things with their children helps parents to change their habits and approaches to childcare and gain the confidence to use local services.

“They help us, the parents, make the toys for our children”

“They helped us [provided us] with educational materials in the school of my community”

Parents (and other stakeholders) universally stated that participating in the training helped to **increase their self-esteem**. The combination of knowledge, testing that knowledge, and the ongoing supportive network, helps them to be confident in supporting their children.

For those parents who have land to develop a vegetable garden or orchard, the produce that results can help to reduce the money they spend on fruit and vegetables, or may supplement their income if they sell the surplus. The parents have **financial savings**.

*“With the creation my garden I realized that sowing is better than just buying [fruit and vegetables]”*

Parents begin to express their feelings to their children; they start to communicate more verbally, and in actions, and as a result there are **improved relationships within the family**. Positive communications and interactions within the family reinforce other skills parents acquire, such as how to support their child to learn. In addition, positive relationships reduce the risk of toxic stress, which is caused by violence in the home. This in turn can increase children’s capacity to learn. In summary, the positive relationships further reinforce other outcomes.

“To give more positive feeling and love each day to my children, and them to me”

As a result of their increased confidence, increased skills and experiences, and support network, the parents feel more empowered to **participate within their community**. They have the confidence to share their opinions, feel they have the skills to make decisions and offer advice and, especially in the case of many women, feel that they have a **greater role to play**, outside of the home environment.

### *Longer-term changes*

In the longer term, parents continue to gain a **better theoretical and practical understanding of child development and milestones** and the importance of supporting these. They understand the importance of play, education and rights in the development of children. They start to share this information with others in their family and community. There is also an increased awareness of family planning.

Parents continue to develop their communication skills; they express their feelings effectively and learn to dedicate time to spending with their children. **This further reinforces their relationships; there is more love.**

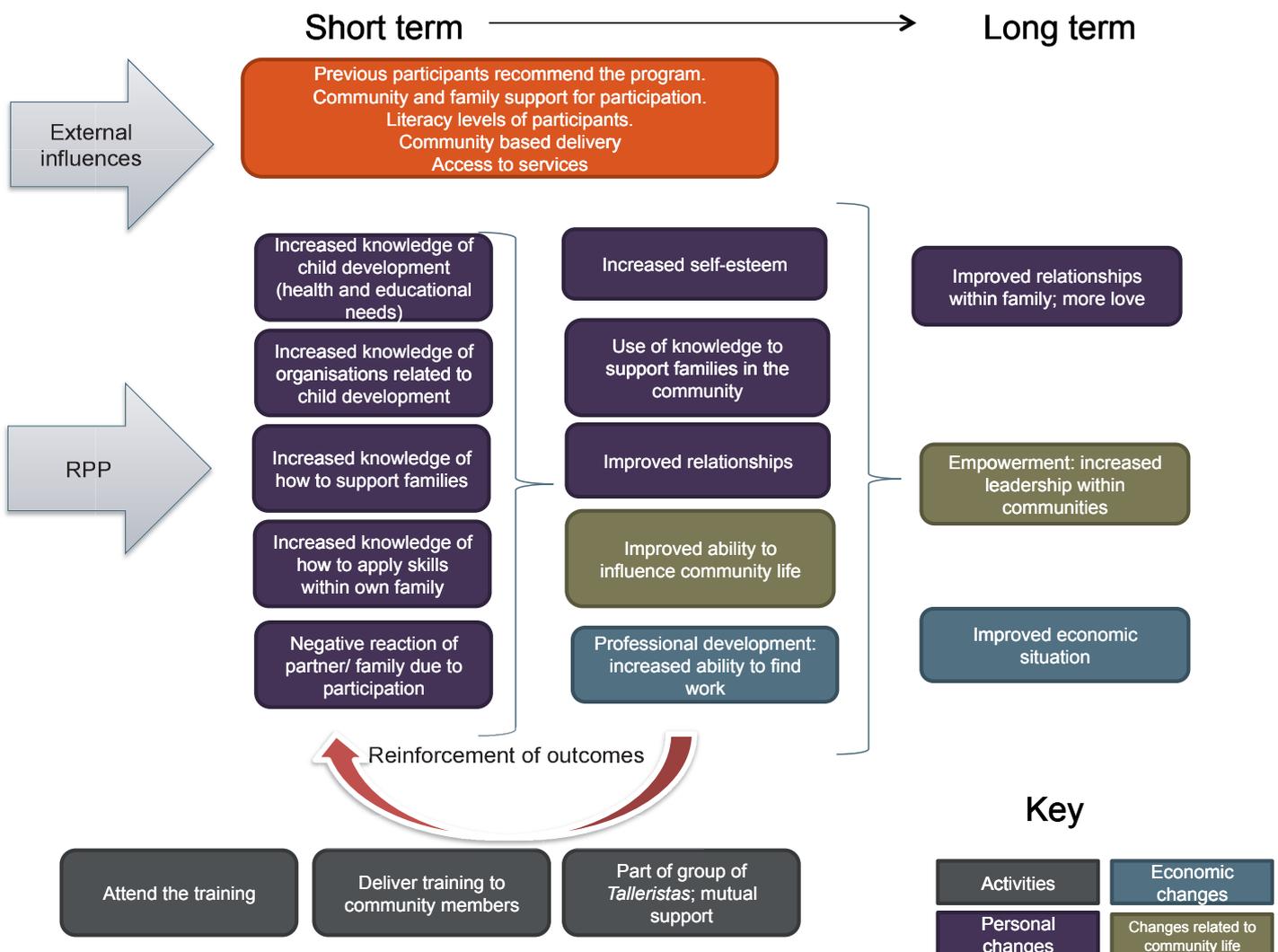
The positive benefits of these outcomes (understanding and better relationships) further **reinforce** parents' self-esteem, relationships with family and knowledge of child development, which they can then share with other parents/ caregivers.

Positive experiences of articulating their views within the community, and taking on more responsibility, spurs some parents into take on **leadership and advocacy roles**. They use the skills and networks they have developed to advocate further investment in child development and child protection, and mentor other parents to develop their skills.

### Changes for the trainers who participate in the program

The trainers are local parents or leaders within the community who are nominated to take part in the program. Some of these people will have taken part in the training courses, so they may already have some understanding of child development. However, the outcomes were thought to be common to all trainers who participate, see Figure 7.

Figure 7: Changes for trainers in the RPP



*Short and medium-term changes*

As with parents, initial changes for trainers include **increased knowledge of child development** and the **organisations that support child development**. This theoretical knowledge is supported by practical tools, techniques and guidance, to train and support families within their local communities.

“I gained knowledge that I can share, and this can change the lives of many families [in the community]”

The knowledge and practical skills that trainers acquire through the training can be **used within their own family**. Indeed many trainers reported using their new-found knowledge with their own children and grandchildren. This **leads to improved relationships** within their own family. Having positive experiences of creating change gives them more confidence to continue supporting others.

“My capacity for empathy has been strengthened”

“I now provide a better living environment for my daughter by being a better mother and friend [for my daughter]”

The trainers use the knowledge and skills from their course to **support families in their community**, both directly through the monthly training course, and indirectly through additional support and activities, including mentoring parents. Some become counsellors at the community level.

“[the program helped me] to be able to recognise that there are institutions out there which are sensitive to the needs of communities, and that I can be an actor of positive changes”

Their visible role within the community gains them more respect with community members, and gives them an improved ability to **influence community life**. They have more opportunities to experience leadership, which reinforces their engagement and commitment to the program. These positive experiences, alongside the application of learning within their own family, **increase self-esteem**.

“I feel a better accepted and embraced by the community when participating in community life”

Their skill and experience in supporting local people, both technically and emotionally, **increases the employability** of the trainers. They have more transferrable skills that they can apply to new jobs, increasing their chance of finding work. In the longer term this can lead to increased income; however some trainers reported that they had less potential income due to volunteering for the program when they could be undertaking paid work.

“More and better experience in community work, understanding their lives and realities”

“Professional development came from sharing experiences with the participants”

*Longer-term changes*

In the longer term, the trainers reported a continuation in **improved relationships within their family**. This can have a ripple effect, with the positive relationships between family members continuing in the extended family network.

Those who gain **experience of influencing and leading** within their communities tend to continue, with some trainers taking on roles with **more responsibility**, such as Mother Guides, or becoming community representatives. As a result of delivering the training, they gain experience of management and coordination, which can transfer into other community activities.

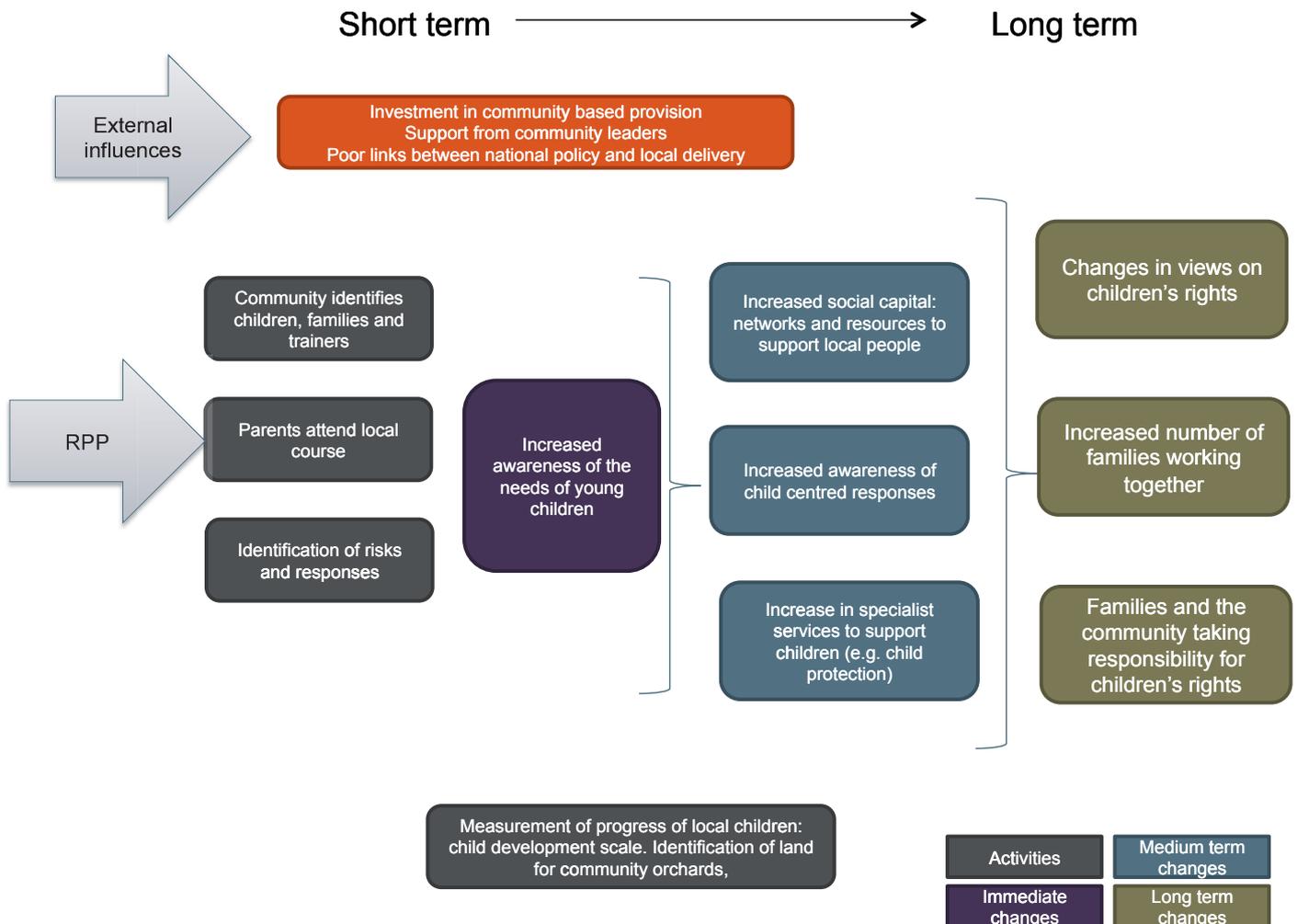
“[I] feel more secure in establishing a dialogue with respective communities”

There were many stories of mothers who attended training and, as a result, returned to complete their education or further training. This helps them to increase their employability; and for those moving into or back into work, economic gains related to an increased income.

### Changes for the wider community

The changes for each individual parent, trainer and child also has a cumulative effect at the community level, as presented in Figure 8.

Figure 8: Changes for communities where the RPP is delivered



*Short and medium-term changes*

In the short term, as a result of increased parental knowledge and activities within the training, there is an **increased awareness of and sensitivity to the needs of young children within the wider community** in households which do not participate in the program. Parents start to take a greater responsibility for the rights of their children and increase their use of health and educational services, which creates further awareness within the wider community, as these actions are quite visible. The coordination of the program through the community committee encourages the sharing of information about the program, further reinforcing awareness within the community.

“It improved my communication with other families and I taught them what I learned so that they could put it in practice within their households”

The building of knowledge and links between parents, trainers and health/ education institutions **increases the social capital within the communities**. These links, and the resources which the communities use from the program and develop themselves, enable the community to support more people in the future. The effectiveness of the state institutions may also increase, due to increased knowledge of how and when to access health and educational services.

“It [the program] taught us to get to know each other better in the community, and support each other when there is the need / in case of necessity”

“It [the program] helped us communicating more [sic] with other members of our communities”

The increased knowledge increases the whole community’s **understanding of child-centred responses**. This includes an understanding of the support and safety nets that need to be in place to maximise children’s rights and prevent harm (such as the establishment of child protection committees) which in turn can **increase the specialist services** that are available to support children. Parents’, trainers’ and community leaders’ increased understanding of rights means that they demand these are upheld for children.

*Changes in the long-term*

In the longer term, **knowledge of children’s rights** and the health and education services which promote this, is expected to increase in the community in a wider group of citizens outside those involved in the program.

The community-focused approach, whereby local parents train other parents, is expected to **increase the numbers of families working together** and supporting each other to bring up their children. Ultimately, it is hoped that families and the community will take collective responsibility for promoting and upholding children’s rights, but to do this, they need to work together.

“We are more supportive to each other”

“We were taught to be more united amongst ourselves”

## 4.8 External influences

In order to fully understand how change happens, we also need to consider the external factors which affect change in the short to long term. Stakeholder engagement found there to be a number of key factors which enable or prevent change from happening. These are explained briefly below. These factors are used to qualitatively 'sense-check' quantitative data gathered through primary research which estimate the net impact (the change which can be attributed back to the program). They can also support a wider review of the program, and enable planning of future activities.

### Enablers

#### *Short to medium term*

The **existence of community committees and the Federation of Community Associations** (the local partners which support activity and facilitate access to resources and families, as described in Chapter 1), was felt to be the most important factor in ensuring that the program can be delivered. These organisations offer a communication route to local people, lend credibility to the program, and take responsibility for continuing and developing program activities. Without them, the program would not be possible. It was felt by stakeholders that the rural environment facilitates these committees, as the social and community structures grow out of close-knit communities, something that does not necessarily apply in an urban context. These structures also ensure that there is **recognition of the volunteers** within the community, and a reinforcement of the importance of their role.

The role of **previous participants in advocating the benefits of involvement** helps to bring new people into the program. Many parents also remain committed to the continuation of the program, in many cases becoming involved in its delivery as trainers or Mother/ Father Guides.

In recent years, **government investment in health care centres** has significantly increased, with more healthcare staff and more services being offered universally to families. The increased services, for example free vaccinations and nutritional programs, ensure that the information provided to parents in the training can be put into practice easily.

#### *Long term*

In the longer term, the **existence of public policies that prioritise the child**, and the resulting governmental investment in health and social structures, will enable long-term and sustainable changes to be realised for the children who are targeted by this program. It is not enough that parents understand the health and educational systems, if they cannot access local (and free) services for their families. The continued availability of good, local health and educational services as the children grow into young adults will ensure that the benefits of early interventions are realised.

The Sistema Nacional Integrado de Protección de Niñez y Adolescencia (**Child Protection System**), is a state system that processes claims of harm and restores the rights of children. This is an emerging scheme, which operates on a regional basis, through a small core team of staff. Local Mother/ Father Guides and Committees are instrumental in facilitating reports and chasing up resulting actions. Over time, stakeholders expressed a hope that the formal system can

extend into local areas, as needed.

**ChildFund's presence in communities** in the long term, with continuity of support for families, helps to reinforce the commitment to supporting local children to grow into healthy, happy adults. This longevity of support alongside the long-term aspirations enables communities and parents to start to plan for the long term, for their children and themselves.

### Preventers

#### *Short to medium term*

In the short term, a **lack of support from community leaders** who do not understand or see the importance of early child development, can stop the program from effectively delivering initial recruitment and training activities (that can lead to outcomes/ change). Local committees facilitate access to parents and resources, including space to deliver the training; without this it is hard for a 'light touch' program to deliver activities. A **lack of support or interest in the program from local health and education services** can also restrict the efficacy of the training, if families are not able to put their learning into action.

The **machismo culture**, the social norm that underpins these local communities, places an emphasis on the role of women as caregiving and in the home. The expectation that women should remain in the home and have limited access to education and work, can cause conflict, as mothers access the program and begin to imagine a greater role within the community. It was reported by stakeholders that if parents are unable to resolve these conflicts, they may drop out of the program.

For some parents (mainly mothers) who participate in the program, the negative reaction of their partner as a result of them participating and learning, can cause tension and conflict within the household. Some community leads reported conflicts between women who wanted to participate and their partners who did not feel that it was their role to do so. They stated that the rural communities are male-led and there can be disagreement about the role of women and children and their access to educational opportunities. They also expressed that there can be concern that those participating in the program may start to neglect their responsibilities in the home. The burden of childcare and managing the home falls to women; participating in the program requires a time commitment each week, for training and implementing learning, which can cause some parents to drop out of the program if they are not able to resolve this conflict. Family support is therefore essential for participation.

The **literacy levels** of local people in rural communities can affect their ability to access both the training and information about local services. Illiteracy in Carchi is higher than the national average (9.8% compared to 6.8%)<sup>34</sup>. The program has been designed to support parents who are illiterate or have 'non-functional' literacy, using pictorial materials where possible. However, for a minority of parents, their ability to understand and interpret information can prevent them from participating.

34 Technical Secretariat for International Cooperation (SETECI) and the ART Program of the United Nations Development Program (UNDP) (2012) Measuring Aid Effectiveness at the Local Level, Case study: the provinces of Carchi and Esmeraldas – Ecuador, Articulation of Territorial Networks

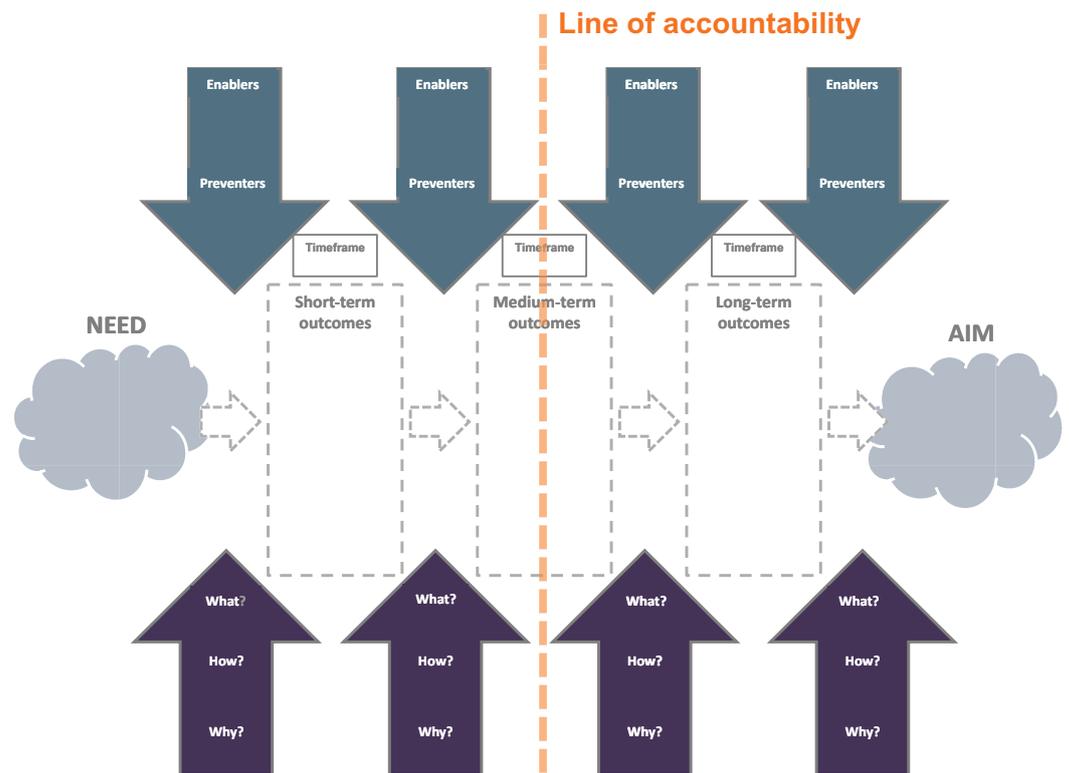
*Long term*

In the long term, it was felt by stakeholders that **weak implementation of national level policy at the local level** would have the greatest effect on the efficacy of the program. As stated above, national policy has prioritised the rights and development of children, with a significant investment in education and health. However, due to the small and remote location of some ChildFund communities, the effective implementation of health and educational services can be more difficult than in an urban environment.

### 4.9 Testing the Theory of Change for the SROI

The previous sections set out our understanding of how this program *could* create change in the lives of each stakeholder group. For each group, we have presented the changes that occur across the short, medium and long term. However, for the purposes of the research, we need to measure change over a realistic time period. Reflecting on Figure 3 (replicated below as Figure 9), we know that as the activities of an intervention ends, the ‘accountability’ that the intervention can claim for any change decreases. We cannot be as confident that long-term change is directly due to the intervention, as we can about short-term changes that occur.

Figure 9: An overview of the Theory of Change for the SROI approach – showing line of accountability



We call the dashed line the ‘line of accountability’. This illustrates where, realistically, external conditions have a more significant effect on the results.

In selecting the outcomes to measure, we therefore want to measure results which occur *after* a significant change has happened, but before we cross the line of accountability. For the purposes of this research, we intend to measure the medium-term changes which occur for each of the stakeholder groups; these are the

outcomes that we have a degree of confidence in a) measuring, as they will have occurred (if at all) within a relatively recent time period and b) articulating as being as a result of the RPP. As referenced in Chapter 2, many cost-benefit studies examine the long-run effects of interventions. Whilst controlling for other variables, they are based on the assumption that the changes occur *due* to an intervention that may have happened 20 years previously. In this research, we will directly measure the extent to which people feel that the short-term gains are due to the program.

For the purposes of this research, we did not develop an indicator to understand 'cognitive' development, as we followed the principle of measuring what matters **most** for key stakeholders. During workshops, parents (caregivers) and trainers talked about physical, social and emotional change i.e. those which are more easily observable. Changes to cognitive and communication/ language development are assumed to be the unobservable which contribute towards the emotional, social and physical changes described by parents. As such, we take a conservative view of measurement, looking at the behavioural change which cognitive development will contribute to.

Table 6 summarises the material outcomes or changes for children, parents, trainers and the wider community.

Table 6: Summary of outcomes to be measured through the SROI

Stakeholder group	Outcome
<b>Children</b>	Improved physical development
	Improved emotional development
	Improved social development
<b>Parents</b>	Improved knowledge and skills
	Increased self-esteem
	Empowerment (agency and participation)
	Improved economic circumstances
	Improved family relationships
<b>Trainers</b>	Increased employability
	Improved knowledge and skills
	Improved family relationships
	Improved self-esteem
	Empowerment (agency and participation)
<b>Community</b>	Increased awareness, knowledge and skills on child development

# Building a SROI model

## 5.1 Modelling process

The application of the SROI methodology consists in a number of concrete steps<sup>35</sup>.

1. **The first step consists in measuring the outcome incidence: how much change has occurred?** Once the Theories of Change are built with stakeholders, indicators are identified to measure the change having occurred for each outcome. These indicators aim to evidence both the population coverage (i.e. how many stakeholders of the sample are experiencing that change) and the 'distance travelled' since the beginning of the intervention (i.e. the magnitude of that change for those experiencing it).
2. **The second step consists in measuring the impact:** the outcome incidence minus a) the change that would have happened even in the absence of the intervention; b) the part of the change observed that can be attributed to other actors/projects/organisations; and c) those benefits which are offset by unintended adverse impacts. How this is done in practice is influenced by the context in which the analysis is applied, as well as the available information.
3. A first adjustment is **deadweight**, which is defined as an assessment of the amount of change that would have happened anyway, without the intervention. This requires the definition, conceptually and statistically, of a 'business-as-usual' scenario.
4. The second adjustment is **attribution**, which involves defining the percentage of overall change that is considered to be triggered *directly* by the project and/or the contribution of one organisation involved in a project.
5. The final adjustment to is **displacement**, which is an assessment of how much of the change (remaining after considering attribution and deadweight) can be considered as a net benefit (i.e. a new change), or whether it is the result of a movement or change from one place to another.
6. Once the net change, or impact, has been measured, the next step consists of **defining and assigning proxy values**. This process is generally referred to as social valuation or environmental valuation respectively, for 'monetising' those impacts which do not have a price on the market, e.g. social or environmental wealth/capital. The **overall value creation** observed is calculated by combining outcome incidence with the monetary values of respective outcomes.
7. **The value created per outcome is reflective of a year's worth of value.** However, impacts can last for a number of years, either throughout the implementation period or after the intervention has taken place. We therefore establish a **benefit period**, defined as the length of time that the benefits

36 For a more extensive analysis on the implications of discounting see: Vardakoulias, O (2013), 'Discounting and Time Preferences', Economics in Policy Making number 5, New Economics Foundation. Available at: [http://www.neweconomics.org/page/-/publications/Economics\\_in\\_policymaking\\_Briefing\\_5.pdf](http://www.neweconomics.org/page/-/publications/Economics_in_policymaking_Briefing_5.pdf)

associated with a change last. This may be influenced by the duration of the activity or by other external influences. Similarly, the effects might last for a long period but be decreasing over time. A decreasing trend is defined as '**drop off**'.

8. Last but not least, benefits – and costs – are **discounted to represent their present value**. All benefits accruing and costs borne into the future are adjusted to represent their 'worth' at today's prices. This is done by applying a discount rate to all future costs and benefits. The discount rate represents time preferences: the higher the discount rate, the greater the assumed preference for the present is assumed. As such, a high discount rate tends to favour projects that have high returns in the short run. Discount rate choice is a statement in itself of how a society values returns. As such, it is generally good practice to consider a range of discount rates; for example 1%, 3.5% and 10%. For projects in developing countries, upper bound discount rates (6% to 10%) are generally used, but there is no agreement in this respect<sup>36</sup>.

These steps were followed for modelling the returns on investment to the RPP in Carchi, Ecuador. The remaining sub-sections present key aspects of the process we followed and selected empirical findings.

## 5.2 Outcome incidence: understanding gross change

In order to measure the change experienced by stakeholders against the outcomes identified through Theories of Change, we applied two distinct questionnaires a) to parents who participated in RPP and b) to trainers participating in RPP. Data for the evolution of children's development was typically collected through parents, and via a combination of subjective perceptions (of parents) as well as more objective data. Children were not interviewed directly as their average age was 4.4 years.

Due to constraints in the field, we used a convenience rather than a representative sample. In total, we applied respective questionnaires to 73 parents and 31 trainers. Due to a lack of baseline data for the indicators we collected, we asked parents and trainers to answer retrospectively where they were at the moment when RPP started, and subsequently where they are now, against each one of the indicators. This evidently entails some biases but was nonetheless the only realistic solution in a context where no baseline data was available.

Table 7 presents the indicators selected to reflect the outcomes for each stakeholder group. Indicators for children were collected via parents; we therefore chose to select more than one indicator for each outcome. Similarly, many of the indicators can represent short outcomes (e.g. improved nutrition) and these all feed into medium-term outcomes, such as improved physical development prospects.

Table 7: Outcome incidence per stakeholder

Stakeholder group	Outcome	Outcome indicator description	Outcome incidence (before and after), average evolution
<b>Children</b>	Improved physical development	Evolution in number of meals per week including fruits, vegetables and meat respectively	27% increase
		Number of visits to the health centre per month	23% increase
		Breastfeeding coverage, over and above national average	48%
	Improved emotional development	Evolution of relationship with parents (1-5 scale)	29% improvement
		Improvement of children's capacity to express their emotions	57% improvement
	Improved social development	Evolution of number of days per week having the chance to play	52% increase
Improvement of children's interaction with other children		64% improvement	
<b>Parents</b>	Improved knowledge and skills	Self-rated knowledge/skills in five key areas (1-5 scale)	26% improvement
	Increased self-esteem	Self-reported confidence in expressing opinions in public (1-5 scale)	40% improvement
	Empowerment (agency and participation)	Self-reported capacity to influence community life (1-5 scale)	38% improvement
	Improved economic circumstances	Avoided annual spending in groceries (orchard production), net of household investment in orchard	\$ 213.78 for households having invested in an orchard, i.e. 75% of our sample
	Improved family relationships	Self-reported well-being within the household (1-5 scale)	30% improvement
<b>Trainers</b>	Increased employability	Number of trainers having found a job as after participation	60% of trainers
	Improved knowledge and skills	Self-rated knowledge/skills in five key areas (1-5 scale)	41% improvement
	Improved family relationships	Self-reported well-being within the household (1-5 scale)	36% improvement
	Improved self-esteem	Self-reported confidence in expressing ideas in public (1-5 scale)	59% improvement
	Empowerment (agency and participation)	Self-reported capacity to influence community life (1-5 scale)	58% improvement
<b>Community</b>	Increased awareness, knowledge and skills in child development	Evolution in knowledge and skills of non-participant households with whom participants have shared knowledge and skills gained through RPP	6.5% improvement for 663 households

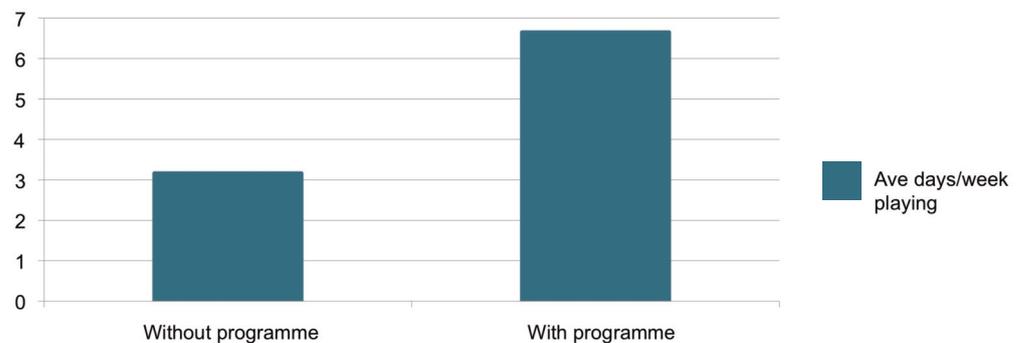
The outcome incidence is expressed as a percentage change relative to baseline, i.e. relative to when the parents sampled joined the RPP. Results reflect the change across 73 children and parents, 31 trainers and 663 households, of communities that were not part of the RPP. Further outcome indicators we collected but didn't use in the SROI analysis, as well as the reasons for this exclusion, are available in Appendix I.

Overall, we find that respective stakeholders report a positive change across all outcomes considered in this analysis. This change, however, is not uniform across outcomes.

### i) Children

For **children**, we find there is a higher outcome incidence for indicators related to social and emotional developments compared to those reflecting physical development. For example, one of the most important improvements relates to the amount of time children dedicate playing (Figure 10).

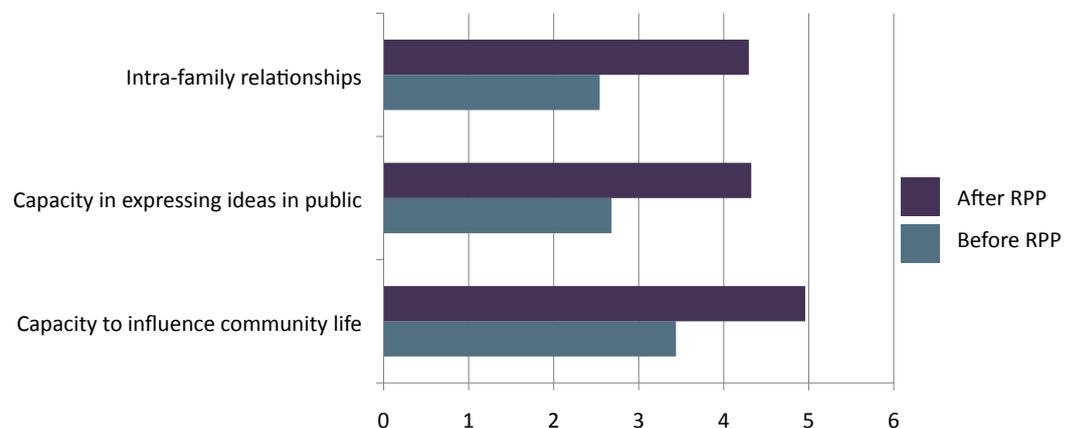
Figure 10: Weekly frequency of children playing



### ii) Caregivers

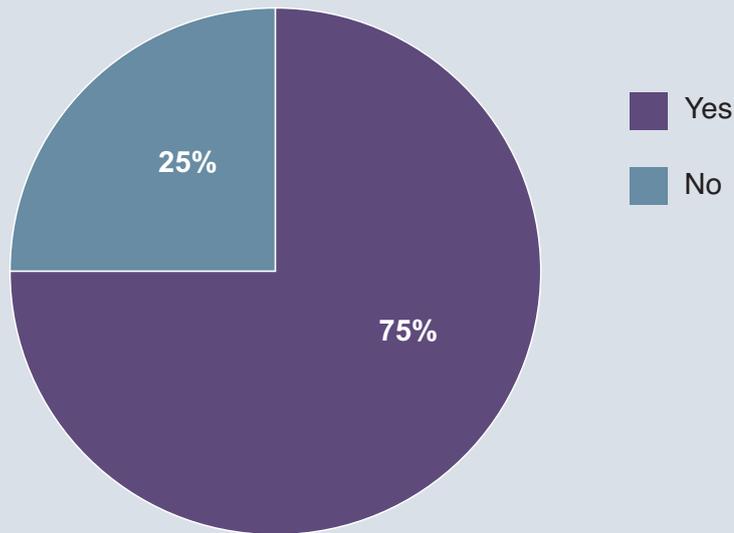
For **caregivers/ parents** (mainly mothers) we find the biggest changes reported are for indicators used to reflect improvements in agency and participation and self-esteem (Figure 11).

Figure 11: Selected well-being indicators for caregivers

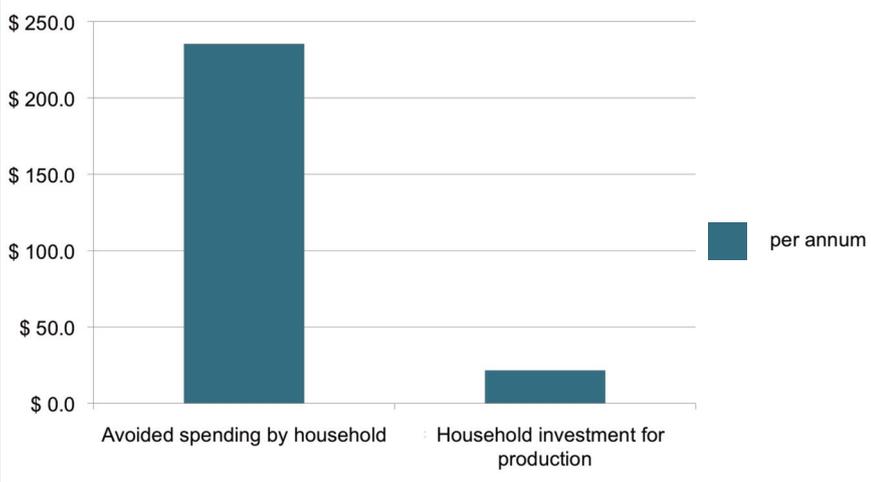


However, through the development of orchards, caregivers equally experience an improvement in economic circumstances. As illustrated in Box 3, 75% of participants considered in our sample benefited from resources in order to develop an orchard. On average, those households were found to save \$213 per annum (net of costs) by avoiding the purchase of fruits and vegetables. The households sampled earn an average of \$1534 per annum, or \$4.2 a day. The orchard thus allows them to save roughly 13.8% of their yearly income, money that can subsequently be used to meet other ends.

**Box 3: Impact of orchards on household budgets**



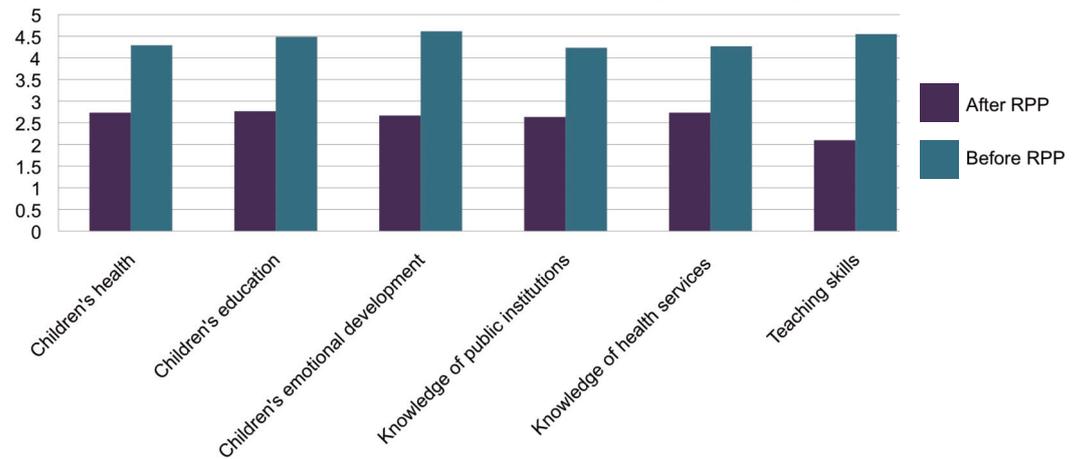
**Impact of orchards on household budgets**



### iii) Trainers

For trainers, the greatest levels of change observed relate to increased employability, improvement in self-esteem, and improvement in agency and participation. One of the important components of the program is to improve the knowledge of trainers *vis-a-vis* child development as well as institutions and public bodies. These are the knowledge and skills which can ultimately improve the employability of volunteer trainers participating in the program (see Figure 12).

Figure 12: Knowledge and skills indicators for trainers (1–5 scale)



#### iv) The communities

Finally, only one outcome and one indicator are used to reflect potential changes in the wider communities. The indicator combines empirical data collected via direct beneficiaries, with a secondary assumption based on qualitative information. The empirical component is the number of non-participant households with which beneficiaries have shared knowledge and skills gained through the RPP. The assumption, derived through qualitative information, relates to the amount of change experienced. We assumed that these non-participant households have obtained 25% of the additional knowledge and skills of beneficiaries. Numerically, this represents 25% of 24% i.e. an improvement of 6.5%.

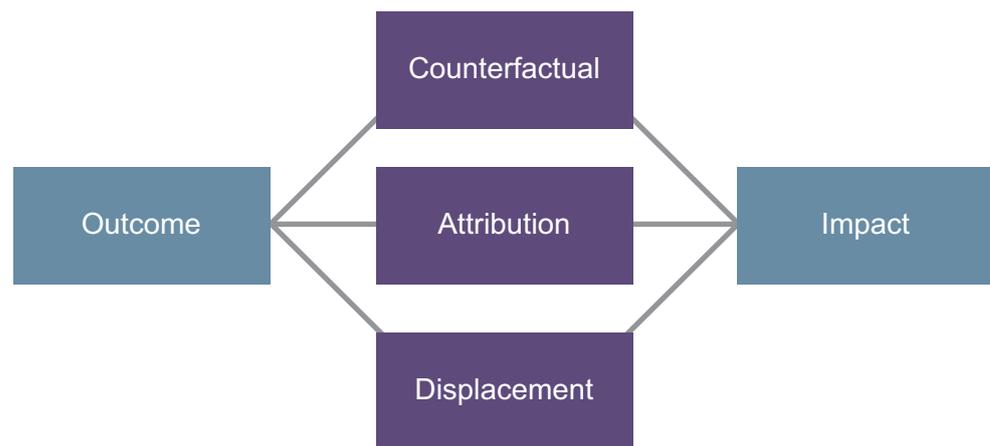
The figures presented in this section are representative of the 'gross' change, defined as the evolution relative to baseline without discounting for other factors or actors which might have contributed to the observed improvements. Accounting for impact is dealt with in the following sections.

### 5.3. The impact of RPP: understanding net change

#### Approaches to measure impact: an overview

Measuring net change, or impact, involves deducting from the outcome incidence a) the deadweight (or counterfactual), b) the attribution and c) potential displacement effects, as illustrated in Figure 13.

Figure 13: Accounting for impact



Measuring the **counterfactual** involves an assessment concerning how much of the total change observed would have occurred regardless of the intervention. There are three main ways of measuring the deadweight, depending on the circumstances and available resources:

1. Having a control group; this is known as the comparative approach. Although this is perhaps the most robust way to estimate the deadweight, any research must ensure that the control group is comparable to the target group; controlling for differences can entail advanced statistical analysis.
2. Asking stakeholders directly to estimate the amount of change which they consider would have happened anyway.
3. Comparing the performance of stakeholders to national or regional averages if, and when, comparable figures exist.

Measuring the **attribution** is necessary when there are other actors involved in a program and/or when multiple actors are working in the same area to achieve similar objectives. As with the counterfactual, a variety of approaches can be used to estimate the attribution:

1. In a scenario where multiple organisations are contributing to a program, then one might want to estimate the % change that is attributable to respective organisations. This is only necessary if one wants to estimate how much of the credit each organisation in question can claim. In order to estimate this, two approaches can be used: i) an empirical approach, asking stakeholders to split the benefits between the actors; ii) an assumptions-based approach whereby the credit is split according the resources each organisation contributes.
2. In a scenario whereby multiple programs working towards similar goals are targeting the same stakeholder groups, one needs to estimate the % change attributable to these different programs and actors. In this case, estimation of the attribution can either be assumptions-based (e.g. based on qualitative information collected) or empirically-based, i.e. by asking stakeholders to rank the relative importance of each organisation or program in enabling the change observed.

Finally, **displacement** effects might occur in situations where the generation of positive change for one stakeholder group (e.g. direct beneficiaries) is synonymous with a negative change for another stakeholder group (e.g. other members of communities) for the same outcome. For instance, if local health centres can only support a specific number of children, and a program favours the access of its beneficiaries to the local health centres, then this might mean less access for non-participant children. As such, part of the positive effects of the program in question could be offset by a negative impact on other households or children. In practice, displacement effects are hard to determine. This is because the causality between an intervention and impacts on non-participants is difficult to establish. As with deadweight and attribution, the following approaches can be used to measure displacement: a) an assumptions-based approach, consisting of translating qualitative information obtained on the ground into a quantitative estimate; b) an empirical control-group-like approach whereby non-participant households are asked to determine whether and to what extent an intervention has been detrimental to them. A questionnaire can subsequently be applied to estimate the quantitative amount of negative changes, as perceived by stakeholders themselves.

### Measuring the impact of RPP in Carchi

Our overall approach for measuring the impact of the RPP in Carchi has consisted of blending an empirical stakeholder-based deadweight exercise with an empirical stakeholder-based attribution exercise. This combined approach was used to assess the deadweight and attribution for the majority of outcomes. For some outcomes and/or indicators (e.g. breastfeeding) we benchmarked results against national figures – when they were available and meaningful.

Our approach to measuring impact was driven by the following considerations:

- Insufficient national and/or regional data that could be meaningfully used as a benchmark against the changes observed, except for a handful of outcomes or indicators.
- Difficulty in accessing similar non-participant households for the purpose of having a representative control-group.
- A priority was placed on measuring the entire value generated by the RPP regardless of the contribution of ChildFund and local partners respectively. The objective was to derive the returns on investment to the RPP in aggregate, including the contributions and inputs of both ChildFund and local partners.

In practice, stakeholders were asked a) to list all actors which, according to their judgment, have contributed to generating the changes they defined, and subsequently b) to allocate \$100 across these actors. The results for parents and trainers are presented in Table 8.

Table 8: Empirically derived deadweight and attribution

Organisation	Trainers		Parents
	<i>Social/personal changes</i>	<i>Employment changes</i>	<i>Total change</i>
<b>RPP</b>	57.78	100.00	39.75
<b>Parish</b>	9.44	0	5.44
<b>Local council</b>	10.56	0	5.34
<b>Organisation for the protection of children's rights</b>	9.44	0	11.62
<b>Ministry of health &amp; local health centre</b>	12.78	0	26.76
<b>Community organisations</b>	<i>Not cited</i>	<i>Not cited</i>	9.07
<b>Other</b>	0	0	2.01

Based on qualitative information we clustered the contribution of other organisations in the generation of outcomes as follows:

- The Ecuadorian government has been investing heavily in health services, therefore we consider that any attribution to the Ministry of Health and the local health centres would have happened anyway (even in the absence of RPP). This is correspondent to the deadweight.
- What is attributable to community organisations is correspondent to the attribution deduction, as our information suggests that community organisations enable the implementation of RPP. However, it is debatable whether community organisations could have achieved the changes observed in the absence of RPP.
- Finally, the other actors fall in a greater 'grey' area between deadweight and attribution. Although public bodies, the RPP has been working closely with these organisations and has influenced them in their ECD interventions. This was confirmed by interviews with members of these bodies. In short, there is a question mark regarding whether their contribution should be perceived as an impact that would have happened anyway, or whether the RPP has been the critical catalyst – in which case their contribution should be categorised as a contribution to the program itself.

Overall, we find that parents attributed 39.75% of the changes they and their children experienced to the RPP. Trainers considered that 57.78% of the social and personal life changes are down to the RPP, and they attribute 100% to the RPP in regards to employment and economic changes they have experienced.

The only outcome indicator for which we found robust and comparable data was breastfeeding patterns. In this case, we did not use the figures derived through the stakeholder-based exercise; rather, the deadweight consisted in the national average per age group (what we estimate would have happened anyway). We

deducted the national average from the breastfeeding coverage figures of our sample, as presented in Table 9.

Table 9: Deadweight figures for breastfeeding

Organisation	National average <sup>37</sup>	RPP
< 6 months exclusively breastfed	40%	100%
6-9 months breastfed with complementary food	77%	93%
Still breastfeeding 20-23 months	23%	92%

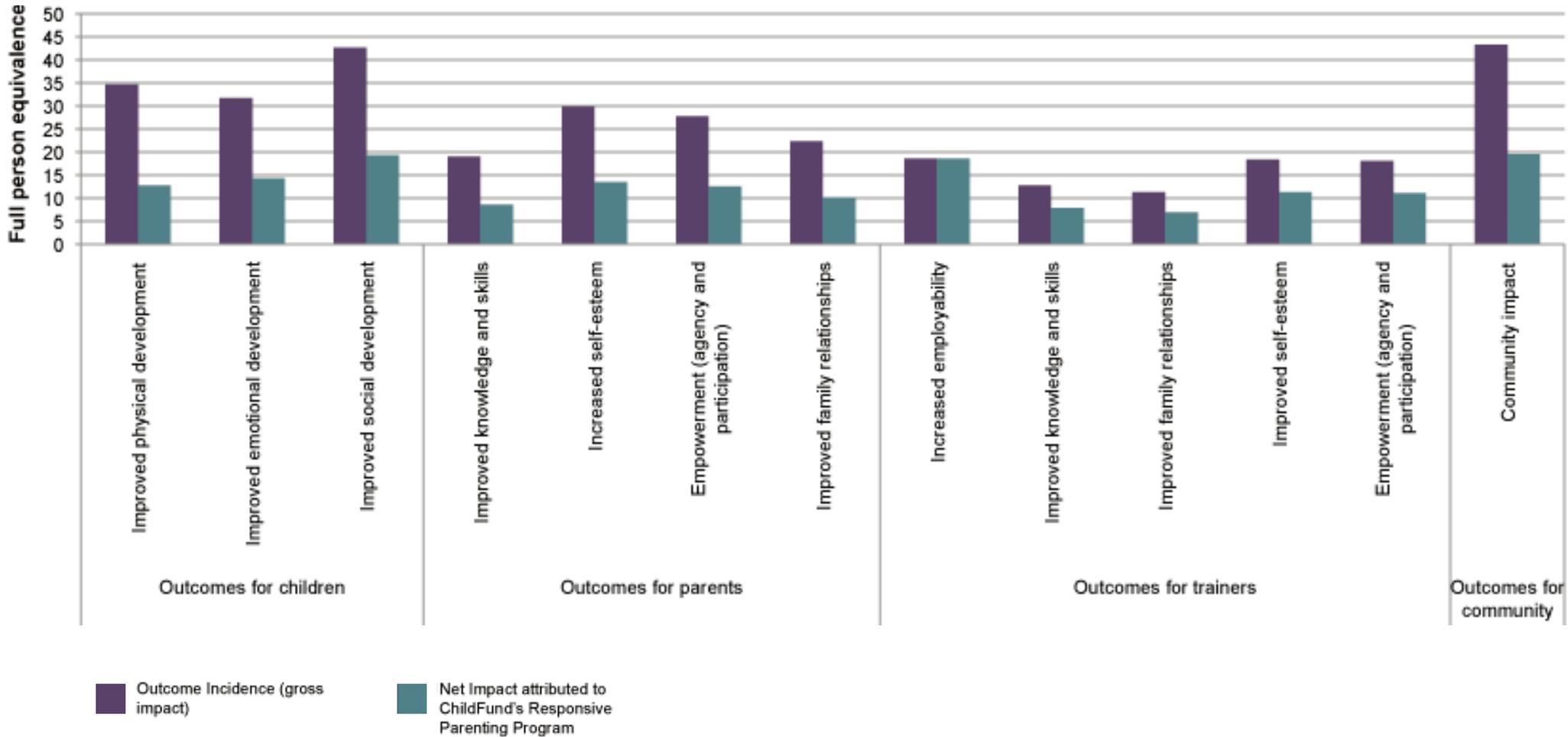
We did not identify any displacement considerations while engaging with targeted and untargeted stakeholder groups. In the context of the RPP, displacement could have been an issue for three outcomes and indicators only:

- Access to health services for children, which feeds into improved physical development prospects. Although we engaged with local centres and educational centres, no evidence suggested that the RPP could potentially be indirectly (unwillingly) contributing to the exclusion of non-targeted populations from accessing public services.
- Increased employability for trainers. In this case, an individual getting a job could be potentially synonymous with another individual not getting the same job – assuming the amount of employment is fixed. Whilst this might be the case, we found no empirical evidence suggesting this. Similarly, in terms of materiality, this impact is secondary to the program and we therefore did not consider employment displacement as a central issue for this analysis.
- A final concern, articulated by strategic stakeholders when developing the Theory of Change for the SROI for the SROI, consisted in the fact that men may react violently where their spouse participated in a parenting program, notably for socio-cultural reasons. In turn, this could hijack the numerous outcomes considered. We found no evidence to this respect.

Figure 14 presents the impact of the RPP in terms of full-person change equivalence. Full-person change equivalence expresses the outcome incidence and impacts in a simplified form. It combines the % of stakeholders stating they have experienced an outcome (e.g. whose self-esteem has improved) with the amount of change (e.g. on a scale of 0 to 5). For example, if 50% of sampled mothers declare they have experienced an improvement of 50% (on the scale, in terms of magnitude of change), this is the equivalent of 25% of sampled mothers experiencing a 100% (full) change on the same scale (i.e. 25% of mothers moving from 0 to 5 on the scale). This step was undertaken a) in order to express results in a comprehensive way and b) because the monetary proxies used in the model represent the full change for an outcome (see the following sub-section on valuation). Therefore, this step was necessary for the construction of a robust and realistic the SROI model.

37 Data available at: [http://www.unicef.org/sowc08/docs/sowc08\\_table\\_2.pdf](http://www.unicef.org/sowc08/docs/sowc08_table_2.pdf)

Figure 14: The impact of the RPP, net of deadweight and change attributable to other actors



It is worth mentioning that the only outcomes for which we applied 0% deadweight and 100% attribution to the program were:

- The grocery spending avoided, as a consequence of orchards/ home gardening. Stakeholders stated unequivocally that this would not have occurred without the program or via other organisations. We similarly observed that households with no access to the financing scheme of RPP for developing orchards did not develop one. It is consequently highly unlikely for this outcome to have occurred in the absence of the intervention.
- The increased employability of trainers. As evidenced in the empirical deadweight and attribution exercise, no trainer suggested getting any help from other factors or actors for improved economic or employment prospects. As such, we chose to use this stakeholder engagement exercise with trainers, as it specifically considered the question of employment and economic conditions.

## 5.4 Valuing outcomes using financial proxies

As aforementioned, SROI requires expressing all impacts in monetary terms. This entails putting a proxy 'price' on goods which do not have a market value. Although non-market valuation is a developed approach for environmental outcomes, it is not the case for most social outcomes – where there are no agreed methods and/or figures. Most SROIs therefore use 'secondary' proxy figures aiming to reflect and represent non-market outcomes.

In this analysis, we combine a) secondary data with b) the application of two empirical, stakeholder-based, valuation approaches: willingness-to-pay and a choice experiment. Both approaches are clustered under what is commonly called stated preference methods (SPM). Although these approaches are far from perfect, the available proxies in Ecuador were scarce. We therefore chose to derive monetary proxies for key outcomes empirically through two academically accepted methods.

### Application of willingness-to-pay

In order to obtain a monetary proxy for valuing the additional knowledge and skills gained both by parents and trainers, we elicited how much the respective stakeholder groups value the knowledge and skills they gained. The question was asked as follows:

“You have told us that you gained important new knowledge and skills through the program. Assume the program had never taken place, and you were offered a course/training with similar content, and that offered you a similar amount of knowledge. This course would last for about a year. How much would you be Willing-To-Pay per month, over the course of a year, for participating to such a training program?”

Parents and trainers were given options, ranging from \$0 to \$100. The results are presented in Table 10.

Table 10: Results of WTP exercise

Amount (monthly)	Number of parents	Number of trainers
\$100.00	2	-
\$90.00	-	-
\$80.00	-	3
\$70.00	-	-
\$60.00	1	-
\$50.00	2	7
\$40.00	-	-
\$30.00	4	-
\$20.00	3	-
\$10.00	3	-
\$ 0.00	1	-
<b>Weighted Average</b>	<b>\$35.63/Month</b>	<b>\$59/Month</b>

This exercise suggests that the value stakeholder places on the knowledge and skills they gained through the RPP have a yearly value of \$708 for trainers and of \$427.5 for parents.

### Choice experiment

We further undertook a stakeholder-based choice experiment in order to elicit how much parents and trainers value other non-economic outcomes such as improved family life, improved community life and self-esteem, and meanings feeling of individual self-worth in particular within communities. The experiment was phrased as follows:

“We would first like you to list all the things (material or not) that are make you happy, or could make you happier, in your every-day and/or make your life easier. We will subsequently ask you to rank these things according the order of importance you place on them. Which are ones you place most importance on? We will finally ask you how much money would be required (annually) for those things that are material, or how much you would gain from these”

Tables 11 and 12 present the key outcomes of these workshops conducted with trainers and parents respectively.

Table 11: Results of the choice experiment with trainers

Elements of well-being listed	Ranking	Annual value (\$)	Estimated value (\$)
<b>A happy family/good relationship with husband</b>	1	-	\$3,840
<b>A good relationship with children</b>	2	-	\$3,840
<b>Good relationships with/accepted within my community</b>	3	-	\$3,840
<b>A stable job / more money</b>	4	\$3,840	
<b>Have my own house/ Finish/extend house</b>	5	\$1,000	
<b>Complete an education degree</b>	6	\$1,200	

Once participants to workshops prioritised the elements they had listed, they were asked to estimate a) how much additional money they would need annually to finance those goods that are material / marketed and b) how much additional money they would gain from those elements that might generate an income. By combining these values with the prioritisation of stakeholders, we estimated how much non-market goods listed might be worth to them. For example, a more stable job would mean, for trainers, an average additional income of \$3,840 per annum. However, this element ranked lower than good relationships with children, a happy family and good relationships with their community. We therefore know that, for the trainers, the value of these three aspects of (aspirations for) their lives, is worth at least as much as the additional income they could generate through a more stable job. This approach was replicated for all non-market goods or aspirations listed by stakeholders. When a non-market outcome was between two market goods, then we used the average amount between both to value it.

Table 12: Results of the choice experiment with parents

Elements of well-being listed	Ranking	Annual value (\$)	Estimated value (\$)
Better relationship with husband/spouse	1		\$1,000.00
Better relationship with children	2		\$1,000.00
New house/extension of house	3	\$1,000.00	
Good relationships with/accepted within my community	4		\$565.40
Access to running water	5	\$130.80	
A garden / terrace	6		
More electro- domestics	7		
Heating system	8		
Car	9		
TV	10		

### Overview of proxy figures

These empirical valuation exercises provided us with some key figures for placing a financial value on non-market outcomes/impacts. Table 13 outlines the proxy figures used for all outcomes included in the SROI analysis.

Table 13: Overview of proxies used in the SROI analysis

Stakeholder group	Outcome	Financial proxy	Source	Description/rationale
<b>Children</b>	Improved physical Development	\$ 580	Alderman and Behrman, 2004	Although the study deals with the value of low-birth weight reduction, we found no better study for putting a monetary price on improved health condition of infants. As two outcome indicators are nutrition-related, we consider this to be a sensible estimate
	Improved emotional development	\$1,000	Empirical (choice experiment)	Through the choice experiment, we determined how much mothers value their relationship with their children. We assume that the same value accrues to children themselves, as one of the outcome indicators is specifically on family relationships
	Improved social development	\$900	Survey realised by Ecuadorian daily newspaper El Mercurio	This survey evidences how much a sample of Ecuadorian parents are spending for their children to access stimulating and recreational activities. The amount they are spending is a good proxy for the value an average Ecuadorian family places on children's social development
<b>Parents</b>	Improved knowledge and skills	\$428	Empirical (willingness-to-pay)	The rationale for this proxy is explained in the valuation section
	Increased self-esteem	\$565	Empirical (choice experiment)	This value represents half (50%) of the value attached to community life in the choice experiment. This is because stakeholder engagement suggested that self-esteem is intimately linked to a feeling of self-worth within community – and ultimately to a feeling of respect within the social realm. We thus split the value of this proxy into 2.
	Empowerment (agency and participation)	\$565	Empirical (choice experiment)	This value represents half (50%) of the value attached to community life in the choice experiment. This is because the value attached to community life combines a) acceptance by the community, with b) capacity to act within the community. It is thus sensible to break down this proxy value
	Improved economic circumstances	\$213	Empirical (avoided spending in groceries per annum)	The yields provided by the orchard are synonymous with less need to spend in groceries, i.e. it is an avoided spending. This money can subsequently be used by the household for other purposes
	Improved family relationships	\$1,000	Empirical (choice experiment)	The rationale for this proxy is explained in the valuation section
<b>Trainers</b>	Increased employability	\$2,880	Annual minimum wage	Value of getting into employment, based on the official minimum wage
	Improved knowledge and skills	\$708	Empirical (willingness-to-pay)	The rationale for this proxy is explained in the valuation section
	Improved family relationships	\$3,840	Empirical (choice experiment)	The rationale for this proxy is explained in the valuation section
	Improved self-esteem	\$1,920	Empirical (choice experiment)	This value represents half (50%) of the value attached to community life in the choice experiment. This is because stakeholder engagement suggested that self-esteem is intimately linked to a feeling of self-worth within community – and ultimately to a feeling of respect within the social realm. We thus split the value of this proxy into two.
	Empowerment (agency and participation)	\$1,920	Empirical (choice experiment)	This value represents half (50%) of the value attached to community life in the choice experiment. This is because the value attached to community life combines a) acceptance by community, with b) capacity to act within the community.
<b>Community</b>	Increased awareness of children's development	\$428	Empirical (willingness-to-pay)	This figure is ¼ (25%) of a parent's WTP for additional knowledge and skills. Although participants might convey this awareness and knowledge to numerous non-participant households, it is unlikely for the change generated to be of a similar scale. We thus assume (conservatively) that non-participant households contacted by participants benefit from 25% of the additional knowledge and skills gained by participants.

The values represented in Table 13 represent the full value of one outcome; for example if a mother moves from 1 to 5 on a scale representing her self-esteem, then the value of this movement is 'worth' \$565 in monetary terms.

## 5.5 Additional modelling considerations

### Benefit period and drop-off

An SROI analysis can be evaluative, i.e. measuring the returns on investment taking into account the net change which has already occurred, and/ or forecastive, in the sense of extrapolating the impacts (benefits) into the future. When forecasting, it is necessary to identify and justify a specific benefit period – the timespan across which the impacts identified are thought to be at work. For example, although parents might benefit from six months or a year of training, the effects of this training on them and their children might be long-lasting. The question then becomes a) for how long do these benefits last and b) what percentage of these benefits occurring in the future might be causally linked to the program – as other factors take effect.

This SROI is evaluative, although most SROIs are a combination of both evaluative and forecastive. The SROI model developed is built to evidence the value which has already been created, relative to costs. On average, the sample of parents surveyed had participated in the program 2.9 years ago. We are therefore analysing the returns generated over the past 3 years, on average.

We estimated the full benefit period of five years, and therefore had to forecast the value created for an extra two years. This is a conservative estimate given that the quantitative evidence we collected suggests that impacts can be at work for up to nine years – for some stakeholders sampled in our survey.

We therefore ran two SROI models, one strictly evaluative and one which entailed both a) the amount of change having already happened and b) an additional forecast of two years into the future. Because two years is a relatively short time horizon we do not consider a drop-off of impacts over these extra two years.

### Scaling up

The sample of stakeholders we interviewed in the surroundings of San Gabriel, Carchi, is not necessarily wholly representative of all beneficiary groups of Ecuador, nor of the Carchi region. As such, we do not scale up results to the entire RPP in Ecuador, nor to the entire region of Carchi. A considerably more representative sample, and substantial additional field-work and data would be required for that purpose. Rather, we take a case-study stance: what this SROI aims to elicit is the extent to which the value generated for the key beneficiaries and stakeholders sampled outweighs the costs of generating this value. If yes, by how much? Likewise, which stakeholders derive the highest value via RPP? Which are the outcomes, and activities, contributing the most to this value?

This SROI aims to provide a first answer to these questions without the ambition of scaling up the results to a regional or national level. We firstly consider the value generated for:

- 73 parents sampled
- 73 children participating in the program

Despite sampling a total of 31 trainers (who filled in the questionnaire we applied) data collected in Carchi suggests that, on average, there is a ratio of 1 trainer for 15.7 parents participating in the sessions. In short, we estimate that for training the 73 parents sampled, and generating change for the 73 children participating in the program, 4.6 trainers were required. Rather than including the total number of trainers sampled (which would artificially magnify the value created) we considered it appropriate to ‘scale’ the number of trainers included in the SROI relative to the parents sampled. This is because, although we do not scale up results, adjusting the number of trainers proportionally to beneficiaries can at least allow generating return-on-investment results which are closer to the bigger picture.

### Costs

SROI compares the impacts, expressed in monetary terms, on costs, in order to assess the effectiveness of interventions. The costs considered in an SROI can be a) financial or b) economic. The financial costs are the budget, i.e. amount financially spent to deliver an intervention. The economic costs (or non-financial inputs) are inputs used to deliver an activity or intervention than were not compensated for in financial terms. These can consist in in-kind donations, over-time or community contributions to an activity (e.g. community providing the buildings to hold meetings for free). Depending on the intervention, economic costs can be negligible or sizeable.

Whilst the broad majority of SROIs consider financial costs *only*, ChildFund and local partners collect data on economic costs. The review of that data showed that the non-financial inputs in the intervention are sizeable and we included these in the costs. However, we modelled the results to both include and exclude non-financial inputs.

As we considered only 73 beneficiary parents and children, we calculated average unit costs based on financial documents of ChildFund and partners. The unit costs include a) the average financial cost per parent trained and b) the average non-financial inputs per parent trained. These are summarised below in Table 14.

Table 14: Summary of unit costs used for the SROI

	\$ / parent trained
<b>Financial cost</b>	<b>\$646</b>
<b>Economic cost</b>	<b>\$131.50</b>
<b>Of which:</b>	
<i>Time input and in-kind donations of trainers:</i>	<b>\$80</b>
<i>Time input and in-kind donations of parents:</i>	<b>\$20</b>
<i>Community input (meeting rooms etc.):</i>	<b>\$31.50</b>

## 6. Results of the SROI

This section presents and discusses the results of the SROI analysis. Two main scenarios have been modelled.

- The first scenario is **evaluative only**. This means we only account for the benefits having *already occurred*, without consideration of whether these will be ongoing into the future. Given that our sampled households participated in the training three years ago on average, we measured the social returns on investment for three years, retrospectively. This was done in order to evidence the value already created, net of costs, without using further assumptions regarding forecastive benefit periods.
- The second scenario extends the first one by **assuming that benefits accrue to stakeholder for two additional years**, i.e. a total of five years after the training has taken place. This is a conservative assumption, given that we collected evidence demonstrating that many stakeholders are still experiencing change as many as 10 years after the intervention. Likewise most cost–benefit analyses forecast the benefits of ECD interventions into the long-run (time span of 10 or 20 years). Nonetheless, we take this conservative stance in order to avoid biases associating with forecasting impacts in the long-run, and to avoid over-claiming.

For each scenario we use three different discount rates in order to elicit the sensitivity of results to the discount rate applied. This is because the RPP involves costs in the present for benefits accruing into the future. As such, the choice of discount rate can critically influence the results of the SROI<sup>41</sup>. The choice of discount rate is often arbitrary, particularly when a country has not set a mandatory social discount rate which is to be applied to the economic analysis of any public or social investment. In order to avoid any polemic to this respect, we present results using three discount rates, a) 0% (meaning costs and benefits and not discounted), b) 3%, a modest discount rate, and finally c) a higher 10% discount rate, often used for analysing projects in developing countries. For example, the UK Department for International Development (DfID) uses a 10% discount when appraising its development interventions. We found no information on suggested social discount rates by the State of Ecuador.

In this section we successively present:

- The overall returns on investment to RPP in Carchi;
- The returns broken down by stakeholder group: to whom is the value created accruing?
- The returns broken down by stakeholder group and outcome: where is the value generated?

### 6.1 The social returns on investment to the RPP

Table 15 presents the overall results both for the evaluative analysis (value created over the past three years) and forecastive analysis (value created over the past three years, assuming an additional two year period of benefit). The basic condition for an intervention to be considered effective is that the Present

Value of Benefit minus the Present Value of Costs is greater than zero; and that the SROI ratio, which represents the Present Value of Benefits divided by the Present Value of Costs is greater than one.

Our results suggest that for each dollar invested in the RPP, between \$1.89 and \$3.46 of social value is generated, depending on the time span of the analysis and the discount rate applied.

It is worth re-stating that costs include non-financial inputs provided by stakeholders (parents, trainers and communities). If considering financial costs only, then returns are higher than the ones presented in the table below.

Table 15: The social returns on investment to RPP (US Dollars)

EVALUATIVE ANALYSIS				FORECASTIVE ANALYSIS		
Discount rate:	0%	3%	10%	0%	3%	10%
<b>Present Value of Benefits</b>	117,900	111,165	97,733	196,501	178,432	163,686
<b>Present Value of Costs</b>	56,763	55,110	51,603	56,763	55,110	51,603
<b>Net Present Value (NPV)</b>	61,137	56,054	46,130	139,737	123,322	112,083
<b>SROI ratio</b>	2.08	2.02	1.89	3.46	3.24	3.17

Our results equally suggest that even if we consider the value already created *only* over a period of three years (evaluative analysis), for which there is the highest possible certainty in results, the RPP generates circa double the amount invested in terms of social value.

Despite the temptation to compare the relative returns of different interventions, the results of this work are not directly comparable to previous studies.

Firstly, previous studies calculate benefits along a much longer period, e.g. Kaytaz (2004) calculates the productivity effects across the entire life span of individuals. If forecasting the impacts of RPP far into the future then the SROI ratio would be considerably higher. However, this research aimed precisely to avoid the biases associated with forecasting far into the future, in an assumption-based fashion. SROI indeed takes a deliberately empirical stance, whereby more field information, and a follow-up of beneficiaries who participated a decade ago or more, would be required to consider extrapolating results far into the future.

Secondly, as aforementioned, our analysis includes outcomes (benefits) previously excluded from traditional economic analyses of ECD programs; but it equally excludes some potential life-long (or long-run) impacts of RPP, e.g. productivity impacts via education and/or long-run health impacts on children. As with the first point, this research takes a deliberately empirical stance. For example, we do not assume that an improved physical and socio-emotional

condition of children over the past three years will *automatically* lead to improved school performance (medium term) and productivity gains (long term). Although this is likely to be the case, we cannot measure with any precision how much change should be expected on longer-term outcomes, or factor for any *external factors* which might prevent this causal link to occur, e.g. a future backdrop in public health or educational investment in Ecuador.

Despite these important caveats, it is worth noting that our results are by and large comparable with previous studies, particularly those conducted in developing countries (Bolivia and Turkey). A sample of those is indicatively presented in Table 16 below.

Table 16: Cost-Benefit ratios of previous return on investment analyses of ECD interventions

Country	C:B ratios	Reference
USA	\$2 - \$7	Melhuish, 2004
USA	\$4	Melhuish, 2004
Bolivia	\$1.7 - \$3.7	van der Gaag & Tan, 1998
Turkey	\$1.12 - \$2.43	Kaytaz, 2004

Overall, the results are very encouraging for interventions related to ECD. Indeed, if results are positive even when excluding potential life-long impacts, by focusing on short-term impacts only, then there is a strong rationale for investing in programs such as RPP. Similarly, our results also suggest that factoring for broader societal benefits, derived through ECD interventions into traditional cost-benefit analysis could mean that returns on investment are considerably higher than previously thought. If combining a) a long-term approach (as previous analyses do) with b) broader social valuation (as this research does), then the returns on investment could be substantially higher than the existing evidence suggests. Combining the two approaches could also 'bridge the gap' between the economics literature on ECD and the literature stemming from other social sciences, which typically entails broader societal impacts.

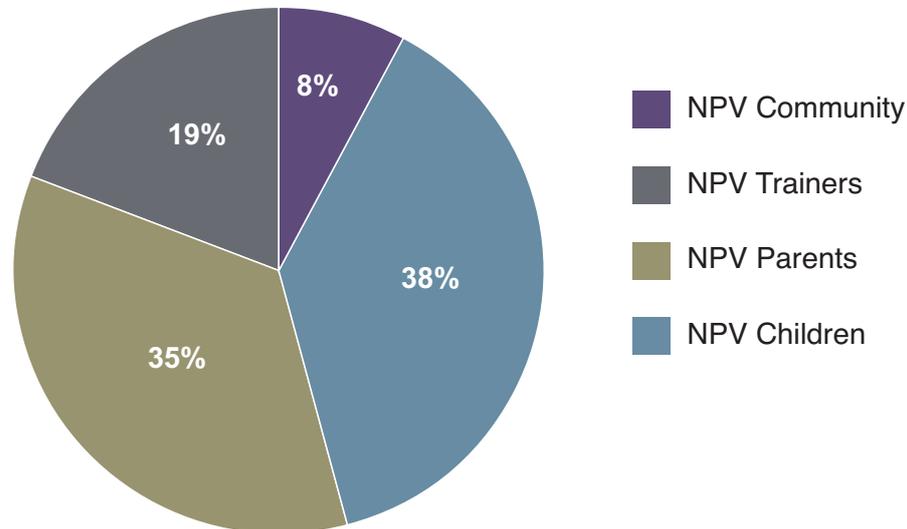
## 6.2 The distribution of value across stakeholder groups

Beyond aggregate returns on investment as a whole, it is critical to understand for whom the value of the program has been created. Indeed, if a program is targeting a specific beneficiary group, but nonetheless created more value to other stakeholder groups, then this might be an indicator of ineffectiveness relative to a program's objectives and goals.

Figure 15 presents the distribution of value (net of costs) across the four stakeholder groups included in this SROI. Overall, we find that the overwhelming majority of the benefits generated accrue to children and parents, both being direct beneficiaries of the program. Whilst the value is almost equally split between parents (mothers, principally) and children, there are important links between respective outcomes of children and parents. For example, an

improved economic circumstance (via development of orchards) for parents will equally affect children's prospects – directly or indirectly. These links, and feedback loops, are not accounted for in the present analysis. Given the amount of feedback loops between the two stakeholder groups, is it perhaps more sensible to consider the benefits accruing to parents in conjunction with the ones accruing to children.

Figure 15: Distribution of the Net Present Value (NPV) by stakeholder group



Although the value accruing to the broader communities represents a smaller percentage (8%), it is important to note that we here consider only one aspect of the impacts of RPP on communities, i.e. the improvements in knowledge and skills of non-participant households within communities. This reflects only one of the potential short-term impacts on communities which have been outlined in the Theory of Change section. We assume that the other changes accrue over time, but it is outside the scope of this research to measure the longer-term changes within communities which we are confident are attributable to the program.

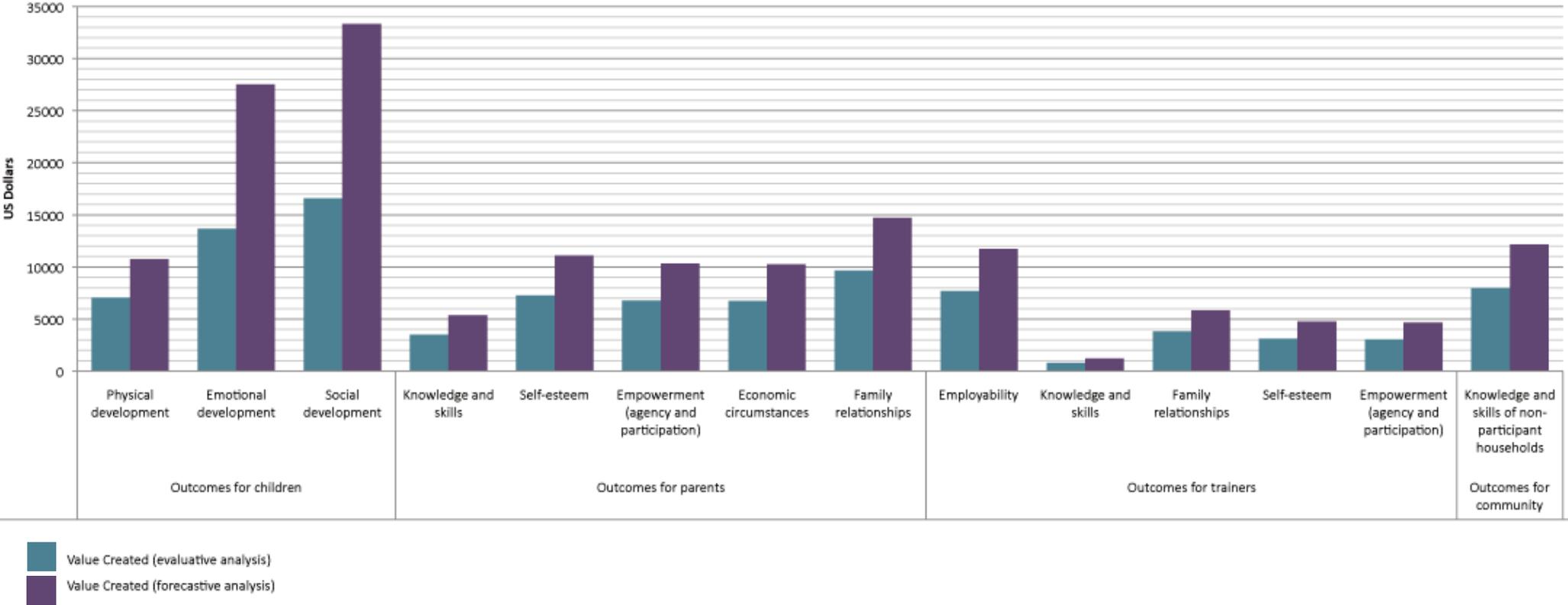
Finally, it is worth stating that these figures are representative of the value accruing to:

- a) 73 parents (mothers, in an overwhelming majority)
- b) 73 children
- c) the 4.6 trainers required for training the parents, and finally
- d) the 663 non-participant households with which participants shared knowledge and skills provided by the RPP.

### 6.3 The distribution of value by outcomes

It is also important to consider where value is created, i.e. which outcomes are contributing the most to the total impact of RPP. Figure 16 presents the distribution of value by outcome, for each stakeholder group respectively.

Figure 16: Value created by outcome for respective stakeholder groups under a 10% discount rate



Our key findings are that:

- For children, the RPP appears to create substantially more value through improvements in emotional and social development than through improvements in physical development.
- For parents, the most important contribution of RPP is the improvement in family relationships, followed by increases in self-esteem, empowerment and economic circumstances. The increase in knowledge and skills seems, comparatively, of less importance.
- For trainers, the biggest contribution of RPP consists in substantially improving employability. For trainers as well, the increase in knowledge and skills appears secondary compared to other impacts.

These findings, however, require a careful interpretation if wanting to derive meaningful conclusions.

Regarding the impacts of the RPP on children, for example, the fact that more value is generated through improved social and emotional development can be interpreted in a variety of (mutually non-exclusive) ways:

- On the one hand, this result might not come as a surprise. Indeed, the RPP is not a program designed to deliver medical care or deal directly with physical development of children. Although physical development is certainly a central component of the RPP, delivery (and provision of information for parents) is primarily brought about through health services. In short, the RPP plays a more 'complementary', rather than central, role in physical development, by raising parents' awareness and understanding. However, the role of the RPP is central when it comes to social and emotional development (and broader behavioural change) – as those are not object of State or other support services in the region. Under this line of interpretation, the findings presented in Figure 16 seem sensible.
- On the other hand, the 'timing' dimension is equally important. It is probable that, after parents leave workshops, they start by practicing what is 'easier' to do (financially or otherwise). As such, changes that are easier to implement might become evident earlier on, while those harder to implement occur later on. For example, having a more affectionate relationship with one's child, and/or ensuring he or she has access to stimulating activities can be easier to implement than, say, improving nutrition. The latter indeed pre-supposes a financial capability to do so, and this might not be easy to implement for those households that have not benefitted from an orchard. The same can hold for visits to the health centre and medical follow-up, particularly for households in more remote areas who don't have the means and the time to visit health centres regularly – regardless of their increased awareness *vis-à-vis* child health.

Despite differences, the distribution of value for both parents and trainers highlights that despite the importance of 'hard' economic outcomes in generating value (improved economic circumstances and employability respectively), soft outcomes, such as improved family relationships, self-esteem and agency/participation are in fact generating a substantial value to these stakeholders. This highlights that if an analysis focuses on economic aspects *only* then a substantial part of the impact and value of a parenting program is

missed out. Likewise, the choice experiment presented in the valuation section (see 5.4) illustrates that economic outcomes are not necessarily the most cherished ones and valued by stakeholders in an experimental setting.

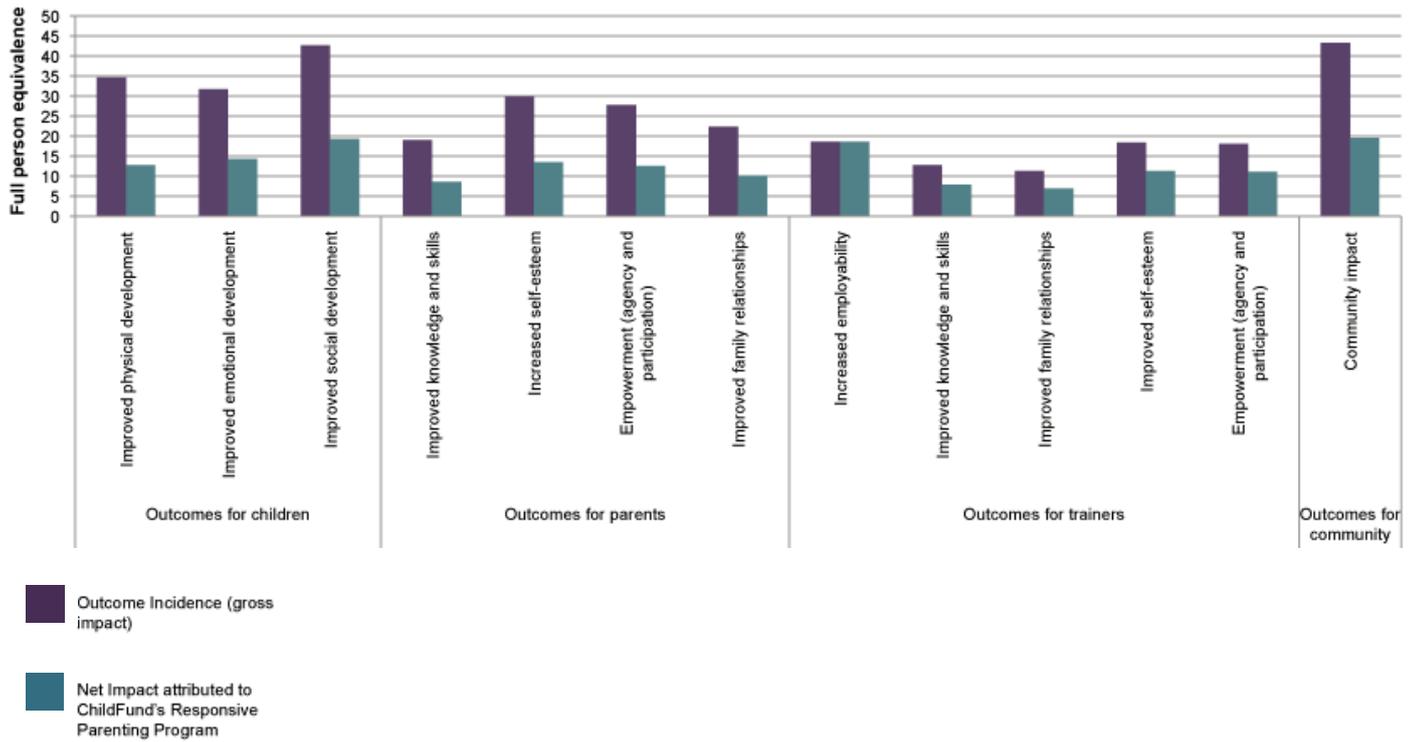
Perhaps the most surprising result is that less value is generated via improvements in knowledge and skills. This holds both for parents and trainers. However, this result does not necessarily suggest that the knowledge and skills obtained are not valued by stakeholders. Indeed, the willingness-to-pay exercise suggested that stakeholder would be willing to pay a non-negligible amount for having access to the knowledge and skills provided by the RPP.

As such, a plausible interpretation is the following: through stakeholder engagement, we determined that improvements in knowledge and skills are perceived by stakeholders as the necessary catalysts for the realisation of the wide majority of other outcomes e.g. increased employability of trainers and the improved agency and participation of mother within communities. However, what is valued in the SROI analysis is not the instrumental role of knowledge and skills in realising other outcomes, but rather their intrinsic value as a stand-alone outcome. If the feedback loops between different outcomes were quantitatively analysed then perhaps the value of knowledge and skills acquired would be higher.

Finally, it is worth a reminder that the total value created combines a) the net impacts of the program in non-monetary terms (presented in section 4) with b) monetary valuation proxies (presented in section 5). Putting a monetary price on typically non-economic outcomes can skew results. This is because (depending on available figures) applying a high monetary proxy on a modest impact might make this impact appear significant when expressed in monetary terms. Conversely, using a relatively low monetary proxy on a high impact will make this impact appear relatively minor in monetary terms. This means that the impact figures expressed in Full-Person Equivalence do not always 'match' the impact expressed in monetary terms. For purposes of comparison, we reproduce the results in terms of Full-Person Equivalence below (Figure 17).

In the context of this work, both metrics matter. On the one hand, Full-Person Equivalence metrics show where the before-and-after evolution is highest (pre and post-RPP, net of counterfactual). On the other, the empirical valuation exercises conducted, point to which of these impacts are the most valued by stakeholders. For example, Trainers' knowledge and skills improved by 41% while their family relationships improved by 36%. However, our empirical exercises suggest that trainers value the latter (\$3,840 per person per annum) considerably more than the former (\$708). As such, although the improvement is higher for knowledge and skills, the improvement in family relationships (although smaller) is 'worth' considerably more to stakeholders.

Figure 17: The impact of the RPP, net of deadweight and change attributable to other actors



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## 7. Discussions and conclusions

### 7.1 Main findings

The evidence provided through this SROI analysis has shown that:

- The Responsive Parenting Program (RPP) is an effective intervention from a return-on-investment perspective. At a minimum, it generates double the value for the cost it requires for implementation, for the stakeholders sampled for our analysis. At a maximum, our estimates show that for each \$1 invested, it creates \$3.5 of social value.
- The RPP generates the highest amount of value for its primary beneficiaries, i.e. parents, and children under the age of 5. This is indicative of its allocative efficiency; reaching effectively the population groups that it originally targeted.
- The value created through the RPP reflects the priorities originally set out by ChildFund. Although it contributes less to children's physical development, it generates its highest amount of value, by heavily contributing to children's emotional and social developments. This is where the RPP is a 'central' actor and where its comparative advantage lies. Similarly, it contributes more to social, emotional and empowerment outcomes for parents than to strict economic outcomes *per se* - such as income generation.

### 7.2 Improvements to the program

This analysis has equally brought to the light some of the areas for development and improvement of the RPP. The fact that the RPP builds parents' awareness, skills and knowledge around early child development does not mean that parents subsequently have the capabilities to act in their everyday lives, independent of their circumstances.

Building on the results of the SROI, we measured the correlation coefficient between a) household income and improvements in nutrition of children (post-RPP) and b) orchard development and improvements in nutrition of children (post-RPP). We found that there is a 65% correlation between improvements in nutrition of children and household income. We also found there is a 71% correlation between orchard development and improvements in children's nutrition. This shows that investing in vegetable gardens is an effective way of improving children's nutrition - and potentially an effective income-generation activity. It also means however that those households with a) the lowest incomes and b) no land to develop an orchard/ vegetable garden (these may overlap), are unable to apply their knowledge regarding nutrition in practice.

In this context, for example, income-generating activities might be critical for the effectiveness of the intervention. For those households who do not have a garden or access to land, an improvement may come through a design of alternative means of income generation.

An additional finding from this research concerns costs - more specifically the inputs provided to implement the intervention. In Carchi, approximately 17% of the total inputs to the RPP are non-financial, i.e. unpaid and not included into the budget of the program. Expressed differently, this amount is equivalent to

one fifth (20.37%) of the existing budget. This is a substantial amount. Of these non-financial inputs, 15.2% are provided by parents, in the form of time and in-kind donations, 60.8% by trainers, also in the form of time and in-kind donations, and finally 24% by communities.

Although this is linked to the delivery model of ChildFund's program, whereby communities and community members are deliberately and voluntarily involved, this can pose a risk for the financial viability of the program itself. This might not be a concern in the short run, however if, in the medium to long term, this contribution of stakeholder and community members was to be reduced, then the effectiveness and cost-effectiveness of the RPP could be significantly reduced as well. Finally, on the one hand, the involvement of trainers and volunteers seems to increase their employability and therefore future prospects; on the other hand, some trainers reported that they could have been undertaking paid work, and hence that there is an disparity between short-term losses and long-term gains.

### **7.3 Evidencing results over time**

The process of developing this research, identifying outcomes, and the subsequent research tools, have helped to quantify the many changes that the program creates in the lives of stakeholders, over and above the many stories and qualitative information that have been gathered through the program to date.

The existing data that ChildFund gathers and uses is useful as a means of identifying and supporting the children in local communities that are at most risk from deprivation, exclusion and vulnerability. However, in making the case for supporting these children, especially using a community-based route, ChildFund should continue to capture an understanding of the impact of its investment, for children, for parents, for trainers and for the wider community.

The survey tools that were developed proved an efficient and effective way of capturing change for stakeholders over time, using retrospective questioning to establish a baseline and measurement of change. For the researchers, one of the most notable parts of the research was conducting the value and attribution exercises; hearing from parents and trainers who they felt was responsible for change, and how much that was worth. This exercise can help to inform program design; understanding where value is created, who contributes, and how this may change over time.

We would recommend that ChildFund continues to measure wider outcomes across the four stakeholder groups, to increase the evidence base on the effectiveness of the intervention. The data gathered, as illustrated above with regards to the attribution exercise, can prove an easy-to-apply and useful tool in understanding how and where the RPP fits in with other local interventions. The data gathered on wider changes, for parents and trainers, can also assist with any transition of the RPP into a fully community-owed model; one which is implemented through Ecuador's public and community structures. The tools we have developed are a starting point for further gathering of evidence, and can be adapted to serve the needs of the RPP in different areas.

## 7.4 Limitations of the methodology

Detailed descriptions of our methodological approach have been made throughout this report. However there were some limitations in our approach to data collection. Most of the indicators we use for the analysis were collected from participants and trainers; these indicators were subjective questions, measured across two time points using a retrospective approach.

In respect of subjective measurement it was necessary to capture new data on children's development as the program does not capture the evolution of change relative to a baseline. The ECD scale used by the program functions as a meaningful way of capturing data for coordinators, in a way that makes sense to parents, trainers and Mother Guides. However the aggregate data is not nuanced enough to show us individual children's evolution over time. In addition, many of the changes expressed in the Theory of Change for the SROI are personal, attitudinal or intangible social changes. In the absence of large, longitudinal datasets at the local level, it is impossible to measure change meaningfully without asking those involved for *their* perception of the change. Ultimately, this will result in some bias, due to factors such as social desirability, mis-estimation of changes etc. However, the SROI approach is based upon the principles of measuring and valuing what matters most to individuals; and subjective questioning, when undertaken in a standardised way, can elicit these very personal responses.

In respect of the retrospective question approach there are limitations and benefits to capturing change over time at one collection point. The main considerations are:

- In terms of recall precision, there may be concern that there will be some recall error when asking retrospectively. Studies have found this not to be the case; although the time horizon is altered (i.e. how did you feel last month, rather than yesterday), the concept of thinking about a feeling/ experience in the past is the same.
- Asking retrospective questions enables you to maintain a sequence of events in terms of how someone considers a question – how were you feeling about x then, and now.
- Subjective outcomes are difficult to study during the experience. Asking people after the event gives them time to reflect on how they were feeling.
- Measurement from a starting baseline works when you are confident of measurement at a second point. Given the limited resources, our research developed questions to ascertain before **and** after data.

## 7.5 Future research

Despite its limitations, this research is a first attempt to apply an SROI approach for evaluating an Early Child Development intervention. Compared to standard cost-benefit analysis, using an SROI approach presents the following advantages:

- Unlike existing return on investment analysis, this research takes an inductive approach. It does not test hypotheses formulated *ex ante*, but involves stakeholders in identifying the changes they experience, and the impacts

which ought to be considered in the analysis. This allows incorporating in the analysis those outcomes and impacts ('benefits') which are deemed most important to stakeholders themselves, as opposed to pre-defining what ought to be important from the standpoint of the analyst or policy-maker.

- It does not incorporate solely what is easy to quantify and value (so-called 'hard' economic or health impacts). Rather, it also considers key 'soft' impacts which have traditionally been excluded from return on investment analysis (e.g. empowerment and social and emotional developments of children). Critically, we find that 'softer' (or less tangible) impacts are extremely valuable to stakeholders, often more so than 'hard' ones.
- Previous research on the returns on investment to ECD has focused on longitudinal change, i.e. seeking to understand how investment in ECD improves long-term health and productivity prospects for citizens and the broader economy. This research is underpinned by a Theory of Change for SROI approach. Moving away from measuring longitudinal change and inferring the causation of long-term changes, it allows an understanding of what local communities are experiencing now, how that may affect their short to medium-term situation, and how it can lead to further change in the future. It allows an examination of the program by providing meaningful information for *current* decision-making.

Future research could refine methods, tools and approaches for:

- Incorporating the broader impacts of Early Child Development interventions into standard cost-benefit analysis. This would prevent the exclusion of outcomes which are valuable to the stakeholders affected by interventions, and would render cost-benefit analyses more holistic and useful for decision-making.
- Understanding the short and medium-term changes of Early Child Development interventions – notably by designing outcomes and indicators. This would render return on investment analyses more useful for short-term decision-making purposes, notably in order to ensure that ECD interventions are being effective in delivering their intended changes.

# Appendices

## Appendix I: Further SROI methodological details

Table I Stakeholder consultation

Type of stakeholder	Number of participants	Mode of consultation
Parents (participants)	25	Focus groups
Trainers (note: many trainers previously participated in the training, so could also provide feedback on their own children's outcomes)	25	Focus groups
Members of Federations and/ or Community Associations	20	Focus groups
Childfund RPP staff	11	Focus group and face to face interview
Other stakeholders: child development experts, local members of the Child Protection Committee	6	Face to face interview

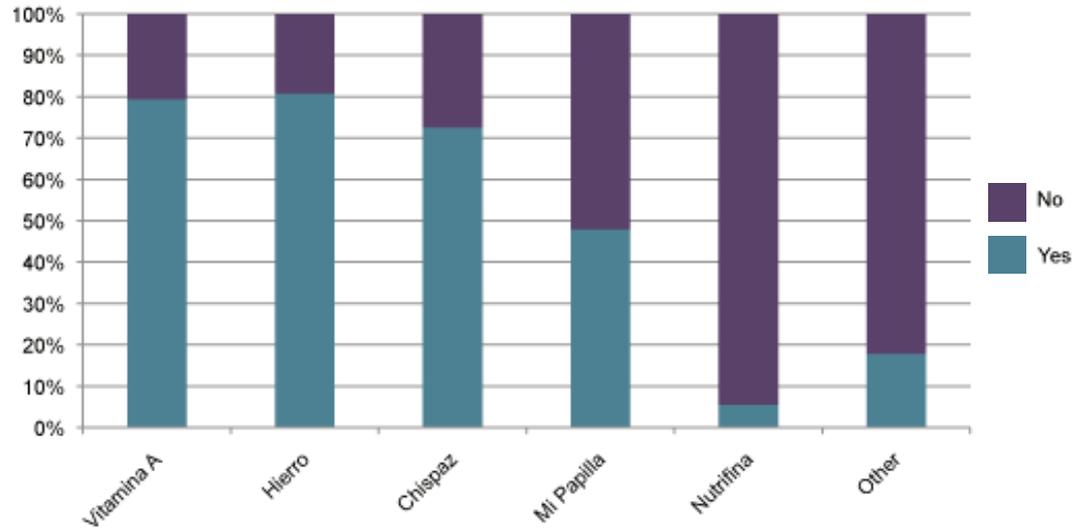
### Outcome incidence: what was excluded for the analysis?

The following figures provide a summary of key indicators collected, which were not included in the SROI analysis. These indicators might nonetheless be useful and informative for future research. The reasons for their exclusion are also outlined below.

#### *Physical health of children: Access to micro-nutrients*

In total, 93% of sampled children have had access to micro-nutrients. However, we found no comparable national data in order to compare our findings and thus understand the net impact of the program. The two key micro-nutrients widely used in the international literature as 'proxies' for health conditions are a) access to Vitamin A complements and b) access to Iron complements. As shown in Figure I, 79% and 80% of children have had access to Vitamin A and Iron supplements respectively. However, we found no comparable data at a national level.

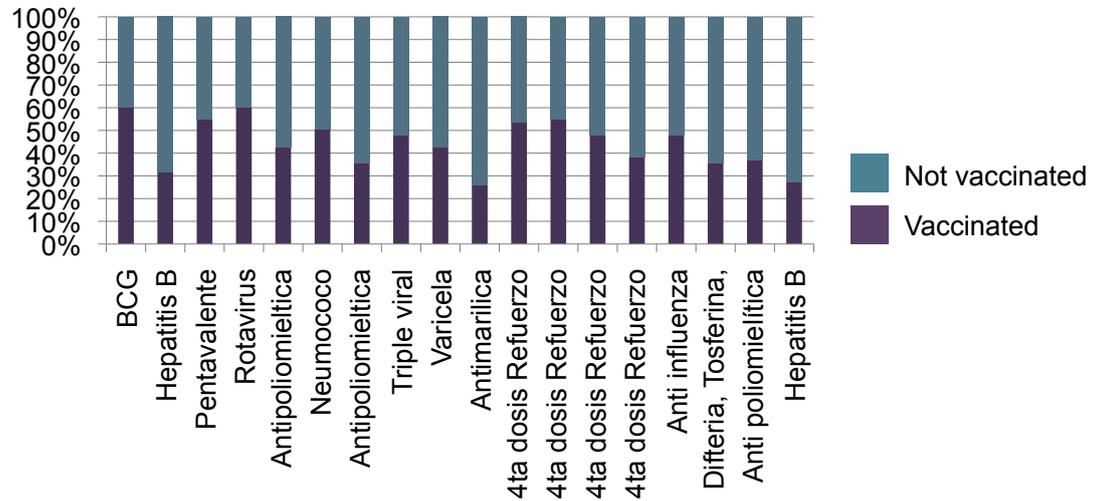
Figure I: Access to food supplements



*Physical health of children: Vaccination patterns*

Whilst we collected data to monitor the vaccinations of children, establishing a counterfactual was impossible, due to a lack of figures at a national or regional level. Indicatively, the data collected is presented in Figure II. It is worth noting that the % coverage needs to take account of the age of the children, i.e. different vaccinations are expected to be done at different ages.

Figure II: Percentage of children vaccinated



## Appendix II: Further details of outcome incidence indicators for children

Figure III Number of meals per week including meat, fruits and vegetables

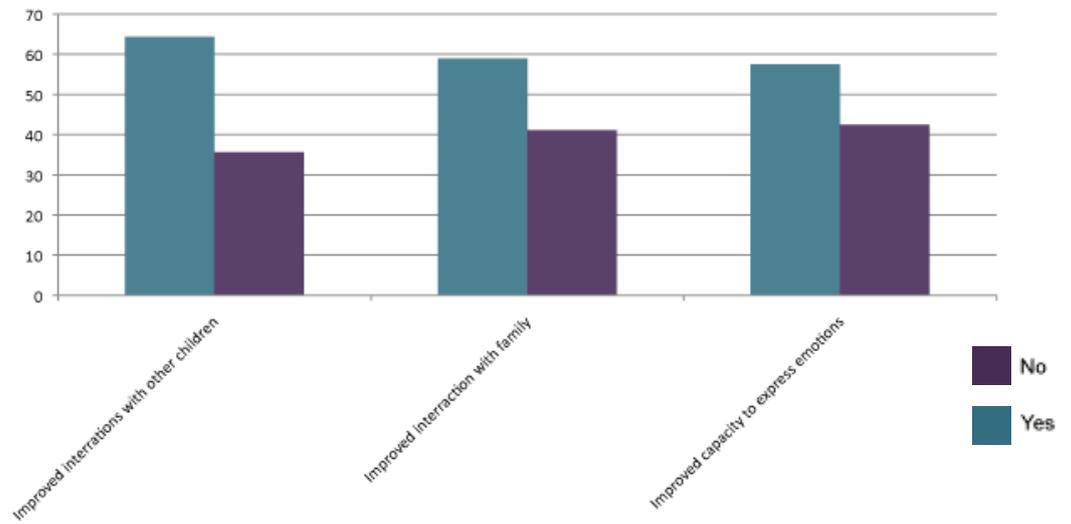


Figure IV Frequency of visits to the health center

### Health center visits/month

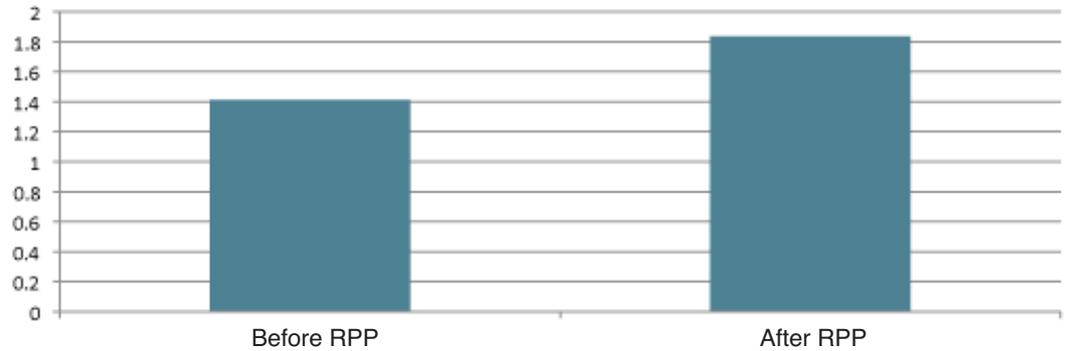


Figure V Emotional development

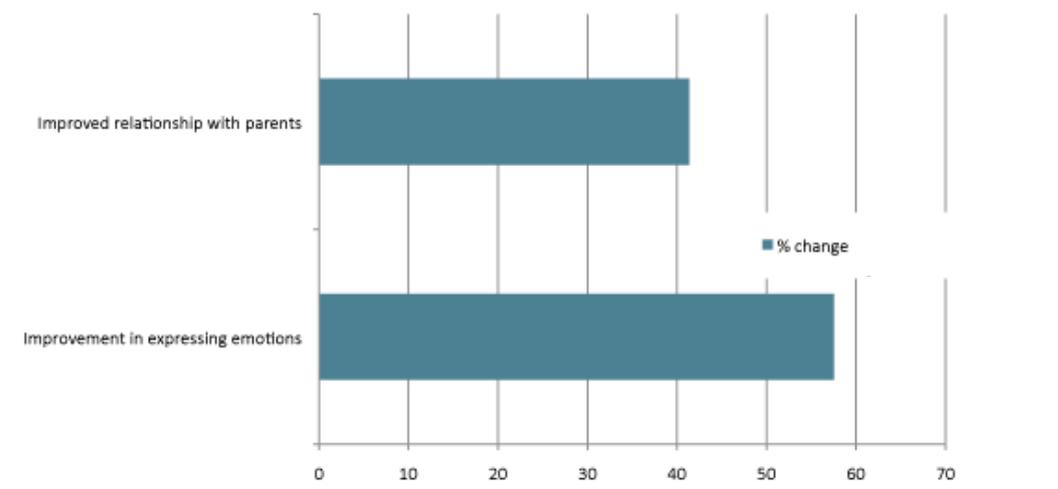
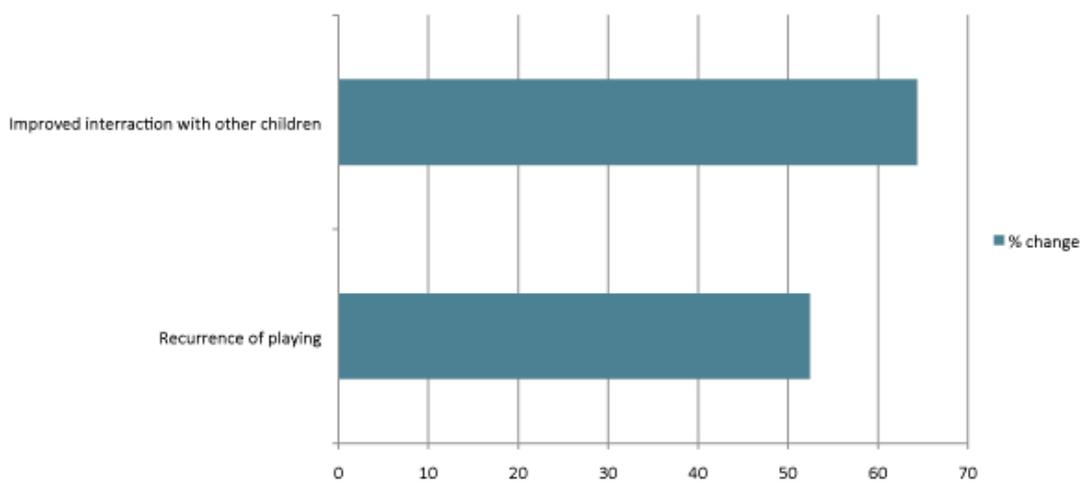
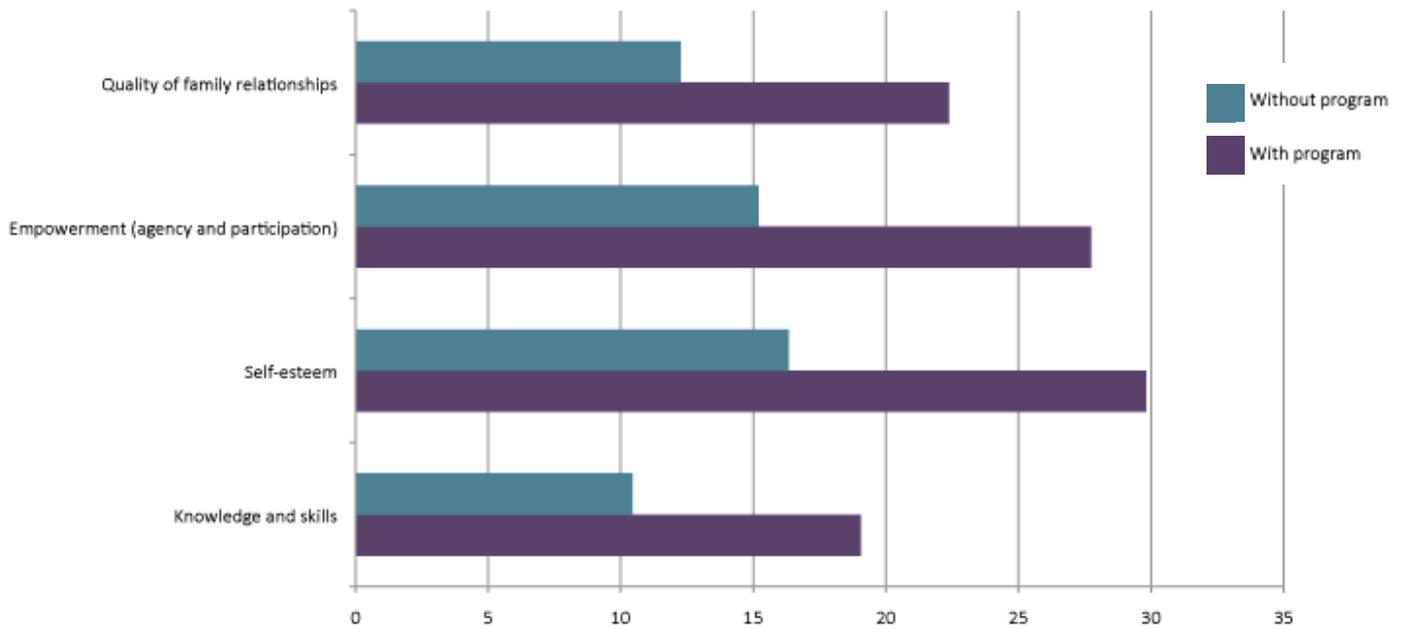


Figure VI Social development



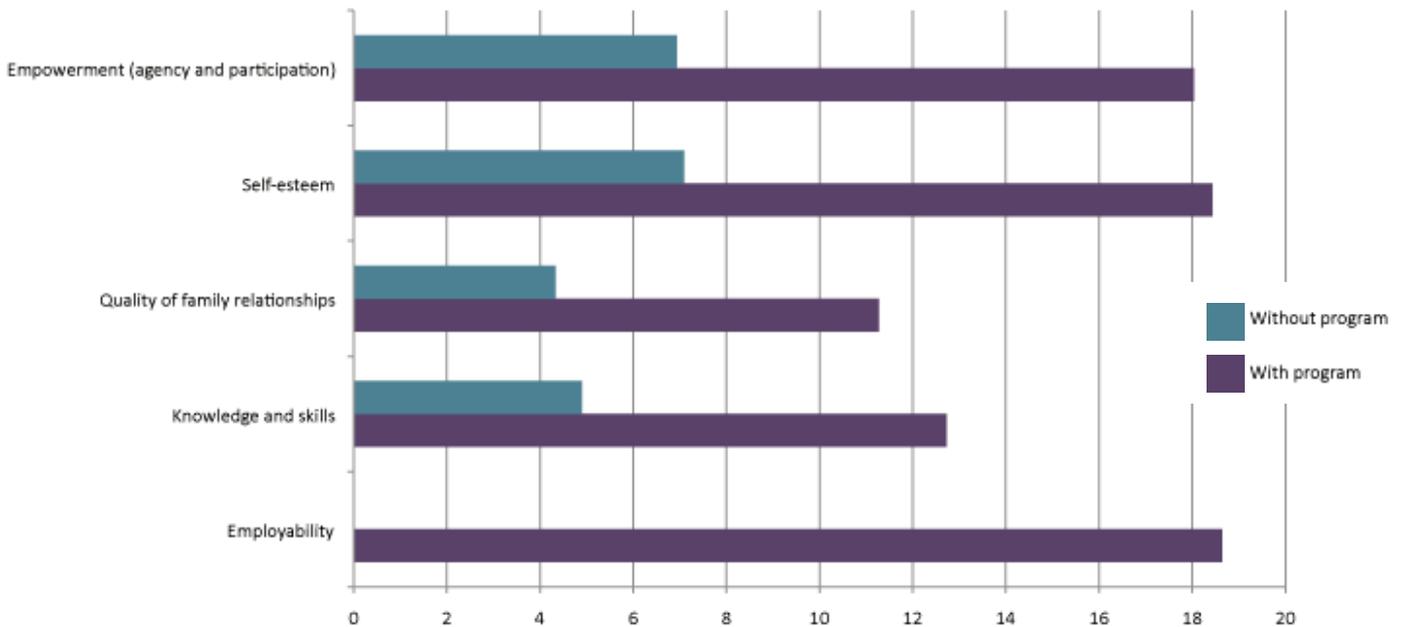
### Appendix III: Further details on impacts of the RPP on caregivers (parents)

Figure VII Impacts in terms of Full-Person Equivalence - Caregivers



### Appendix IV : Further details on impacts of the RPP on trainers

Figure VIII Impacts in terms of Full-Person Equivalence- Trainers



## Appendix V : Breakdown of results by stakeholder group

Figure IX : Distribution of value for children

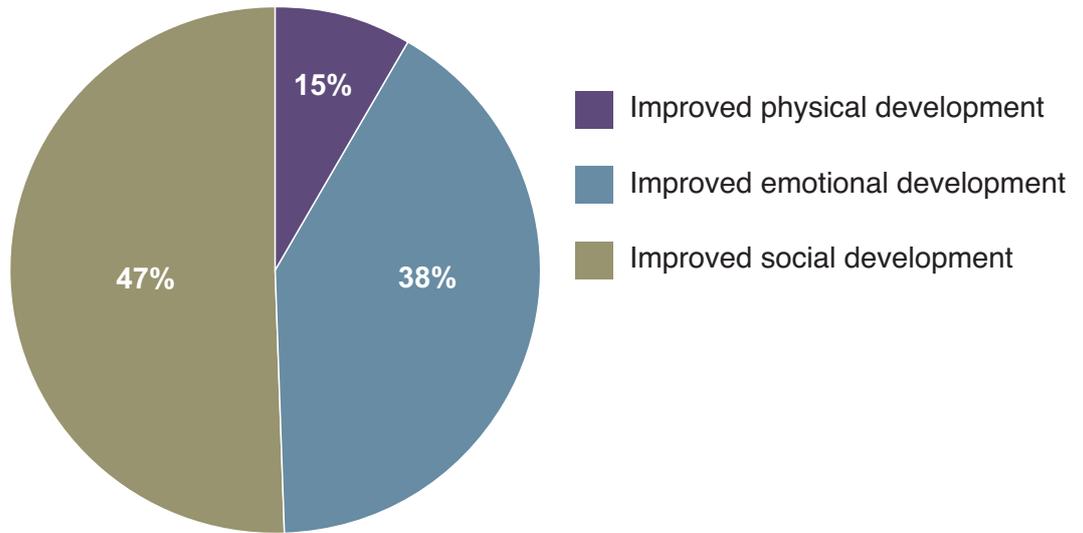


Figure X : Distribution of Value for parents

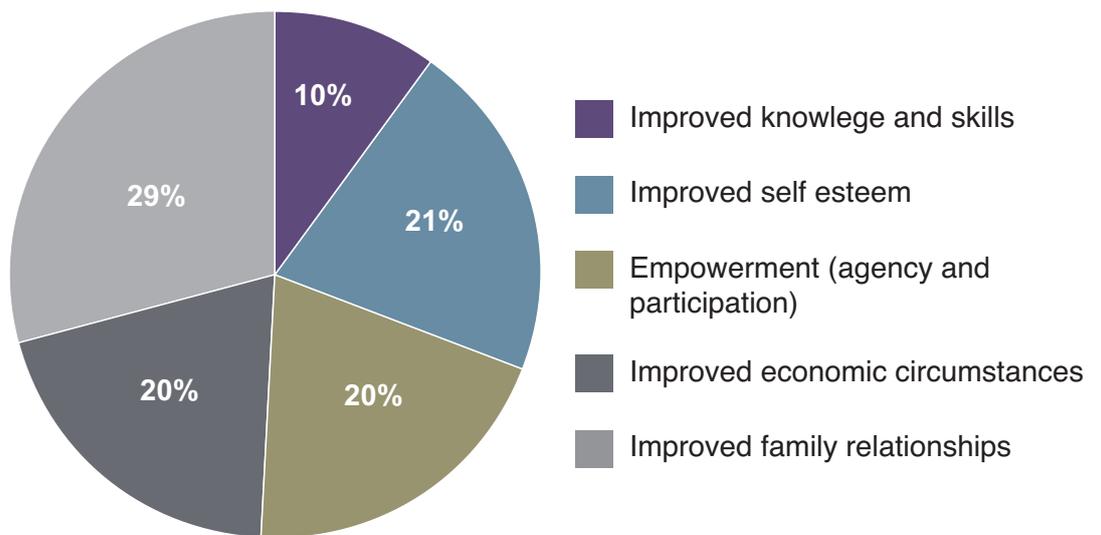
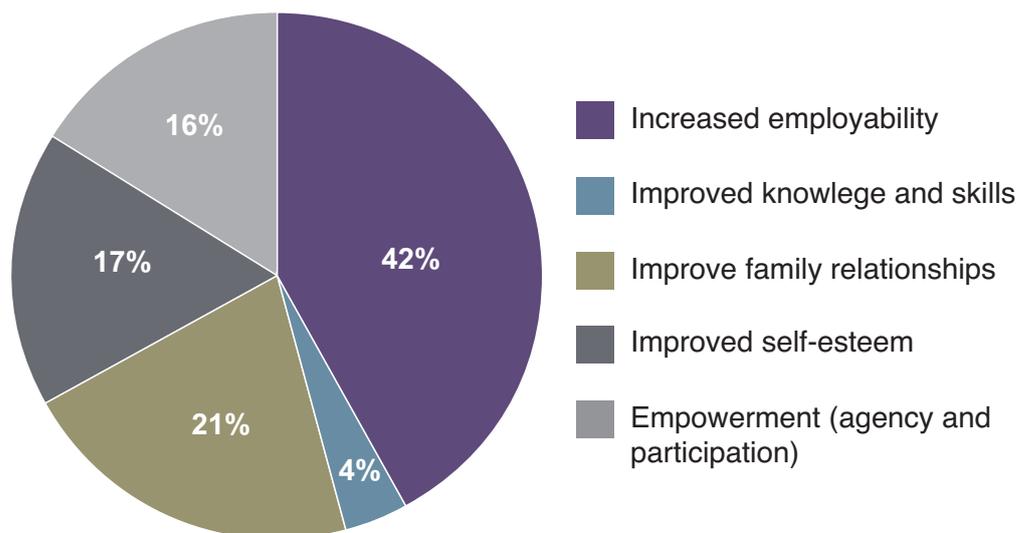


Figure XI : Distribution of Value for trainers



## Appendix VI

### Data collection tools: Questionnaires

**ChildFund.**  
Ecuador

**Encuesta para padres que participaron en el Programa**

Nombre de la persona que aplica la encuesta: \_\_\_\_\_

Cuestionario numero: \_\_\_\_\_

Fecha de la entrevista: \_\_\_\_\_ Febrero 2014

Preguntar a la persona si está de acuerdo por participar en la evaluación del programa contestando a las preguntas del cuestionario.

***Lea:** Buenos días. Estamos investigando el impacto del programa sobre numerosos beneficiarios, directos e indirectos. El objetivo de nuestro estudio es fortalecer el programa y comunicar los beneficios que genera para sus participantes. El objetivo de este cuestionario anónimo es de saber cómo el programa le ha influenciado sobre su vida personal y la vida de sus niños y familia. La información que nos da usted nos ayudara entender como el programa de desarrollo de niños de menos de 5 años ha impactado su vida personal, profesional y comunitaria. La información que nos dará usted es estrictamente confidencial y no se utilizara su nombre en ningún documento oficial.*

*¿Usted está de acuerdo participar a esta encuesta?*

SI      NO

Firma del encuestado: \_\_\_\_\_

Firma del encuestador: \_\_\_\_\_

***Lea:** Por favor conteste a estas preguntas honestamente ya que es importante conocer el impacto real que ha tenido el programa sobre usted. Primero, le vamos a preguntar unas cuestiones sobre su familia y niños. Y luego, unas cuestionas sobre su vida.*

**1. Información general**

***Lea:** Primero, nos gustaría saber un poco más de usted y de las personas que viven en su hogar.*

1. Edad: .....

2. Género: M/F

3. Estado civil:.....

4. ¿Cuántas personas viven en su hogar?.....

5. De estas personas, cuantas personas son:

- Adultos de más de 18 años:.....
- Niños de menos de 5 años:.....
- Niños entre 6-12 años:.....
- Menores de 13-18 años:.....

6. ¿Desde cuándo has estado involucrada(o) el programa de desarrollo de niños menores de menos de 5 años?: .....

7. Ingreso hoy en día:.....

8. Ingreso antes de su participación en el programa:.....

**2. El impacto del programa sobre sus niños**

**Lea:** Me gustaría preguntarle unas cuestiones sobre sus hijos y su desarrollo. Por favor conteste a estas preguntas de la forma más honesta posible. Nos ayudaría mucho que usted traiga una copia de la Carne de Salud de su niña/niño.

9. ¿Qué edad tiene el niño que participo en el programa?.....

**Pregúntale:** ¿Estaría posible mirar la Carne de Salud de su niña (o) para ver el progreso que ha hecho?

10. La evolución de la talla y el peso del niño a lo largo del tiempo

**A los encuestadores:** Por favor copia la talla y el peso del niño en la Tabla de abajo. Cuanto media y cuanto pesaba a los:

Edad	Nacimiento	6 meses	1 año	1 año 6 m	2 años	2 años 6 m	3 años	3 años 6m	4 años	4 años 6 m	5 años
Talla											
Peso											

11. ¿Qué tipo de vacunas ha hecho su niño? Por favor copie la información desde la Carne de Salud

Niños menores de un año							Niños de 12 a 23 meses						
BCG	Hepatitis B	Pentavalente	Rotavirus	Antipoliomielítica Oral	Neumococo Conjugada	Antipoliomielítica Inyectable	Triple viral	Varicela	Antimarialica	4ta dosis Refuerzo (OPV)	4ta dosis Refuerzo (DPT)	4ta dosis Refuerzo (IPV)	4ta dosis Refuerzo Neumococo Conjugada

6 a 23 meses	De 1 a 4 años			
Anti influenza	Difteria, Tosferina, Tétanos	Anti poliomiéltica Oral	Hepatitis B	

13. ¿Usted ha tenido acceso a extra micro-nutrientes para su hijo?

- SI
- NO

14. ¿Cuáles? Por favor circule sus respuestas

- Vitamina A
- Hierro
- Chispaz
- Mi Papilla
- Nutrifina
- Otros

15. ¿Usted amamanto a su niño (a)?

- SI
- NO

16. ¿Durante cuantos meses?.....

17. ¿Usted amamanto también a sus otros hijos?

- SI
- NO

18. ¿Si no, porque?

19. Antes de participar al programa, cuantas veces por semana usted preparaba para su niño y/o su familia:

- Verduras (*número de veces por semana*):.....
- Frutas (*número de veces por semana*):.....
- Carne (*número de veces por semana*):.....

20. Hoy en día, cuantas veces por semana usted preparaba para su niño y/o su familia:

- Verduras (*número de veces por semana*): .....
- Frutas (*número de veces por semana*): .....
- Carne (*número de veces por semana*): .....

20. ¿Usted tiene en su hogar un rincón donde jueguen sus niños?

- SI
- NO

21. ¿Cuánto a menudo juegan sus niños ahí?

- Cada día
- Dos veces por semana
- Una vez por semana
- Menos
- Nunca

22. ¿Cuánto a menudo usted cree que jugarían sus niños si no hubiera formado parte del Programa?

- Cada día
- Dos veces por semana
- Una vez por semana

- Menos
- Nunca

23. Usted ha observado cambios respecto a cómo su niño:

- Interactúa con otros niños
- Comunica con las personas de su entorno
- Muestra sus emociones

*Por favor, detalle su respuesta:*

24. ¿Antes de tu participación en el programa, cuanto a menudo visitaba al centro de salud (o otros servicios médicos) para su hijo o para usted mensualmente?

1. Nunca
2. Una vez
3. Dos veces
4. Más de tres veces

25. ¿Hoy en día, cuanto a menudo visita al centro de salud (o otros servicios médicos) para su hijo o para usted mensualmente?

1. Nunca
2. Una vez
3. Dos veces
4. Más de tres veces

**3. El impacto del programa sobre los padres**

*Lea: Ahorra le voy a preguntar unas cuestiones sobre el impacto que ha tenido el programa sobre usted y los cambios que han sucedido en su vida.*

26. ¿Cómo calificarías tus conocimientos de los siguientes temas **antes de tu participación en el programa**? Por favor, conteste con una "X" en la parte de la tabla que corresponde.

	No sabía nada del tema	Malo	Limitado	Bastante bueno	Excelente
Salud de los niños					
Educación de los niños					
Formas de compartir con los niños					
Planificación familiar					
Instituciones públicas					
Servicios de salud					
Difundir conocimientos y educar a otras personas					

27. ¿Cómo calificarías tus conocimientos de los siguientes temas **hoy en día**? Por favor, conteste con una "X" en la parte de la tabla que corresponde.

	No sabía nada del tema	Malo	Limitado	Bastante bueno	Excelente
Salud de los niños					
Educación de los niños					
Formas de compartir con los niños					
Planificación familiar					
Instituciones publicas					
Servicios de salud					
Difundir conocimientos y educar a otras personas					

**Lea:** Ahorra te voy a preguntar unas cuestiones sobre la relación con tu familia.

32. ¿Cómo calificarías la relación con tu(s) niño(s) **antes de tu participación al programa**?

Muy mala mala regular buena excelente



33. ¿Cómo calificarías la relación con tu(s) niño(s) **hoy en día**?

Muy mala mala regular buena excelente



34. ¿En qué medida el tiempo que pasabas con tu familia **antes de tu participación al programa** te traía felicidad?

Nunca pocas veces a veces un poco mucha



35. ¿En qué medida el tiempo que pasas con tu familia **hoy en día** te trae felicidad?

Nunca pocas veces a veces un poco mucha



**4. El impacto del programa sobre la economía del hogar**

36. ¿A usted le ayudo el programa a desarrollar un huerto familiar?

- SI
- NO

37. ¿Si tiene un huerto, que tan grande es aproximadamente (en metros cuadrados/parcela)?.....

38. ¿Que produce usted en el huerto y en qué cantidad (anualmente o mensualmente)?

39. ¿Usted aporto o sigue aportando fondos para producir en el huerto?

- SI
- NO

40. ¿Cuántos fondos aproximadamente (anualmente)? (en dólares)

40. ¿Qué más cambios usted experimento en su vida como consecuencia del programa?

- Encontró un trabajo
- Se puso a terminar su carrera educativa
- Otros (por favor especifique): .....

**5. El impacto sobre la vida comunitaria**

41. ¿Antes de tu participación en el programa que tan te sentías capaz de influenciar la vida de tu comunidad?

Nada capaz      muy poco      regular      capaz      muy capaz



42. ¿Ahorra, que tal te sientes capaz de influenciar la vida de tu comunidad?

Nada capaz      muy poco      regular      capaz      muy capaz



43. ¿Antes de tu participación en el programa, te sentías capaz de expresar tus opiniones en público en tu comunidad/ámbito social?

Nada capaz      muy poco      regular      capaz      muy capaz



44. ¿**Ahora**, que tan te sientes capaz de expresar tus opiniones en público en tu comunidad/ámbito social?

Nada capaz      muy poco      regular      capaz      muy capaz



45. ¿Con cuantas otras familias de tu entorno/comunidad que no forman parte del programa has compartido los conocimientos que te ha dado el programa?

*Por favor especifique aproximadamente el número de personas:*

**47. Cuestión sobre la contribución del programa a los cambios vividos por los participantes:**

¿Si tenías \$10 a distribuir entre los siguientes actores y organizaciones según el apoyo que te han dado para que tu niño crezca mejor, cuando atribuirías a cada uno?  
*(Nota bien: el total debe estar igual a \$10)*

- El programa.....*
- El centro de salud local.....*
- Junta parroquial.....*
- Consejo cantonal.....*
- La junta de protección de derechos de los niños.....*
- Organizaciones comunitarias.....*
- Ministerio de Salud.....*
- Otro (por favor especifique).....*

**Muchísimas gracias por su ayuda**

**Cuestionario para talleristas**



*Buenos días. Estamos investigando el impacto del programa sobre numerosos beneficiarios, directos e indirectos. El objetivo de nuestro estudio es fortalecer el programa y comunicar los beneficios que genera para sus participantes. El objetivo de este cuestionario anónimo es de saber cómo el programa le ha influenciado sobre su vida personal, profesional y comunitaria. Por favor conteste a estas preguntas honestamente ya que es importante conocer el impacto real que ha tenido el programa sobre usted. Primero, le vamos a preguntar unas cuestiones sobre su vida personal y profesional. Y luego, unas cuestiones sobre su vida social y participación en su comunidad/ámbito social.*

**Informaciones generales**

Edad:.....

Género: M/F

Desde cuando has sido involucrada(o) el programa: .....

¿Usted participo en el programa antes de ser tallerista?:

- Si
- No

¿De qué forma estaba involucrada(o)?

**Informaciones personales y profesionales**

Por favor, **rondea** sus respuestas.

1. ¿Crees que tu participación en al programa te va a ayudar en tu vida profesional futura?

- Si
- No

2. ¿Que tal fácil era encontrar un trabajo interesante antes del programa?

Nada fácil

muy fácil



3. ¿Que tal fácil crees que sería encontrar un trabajo que te interese hoy en día?

Nada fácil

muy fácil



4. ¿Como calificarías tus conocimientos de los siguientes temas **antes de tu participación en el programa**? Por favor, conteste con una "X" en la parte de la tabla que corresponde.

	No sabía nada del tema	Malo	Limitado	Bastante bueno	Excelente
Salud de los niños					
Educación de los niños					
Formas de compartir con los niños					
Instituciones publicas					
Servicios de salud					
Difundir conocimientos y educar a otras personas					

5. ¿Como calificarías tus conocimientos de los siguientes temas **hoy en dia**? Por favor, conteste con una "X" en la parte de la tabla que corresponde.

	No sabía nada del tema	Malo	Limitado	Bastante bueno	Excelente
Salud de los niños					
Educación de los niños					
Formas de compartir con los niños					
Instituciones publicas					
Servicios de salud					
Difundir conocimientos y educar a otras personas					

Por favor, **rondea** sus respuestas.

6. ¿En qué medida utilizas estos conocimientos en tu vida personal y tu forma de relacionarte con tus niños y tu familia?

Nunca                      Muy poco                      Un poco                      Mucho                      Todo el rato

7. ¿Como calificarías la relación con tu(s) niño(s) antes de tu participación al programa?

Muy mala mala regular buena excelente



8. ¿Como calificarías la relación con tu(s) niño(s) hoy en día?

Muy mala mala regular buena excelente



9. ¿En qué medida el tiempo que pasabas con tu familia antes de tu participación al programa te traía felicidad?

Nunca pocas veces a veces un poco mucha



10. ¿En qué medida el tiempo que pasas con tu familia hoy en día te trae felicidad?

Nunca pocas veces a veces un poco mucha



11. En general, dirías que tu situación económica es:

- Peor respecto a cuándo empezaste participar en el programa
- Igual que cuando empezaste
- Mejor que cuando empezaste el programa

**Informaciones sobre su vida social e comunitaria**

Por favor, **rondea sus respuestas.**

12. ¿Antes de tu participación en el programa que tal te sentías capaz de influenciar la vida de tu comunidad?

Nada capaz Muy capaz



13. ¿**Ahora**, que tal te sientes capaz de influenciar la vida de tu comunidad?

Nada capaz

Muy capaz



14. ¿**Antes de tu participación en el programa**, te sentías capaz de expresar tu opiniones en público en tu comunidad/ámbito social?

Nada capaz

Muy capaz



15. ¿**Ahora**, que tal te sientes capaz de expresar tu opiniones en público en tu comunidad/ámbito social?

Nada capaz

Muy capaz



16. ¿Que tal te sentías respetada(o) en tu comunidad/ámbito social **antes de tu participación en el programa**?

Nada respetado

Muy respetado



17. ¿Que tal te sientes respetada(o) en tu comunidad/ámbito social **hoy en día**?

Nada respetado

Muy respetado



**Muchisimas gracias por su ayuda.**