

Overview of the Early Childhood Peace Consortium’s Early Childhood and Peacebuilding Research and Practice

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And the ECPC Research Working Group

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This white paper is prepared by Sascha Hein, on behalf of the ECPC Research Working Group for the 78th Session of the United Nations General Assembly High-level Session “Early Childhood Development: Pathways to Sustainable Peace”.

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About the author

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About the ECPC

The ECPC is a global consortium of United Nations agencies, Non-Governmental Organizations, academia, practitioners, and the private sector focused on sharing scientific and practice-based evidence on how investment in early childhood development (ECD) can contribute to sustainable peace, social cohesion, and social justice. We recognize that investing in ECD is a powerful and cost-effective strategy for reducing violence, poverty, and exclusion and for building peaceful societies.

For further information please visit the ECPC website at ecdpeace.org or write info@ecdpeace.org.

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Sascha Hein, on behalf of the ECPC Research Working Group

Summary

Early childhood development (ECD) is a critical period in a child's life, impacting their neuropsychosocial health and ability to reach their full developmental and economic potential. ECD is endorsed as a transformative element in the 2030 Sustainable Development Goals (SDGs), which emphasize the importance of equal access to early learning and lifelong education for all children. However, many children do not receive adequate nurturing care due to socioeconomic stresses and caregivers' mental health. Research has shown positive effects of ECD interventions that incorporate nurturing care. The available evidence also indicates that how a community attends to its children (their health, safety, sense of being loved and valued) can set the stage for a more peaceful world. However, limited evidence specifically examines pathways from early childhood to peacebuilding (that is, actions that promote sustainable peace by supporting prosocial skills needed for peace¹). This review summarizes the interdisciplinary body of knowledge that can help build a peaceful, equitable, and sustainable world through effective ECD programming. To address today's global inequities, researchers and practitioners must better understand family and community dynamics and their implications for child development. This knowledge is crucial to tailor evidence-based ECD services to family and community needs and promote the long-term acceptability, uptake, and sustainability of programs. However, governments or policymakers still need to thoroughly prioritize high-quality ECD services. This review emphasizes the importance of cross-sectoral partnerships and coalitions to propel effective ECD research, programming, and advocacy.

Donors, governments, and policymakers must prioritize investments in translational research of the relationships between early childhood development and peacebuilding outcomes, such as social cohesion, community mobilization, diversified social networks, and trust. Early experiences, as determined by the interaction between the developing child's brain and the immediate environment, lay the foundation for

violent or peaceful relations and behaviors in later life. Interventions targeting the family, or the developing child can impact the child's propensity for violent or peaceful relationships and behaviors in later life. This review summarizes the interdisciplinary body of knowledge generated by members of the Early Childhood Peace Consortium (ECPC) that can help build a peaceful, equitable, and sustainable world. This review details global ECD research to better draw the connections between parenting, bio-behavioral development, and peacebuilding efforts. While there is growing evidence for a catalyst role of ECD programs and families in conflict-affected regions, more significant structural interventions are needed to sustain more peaceful, socially cohesive, and resilient communities.

Four areas of **key findings and recommendations** for research and practice at the intersection of ECD and peacebuilding emerged from this review:

1. Preprimary education and 0-3 parenting programs can significantly improve early learning. Supporting parents and their partners in caring for their children can improve child outcomes. Research in hard-to-access regions has shown that caregiver-guided education and mass media can contribute to peace and stability.
2. Engaging caregivers in ECD interventions can reduce conflict, violence, aggression, and psychopathology, benefiting their children's well-being and developmental outcomes. Engaging fathers in care can improve family well-being and reduce caregiving stress. Effective community engagement, self-sustaining programs, and stakeholder involvement are crucial for widespread peacebuilding and successful implementation.
3. The available evidence demonstrates the added value of engaging youth in intergenerational programs. The ECPC can serve as a youth access point for peacebuilding projects. Research co-designed and implemented by youth and ECPC researchers could inform the next generation of peacebuilding research.
4. Research on ECD and peacebuilding primarily focuses on individual outcomes, neglecting community and structural factors. A new generation of research is needed to understand the multi-level effects of ECD programs on social cohesion

and community-level aspects. Such analysis must also account for the neurobiological foundations that shape early life experiences and subsequent pathways to peace.

Introduction

By the end of 2022, 108.4 million individuals were forcibly displaced worldwide due to persecution, conflict, violence, human rights violations, or events seriously disrupting public order—children below 18 constitute about 40% of the refugee population ². Humanitarian crises, poverty, and exposure to war, violence, and trauma place children and families at heightened risk of suffering from physical, behavioral, or emotional problems ³. Thus, there is an urgent need to identify factors that may promote opportunities for children who are displaced due to conflict, disasters, and other crises because they are particularly vulnerable to direct trauma exposure and stressors, hazardous living conditions, unsafe environments, challenges in meeting basic survival needs (e.g., access to food, water, shelter, health care), and social isolation ^{3,4}. Thus, it is vital to ensure children and their families have access to support and resources that enhance the quality, safety, and security of the environments where children develop and may equip caregivers with adequate strategies (such as responsive care and stimulation) that promote holistic development for their children across the life-span.

In the 2014 “Ecology of Peace” framework, Pia Britto, Ilanit Gordon, William Hodges, Diane Sunar, Cigdem Kagitcibasi, and James Leckman¹ posit that “positive, stimulating, and harmonious early childhoods can contribute to peace and human security and that early-life interventions have transformative power which could help lay the foundations for conflict resolution and peace in future generations.” (p. 28). The authors further hypothesize that, among other factors, enhancing positive reciprocal communication within families contributes to such positive early childhoods and, consequently, peacebuilding. Peacebuilding is defined as “actions that promote sustainable peace by supporting the prosocial skills needed for peace” (p. 28). Sustainable peace, thus, can result from actions that address the root causes of violence. Such efforts have neurobiological foundations (e.g., genetic, epigenetic, and hormonal factors) that shape early life experiences, particularly in the first three years. Biological changes (e.g., in response to prolonged exposure to stress without protective relationships) mediate the relation between the early psychosocial environment and

child developmental trajectories of the life course⁵. In the early years, **accessible and quality early childhood development (ECD) services and programs** (e.g., preschools, childcare centers), **early learning opportunities, stimulation** (e.g., talking, singing, and playing), and **responsive caregiving** (e.g., early bonding, secure attachment, trust, and sensitive communication) play a vital role in promoting outcomes relevant to peacebuilding including social cohesion and the reduction of conflict⁶⁻⁸. These factors underscore the importance of improving the caregiver's capacity to provide safe, stable, and nurturing relationships.

In this evidence review, we aimed to review recent research by members and partners of the Early Childhood Peace Consortium to update the evidence base of the links between ECD and Peacebuilding. The overview and analysis of the research will

- (1) highlight the significance of accessible ECD services,
- (2) provide evidence of how ECD services have proven to be successful in advancing peace and strengthening social cohesion, and
- (3) conclude with recommendations for future international and collaborative research.

Method

This section outlines the methodology used to conduct the evidence review.

Search Strategy. This review is based on a systematic search and review of the publications of 46 members of the Early Childhood Peace Consortium (Appendix 1). The following electronic databases were accessed: Web of Science, PsycINFO, ERIC, Medline, PubMed, APA PsycArticles, and SocINDEX. Authors were searched by full name. In September 2023, key publications recently accepted for publication or revised for publication in peer-reviewed journals were solicited from selected ECPC members and included in the review.

Inclusion and Exclusion Criteria. References and documents were included in this research if they met the following criteria:

- a. *Document types:* Articles and conference proceedings published in journals with a double-masked peer review process. The article must report the analysis of original, empirical data.
- b. *Timeframe:* Published between January 1, 2015, and July 31, 2023. The year 2015 was a landmark year for several significant policies and agreements, including (but not limited to) the 2030 Agenda for Sustainable Development and the Paris Agreement on Climate Change.
- c. *Language:* The findings of the research must be reported in the English language.
- d. *Population and study design:* The focus is on early childhood (0-8 years of age). However, because research on pathways to sustainable peace necessarily requires a life-course perspective, all studies are considered for inclusion in the review that have relevance for ECD and Peacebuilding and may involve youth, families/caregivers, or grandparents. This was done to better capture family-level pathways of child and youth development. Qualitative, quantitative, and mixed-method designs and case studies are included. Reflections on the impact of COVID-19 on ECD and Peacebuilding are also eligible.
- e. *Geographic regions:* Global research is considered; however, for research conducted in the Global North, the study must focus on vulnerable populations (e.g., refugee immigrant families).

Research was excluded from this review if

- a. There was no direct thematic relevance for ECD and Peacebuilding or
- b. The study did not report original data (e.g., narrative and scoping reviews, systematic reviews, meta-analyses of published research, viewpoints, editorials, correspondences, commentaries, and study protocols).

Selected narrative and systematic reviews were not included in the coding but were used to inform the conclusions and recommendations.

Data extraction. A subset of 147 articles were prioritized for in-depth data extraction. Some of these articles reported data from multiple samples. In total, records and data from 160 studies/samples were extracted. The following information was extracted from each of the reviewed studies:

- i. Location and setting (country, district, municipality)
- ii. Study design (e.g., observational study, intervention study, longitudinal or cross-sectional design, presence of a control or comparison group, mechanism of assignment of individuals to the control or comparison group)
- iii. Key sample characteristics (e.g., sample size, key demographic characteristics)
- iv. Outcomes of the participating children, adolescents, and adults, including caregivers and teachers
- v. Key findings about early childhood education and peacebuilding

Analysis of ECPC Research

Database

The search yielded a total of 668 articles that report primary research. Of these 668 articles, 203 met this evidence review's inclusion criteria. ECPC members and partners published an average of 2.23 peer-reviewed journal articles per month with direct thematic relevance for ECD and Peacebuilding. Of the 465 excluded articles, 201 reported primary research on a topic without immediate links to ECD and Peacebuilding. Sixty-two papers reported studies conducted in the Global North without a specific focus on early childhood development, peacebuilding, or primary or applied research with vulnerable or disadvantaged children and families. Moreover, 203 articles were excluded that did not report original data.

Study locations

ECPC members published research conducted in 25 countries. Two studies^{9,10} reported global data from key informant interviews and expert consultations. Figure 1 shows the geocoded locations of all studies conducted with the involvement of ECPC members since 2015.

ECPC Study Sites

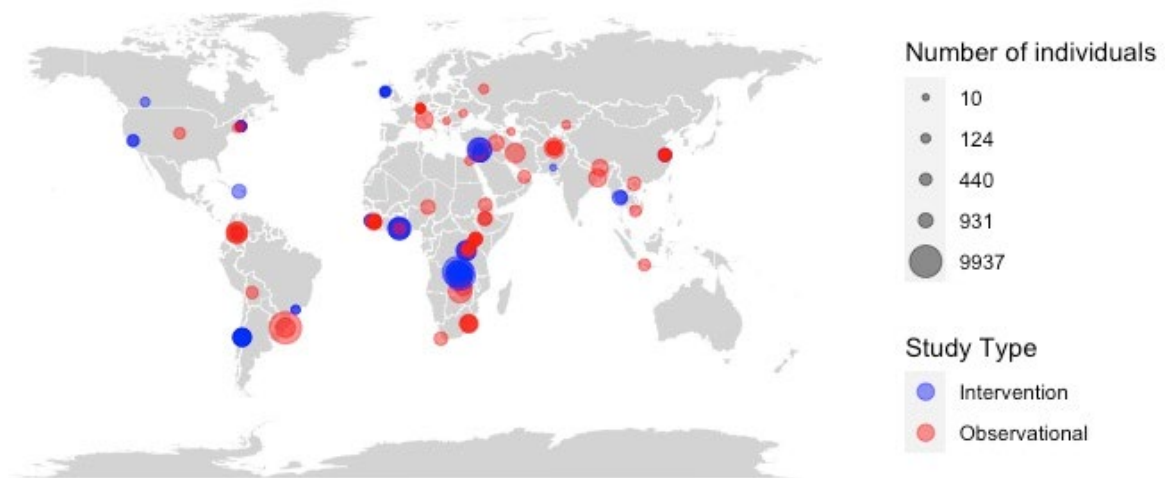


Figure 1. Location of studies conducted by ECPC members and partners since 2015.

Large-scale observational studies were conducted, for instance, in South America to investigate the quality of early childhood education in Colombia¹¹ and to determine the prevalence of psychiatric problems among 6- to 12-year-old school students in Brazil^{12,13}. Large-scale intervention studies were implemented with youth in Sierra Leone¹⁴⁻¹⁷

and Jordan¹⁸⁻²⁰, and with 2nd to 4th-grade students in the Democratic Republic of the Congo^{21,22}.

Figure 2 shows a map of the locations of studies that reported outcomes of children aged 0 to 8 years. A notable example of an intervention study is the “Quality Preschool for Ghana” (QP4G) project implemented in the Greater Accra region in Ghana²³⁻²⁵.

ECPC Study Sites (0 to 8 years of age)

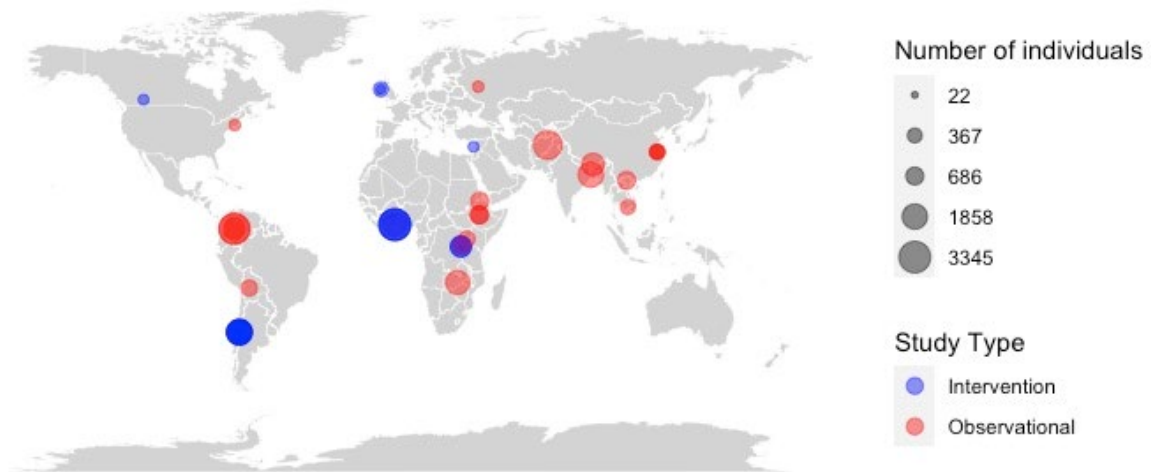


Figure 2. Location of studies with children 0 to 8 years of age conducted by ECPC members and partners since 2015.

Study design

The design of the reviewed research reflects two broad types:

1. *Observational studies*: This research design examines characteristics and outcomes relevant to ECD and Peacebuilding without direct intervention. The data are collected based on surveys, interviews, or observations of individuals in their respective contexts or environments. An observational study may be cross-sectional or longitudinal. A cross-sectional study aims to identify associations or correlations between variables. The interest in this type of study is to determine whether individual differences in one characteristic or phenomenon are associated with individual differences in another feature or phenomenon. Another aim of a cross-sectional study may be to describe a population or phenomenon of interest (e.g., the prevalence of psychopathology among individuals exposed to armed conflict). In a longitudinal study, the characteristics or phenomena of interest are repeatedly measured to determine associations of interest over time.
2. *Intervention studies*: In this research design, an intervention or treatment is intentionally introduced to measure its effects on study participants. This intervention can be a specific ECD service, an educational or parenting program, or a policy change. Intervention studies typically aim to evaluate an intervention's effectiveness or efficacy, determine what works for whom, explain why an intervention is effective, and inform evidence-based practices. An intervention study may contain a control group to establish the causal effect of an intervention. Participants in the control group are usually similar to those in the intervention group but do not receive the intervention or treatment. Sometimes, randomization assigns participants to either the intervention or the control group to reduce the risk of bias. Such studies are referred to as a randomized controlled trial.

Figure 3 shows the breakdown of the included studies by study design. A total of 160 studies were registered in this review: 98 observational studies (61.2%) and 62 intervention studies (38.8%). Seventy out of the 98 observational studies employed a cross-sectional design. The majority (54%, 53 studies) of the observational studies have employed a cross-sectional design and used quantitative methods to collect data

through surveys, observations, or the analysis of existing datasets. In this case, the data analysis involves statistical tests, including descriptive and inferential statistics, to test hypotheses. Seventeen percent (17 studies) of the observational, cross-sectional studies used qualitative methods to gather rich and descriptive data on individuals' experiences in different contexts. Standard methods used in this research include interviews, focus group discussions, ethnographic fieldwork, and other methods allowing participants to express their thoughts and feelings nuancedly. The available evidence from ECPC members and partners since 2015 includes 28 longitudinal observational studies. All longitudinal studies employed quantitative methods and measured outcomes relevant to ECD and Peacebuilding at least twice. The time between the time points ranged from 6 months to 15 years, averaging 41.7 months.

All intervention studies employed a longitudinal design and used quantitative (60 studies) or mixed (qualitative and quantitative methods, two studies) methods. In 49 of the 62 studies (79%), participants were randomized into an intervention/treatment and a control group. The control group participants received care-as-usual (e.g., enrollment in public school), waited to receive the intervention later (also referred to as the wait-list control group) or received an alternative intervention/treatment. The outcomes of interest were measured at least twice throughout an average of 16.04 months (range: 2 weeks to 60 months).

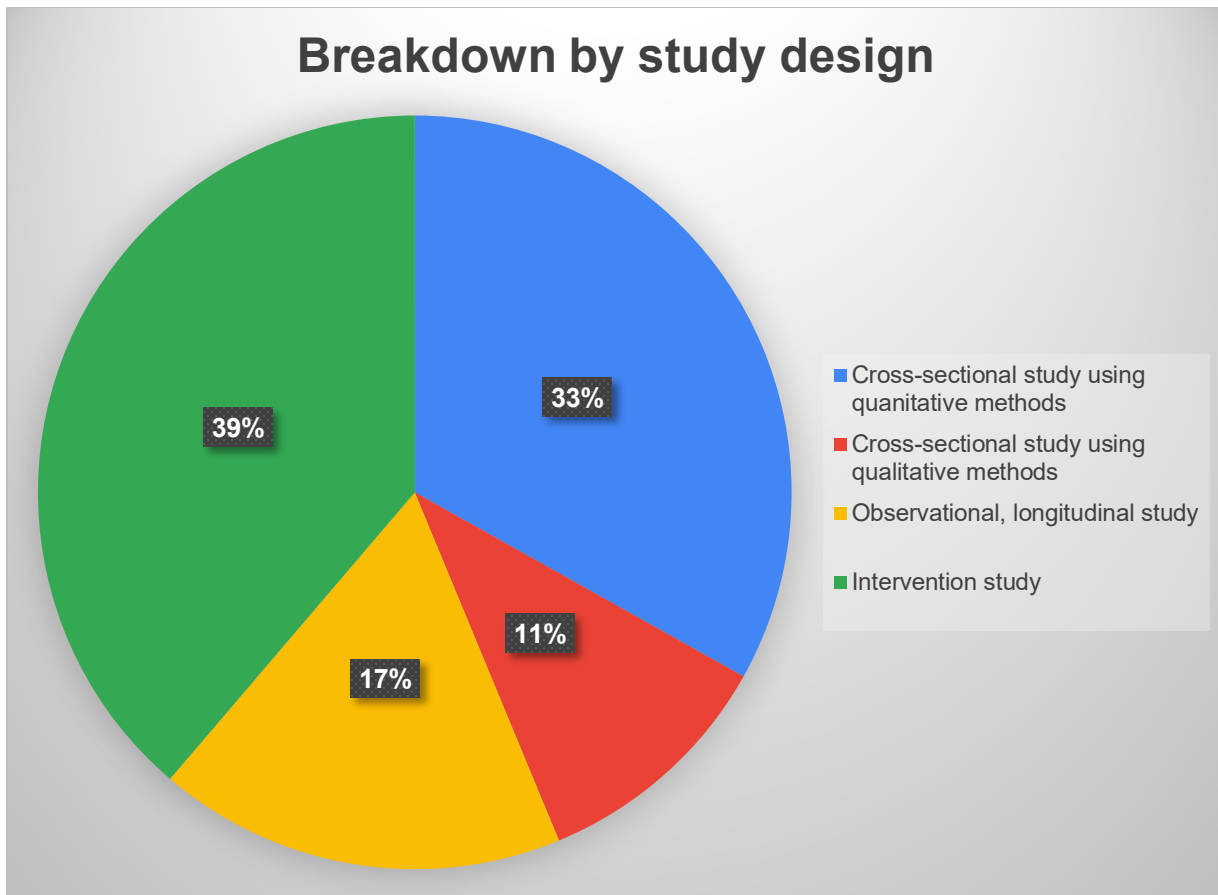


Figure 3. Breakdown of the design of studies conducted by ECPC members and partners since 2015.

Outcomes

Key child outcomes extracted from the reviewed studies were grouped into the following domains:

1. **(Early) Literacy, reading and writing**, e.g., initial sound identification, letter-word identification, knowledge of graphemes, familiar word reading, pseudoword reading/decoding, oral passage reading fluency, reading comprehension, listening comprehension, print awareness, writing of a complete sentence, dictation
2. **(Early) Numeracy**, e.g., number identification, quantity discrimination, missing number/pattern completion, word problems, addition/subtraction/multiplication

problems, shape identification/geometry, size and length discrimination, sorting abilities, one-to-one correspondence, counting

3. **Cognitive development**, e.g., non-verbal intelligence, learning skills, non-verbal reasoning, long-term memory, verbal short-term memory
4. **Language development**, e.g., receptive and expressive vocabulary, listening/passage comprehension, communication skills, receptive knowledge of lexical semantics, expressive grammar
5. **Executive function**, e.g., inhibitory control, working memory, attention shifting
6. **Motor skills**, gross and fine motor skills (hopping on one foot, copying a shape, drawing a human figure, folding paper)
7. **Social and emotional development**, e.g., self-awareness, emotional awareness, emotion regulation, empathy, peer relations, conflict resolution, problem-solving, social competence, coping (approach and avoidance)
8. **Mental health**, e.g., psychiatric symptoms, post-traumatic stress symptoms, perceived stress, well-being
9. **Externalizing problems**, e.g., conduct problems, delinquent behavior, hostile or aggressive behavior, rule-breaking behavior, social issues, disruptive behavior, hyperactivity
10. **Internalizing problems**, e.g., anxiety, withdrawn/depressed, somatic complaints, mood disorder symptoms, suicidal ideation
11. **Physical health**, e.g., nutrition intake, stunting and wasting, anthropometric growth
12. **Victimization**, e.g., war experiences, exposure to natural disasters, relational and physical (peer) victimization
13. **Other outcomes**, e.g., sources of support, self-esteem, prosocial behavior, resilience

Figure 4 provides an overview of the critical outcomes measured in early childhood (0-8 years of age). A total of 48,774 children were included in the research conducted since 2015. Less than half of these children (46.1%, or 22,497) participated in intervention studies. Another 53.9% ($n = 26,277$) of the 0-8-year-old children participated in

observational studies. Because research often reports child outcomes in multiple domains, 206,394 assessments were described in the included studies. Of those assessments, skills in early reading and writing, early numeracy, experiences of victimization, social and emotional development, and executive function are the top five domains measured in studies with young children.

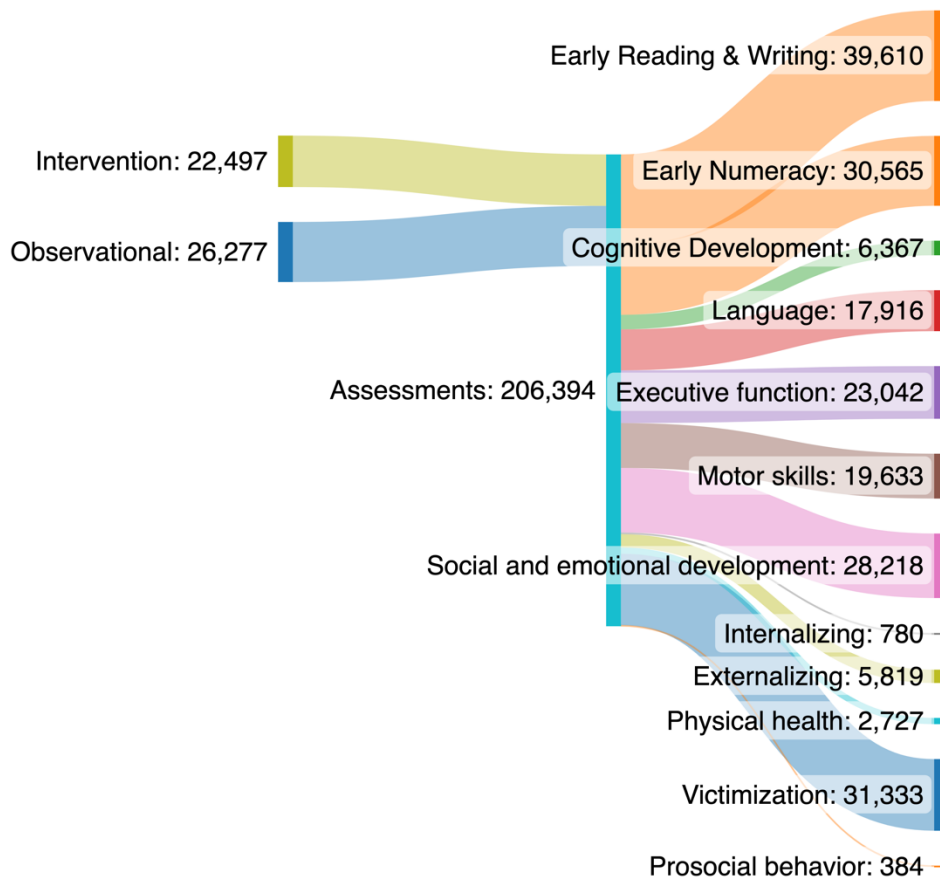


Figure 4. Critical outcomes of children 0-8 years of age.

Key caregiver outcomes extracted from the reviewed studies were grouped into the following domains:

1. **Mental health and well-being**, e.g., psychological distress such as post-traumatic symptoms, depression, anxiety, parenting stress, somatization, general quality of life
2. **Victimization**, e.g., psychological and intimate partner violence, exposure to neglect and abuse including verbal, physical, and sexual violence,
3. **Positive and responsive caregiving**, e.g., responsiveness of caregiver-child interactions, stimulation and support, parental warmth, engagement in parent-child activities, communication of love and kindness towards their child
4. **Harsh parenting**, e.g., violent disciplinary practices such as psychological aggression and physical punishment, harsh punishment, violent problem-solving
5. **Co-parenting and family connectedness**, e.g., shared decision-making between caregivers, presence of household conflict, family connectedness, couple communication, and paternal engagement.

Figure 5 shows the breakdown of caregiver outcomes across the five key domains. Data from 13,406 caregivers was used to code a total of 27,276 assessments. Caregiver outcomes are evenly distributed across the five domains except for harsh parenting, which was measured in a total of 3,322 caregivers.

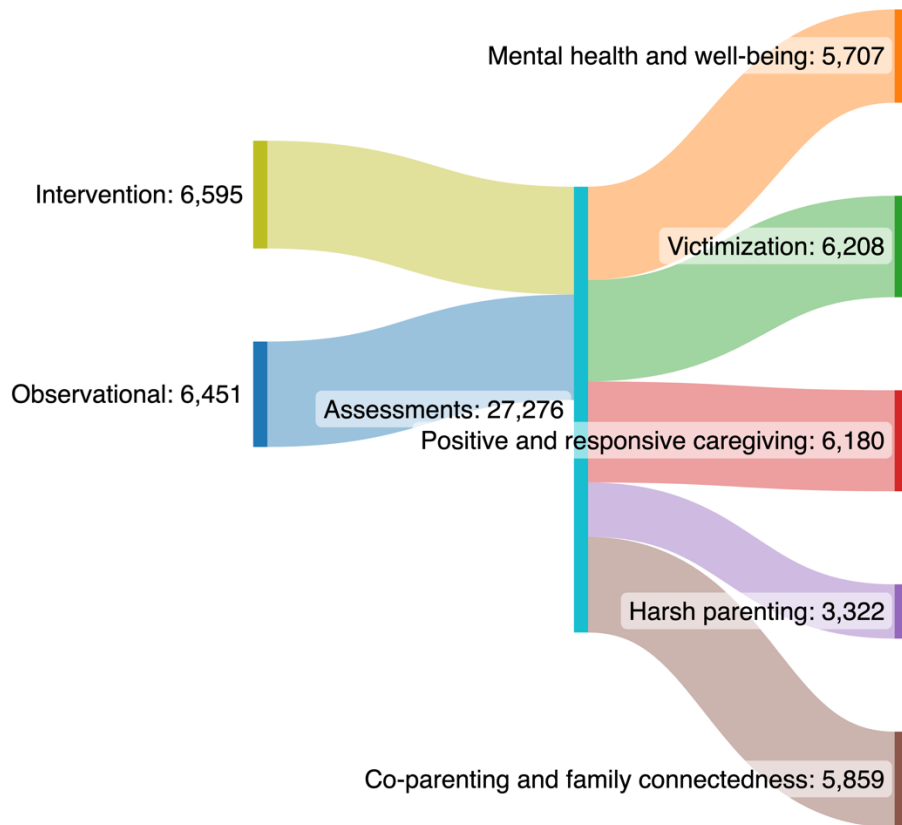


Figure 5. *Critical outcomes of caregivers.*

Key findings that underscore the importance of early childhood development for peacebuilding

The following illustrative examples highlight the scope of the collective evidence generated by the ECPC members and partners since 2015.

Accessible and quality early childhood development (ECD) services and programs and early learning opportunities

A pertinent example of a study that examined the **quality of early childhood education** is the research by Carolina Madonado-Carreño, Hiro Yoshikawa, and

colleagues published in 2022¹¹. In this study, the authors conducted a large-scale assessment of a nationally representative sample of 3,163 children (average age = 4.3 years) in Colombia to determine the associations between early childhood education and children's development. The authors collected comprehensive data on children's skills in reading, writing, mathematics, executive function (i.e., short-term memory and inhibitory control), motor development, as well as indicators of cognitive and language development. The findings of this study showed that the number of hazards and unclean conditions were associated with lower teacher-rated positive social skills and higher externalizing behaviors. Of note, only 14% of the total possible hazards and unclean conditions were, on average, present on the day of the observation. In addition to these structural quality indicators, the authors observed several pedagogical processes and instructional activities in the ECE centers. They found that higher levels of pedagogical quality were related to higher levels of direct assessments of children's emergent numeracy, emergent literacy and language, social-emotional development, motor skills, and executive functions. To assess pedagogical quality, trained observers rated whether creative thinking was promoted, children received feedback, transitions were announced, individual and positive interactions were facilitated, children were encouraged to choose activities, inappropriate behavior was addressed, learning activities varied throughout the day, and learning was connected to children's prior experiences and knowledge.

In a randomized longitudinal study conducted with adolescent mothers and their infants living in poverty in Brazil, Alarcão and colleagues²⁶ and Fatori and colleagues²⁷ examined the impact of the **Primeiros Laços home visitation program**. The program is delivered by trained nurses to first-time pregnant adolescents and their infants, spanning the first 16 weeks of pregnancy until the child is aged 24 months. Pregnant adolescents in the control group received healthcare as usual. The participating adolescent mothers were, on average, 17.1 years old, 43.8% were enrolled in school, and 21.3% and 23.8% reported depression and anxiety symptoms, respectively. The authors found that infants whose mothers participated in the program were more securely attached and involved with their mothers at 12 months of age than children

who received care as usual. In another study with the same sample ²⁷, the authors found positive effects of *Primeiros Laços* on child expressive language development, maternal emotional/ verbal responsiveness, and opportunities for variety in daily stimulation. Another example of a home-visiting intervention is called *Sugira Muryango*. This strengths-based and father-engaged early childhood development and violence-prevention home-visiting program examined by ECPC member Theresa Betancourt and her colleagues includes 12 modules delivered by community law workers. *Sugira Muryango* has been implemented in several districts in Rwanda. Across published research from a randomized controlled trial, Betancourt and colleagues ²⁸⁻³² found significant effects of the program on increased shared decision making, reduced household conflict, increased female caregiving warmth, increased engagement of male caregivers in child care, reduced caregiver anxiety and depression, decreased harsh discipline, decreased intimate partner violence, increased engagement in ECD activities, increased care seeking for health-related problems of young children (e.g., diarrhea, fever), improved hygiene behaviors such as proper treatment of water, improved child gross motor, communication, communication, problem-solving, and social skills. Qualitative data further identified daily hardships and alcohol problems as risk factors related to violence, harsh discipline, and intimate partner violence.

In a series of studies, ECPC member Hiro Yoshikawa and colleagues examined the impact of *Un Buen Comienzo*, a **professional development program implemented with prekindergarten and kindergarten teachers** in Chilean public schools serving low-income families. A total of 18 professional development sessions were carried out during each of the two years of program implementation. The sample of the impact evaluation of *Un Buen Comienzo* ³³ included 1,876 preschool children from 90 classrooms in 64 schools in Santiago de Chile. At baseline, children were, on average, 53.93 months old. The authors assessed several child outcomes in the domains of reading (e.g., letter-word identification), early writing, vocabulary, self-regulation, and (low) problem behavior. Emotional support, instructional support, and classroom organization provided by the preschool teachers were also measured. The authors found significant improvements in emotional and instructional support and

classroom organization in prekindergarten classrooms following one year of the program. After two years of the program, there were still positive and moderate effects on emotional support and classroom organization. However, only a marginal impact of the program on child outcomes was observed, reflecting a slight increase in a composite measure of self-regulation and a reduction of problem behaviors. In a subsequent study, the authors found positive impacts only for children with the lowest likelihood of preschool absenteeism³⁴. Moreover, there is evidence that Un Buen Comienzo contributed to a 26% increase in the probability that literacy instruction would occur and a 25% increase in the likelihood that vocabulary support would be provided by the participating preschool teachers³⁵. The occurrence of such forms of instructional support by teachers is essential because, in another study with the same sample, Mendive and colleagues³⁶ found that children's gain in reading and writing skills were, in part, related to overall program dosage over the two years of program implementation. In 2017, Gomez and Yoshikawa³⁷ published a study that estimated the relationship between exposure to the 2010 Chilean earthquake and preschool children's early and executive function skills. Using data from the evaluation of Un Buen Comienzo, which was underway when the quake shook southern Chile in 2010, the authors compared the outcomes of children exposed to the earthquake and a comparison group of children who began preschool and experienced data collection the year before the earthquake. They found that children who experienced the earthquake, or whose parents reported experiencing more stressors due to the earthquake, scored lower on specific language and pre-literacy assessments compared to those who were unaffected.

Another example that showcases the potential of professional training for teachers is the "Quality Preschool for Ghana" (QP4G) project, a one-year **teacher training and coaching program** designed to improve preschool quality and child development. A series of investigations co-led by ECPC member Lawrence Aber²³⁻²⁵ compared the impact of three conditions: (1) teacher training, (2) teacher training plus parental awareness meetings, and (3) a control group. The randomized controlled trial included 3,345 children with an average age of 5.2 years (at baseline; average age of

10.7 years at the five-year follow-up ²⁵) and 444 teachers from 240 preschools in the Greater Accra region. After one school year, teachers who participated in the program reported less burnout and were found to provide increased emotional support, behavior management, and support for student expression. Reduced turnover was observed among the teachers in the training condition. The program also showed minor effects on children's early numeracy, early literacy, and social-emotional skills but not executive function. Another year later, the authors found that these impacts of the teacher training intervention on children's overall school readiness were sustained, particularly for social-emotional skills, but were only marginally statistically significant. Five years after beginning the randomized trial ²⁵, the authors examined children's engagement in remote learning during the COVID-19 pandemic. They found that children who attended higher-quality early childhood education at age 4 or 5 years had greater engagement in remote learning in October 2020 but not better language, literacy, and math scores.

Finally, there is emerging evidence (currently under review) from a large-scale randomized controlled trial conducted by ECPC member Hiro Yoshikawa and colleagues at Sesame Workshop, the International Rescue Committee, and the University of Pennsylvania that an 11-week, 31-session **remote early learning program** combined with a remote parenting support program has the potential to improve child development in the domains of literacy, numeracy, child play, and learning interactions, and to reduce caregiver-reported likelihood of spanking. These results emerged with 5-6-year-olds and their families (96% are Syrian refugees) in hard-to-access settings in Lebanon. In a study in Jordan, the authors recently examined the impact of a phone-based caregiver support and parenting program for Syrian and Jordanian families using a randomized controlled trial. The phone-based intervention included calls to provide health, nutritional, parenting, and caregiver-focused content. Initial findings show that exposure to the intervention was associated with significantly reduced caregivers' depressive symptoms and an increased likelihood of caregivers reporting watching the *Ahlan Simsim TV show* with the children. *Ahlan Simsim* is a locally produced Arabic-language version of *Sesame Street*. The corresponding papers are currently under review in peer-reviewed academic journals.

Family stimulation and responsive caregiving

The study by Cuartas and colleagues published in 2023³⁸ aimed to examine the links between family stimulation and early childhood development outcomes. The authors analyzed data from 4,904 children with an average age of 51.5 months and their families. The individuals were involved in five longitudinal studies conducted in Bangladesh (Meherpur district, $n = 1,856$), Bhutan (national sample, $n = 1,377$), Cambodia (Kampong Cham, Kratie, and Prey Veng, $n = 382$), Ethiopia (Tigray region, $n = 693$) and Rwanda (Gasabo, Ngororero, Nyabihu, and Kicukiro, $n = 596$). The longitudinal studies ranged from 9 to 24 months (average = 16.2 months). Across these studies, the extent to which the caregiver engaged in activities such as reading, playing, and singing predicted children's early numeracy, literacy, social-emotional, motor, and executive function skills. The associations between family stimulation and child outcomes were statistically non-significant for children in Bangladesh and Cambodia.

ECPC members Angelica Ponguta, Ghassan Issa, and their colleagues³⁹ evaluated the effectiveness of the Mother-Child Education Program among two refugee communities and one marginalized community in Beirut, Lebanon. MOCEP was developed by the Mother-Child Foundation (AÇEV) in Turkey. It is a group-based intervention implemented over 25 weekly sessions. This **early childhood parenting education program** also includes home visits by trainers and is designed to foster positive parenting practices and promote early childhood development. The authors found that mothers who participated in MOCEP reported more considerable reductions in their harsh parenting practices (medium effect size of -0.76) and their level of parenting stress (large effect size of -0.90) after the intervention compared to mothers in the control group. There were no statistically significant changes in child outcomes over time except for one indicator of language development (i.e., pragmatic knowledge; medium effect size of 0.53), which improved more among children in the intervention group than children in the control group.

Regarding **family-based approaches**, ECPC member Kyle Pruett and his colleagues⁴⁰⁻⁴² co-developed the Supporting Father Involvement (SFI) program, a 16-week group approach to strengthening couple, co-parent, and parent-child relationships and increasing fathers' hands-on involvement in caring for their children. The authors examined the effectiveness of SFI in a randomized controlled trial spanning up to two years. Several iterations of the SFI have been replicated in California in recent years. Participants were heterosexual couples from five counties in California, U.S., with at least one child between 0 and 11 years of age. In one study⁴², the participants included low-income couples and couples referred by the Child Welfare System because of prior couple violence or child abuse or neglect. Collectively, the evaluations of the SFI document significant reductions in violent problem-solving strategies and harsh parenting strategies (e.g., yelling, slapping, hitting, shaking) by both parents. Child outcomes also changed due to their parents' participation in SFI. More specifically, children of parents who participated in the intervention were less likely than controls to show signs of aggressive, hyperactive, shy/withdrawn, and anxious/depressed behaviors. Moreover, the data suggest a differential effect of SFI. The intervention was most successful in reducing couples' conflict for couples who reported high levels of conflict at enrollment in the program. Thus, in times of instability and prolonged stress on the family system, fathers may support the health and adjustment of both children and mothers.

Child and caregiver well-being

In the study by Thulin and colleagues published in 2022⁴³, the authors aimed to assess cultural concepts of distress among children in Sierra Leone. They conducted 200 free-list interviews (100 adults, 100 children aged 6-10 years) and 66 semi-structured interviews asking questions such as "Think about a child who is having problems like gbos gbos – can you tell us more about a child with problems like these?" followed by questions such as, "What are other ways a child with problems like these might behave?" or "How might a child with problems like these think about themselves and others?". The findings illustrate several challenges children face in Sierra Leone,

including unmet material needs, hunger, and excessive work. Such experienced challenges may manifest in several areas of mental health problems, including *gbos* (angry, destructive behavior), *poil at* (sad, disruptive behavior), *diskoraj* (sad, withdrawn), *wondri* (excessive worry), and *fred fred* (abnormal fear).

The potential of supporting caregivers of young children is further corroborated by a study with caregivers affected by the armed conflict in Colombia⁴⁴. The program “Conmigo, Contigo, Con Todos” (or 3C) was developed to strengthen the resilience and well-being of caregivers (parents, grandparents, and educators) of 0-5-year-old children enrolled in home-based and institutional centers for early childhood development across 14 municipalities disproportionately impacted by the armed conflict in Colombia. Participation in 3C was associated with statistically significant improvements in the resilience of the caregivers. This research accentuates that support programs for caregivers must effectively consider contextual factors determinants such as gender and other contextual factors like family responsibility, empowerment, caregiving obligations, caregiver stress, and family-related violence⁴⁵⁻⁴⁷.

Cross-generational considerations and youth development

Concerning **youth development**, two examples of intervention studies are of note here. First, the Youth Readiness Intervention (YRI) is a cognitive-behavioral intervention for war-affected young people who exhibit depressive and anxiety symptoms and conduct problems. The YRI has been implemented in various districts across Sierra Leone (e.g., Bo, Bombali, Freetown, Kenema, Kono, Moyamba, Pujehun)¹⁴⁻¹⁷. The randomized controlled trial involved Sierra Leone's youth aged 15-24, many of whom had been displaced as a result of war (about 40%), had a friend or family member who died due to war (about 31%), or witnessed violence or armed conflict (about 20%). The investigation of program effects^{15,17} showed reliable changes in internalizing and externalizing symptoms and improvements in physical health, longer-term retention and performance in schooling adaptive behavior, functional impairments (e.g., lower levels of disability), and emotion regulation skills. Household caregivers of

the participating youth also reported reduced emotional distress related to the burden of care and improved prosocial behavior ¹⁶. Combined with an employment promotion program, the YRI can potentially reduce post-traumatic stress symptoms ¹⁴.

ECPC member Catherine Panter-Brick and her colleagues ¹⁸⁻²⁰ examined the impact of a psychosocial intervention (called Advancing Adolescents) comprising structured group-based activities for youth displaced by the conflict. This **stress attunement intervention** was implemented by Mercy Corps with 817 youth (54.6% Syrian) over one year in northern Jordan (Irbid, Jarash, Mafraq, Ajloun, and Zarqa). The authors found medium to small effect sizes for various youth psychosocial outcomes, including perceptions of insecurity and stress, feelings of distress, mental health, and emotional and behavioral difficulties. Sustained effects were observed on perceptions of insecurity. The program did not impact youth prosocial behavior or post-traumatic stress reactions. Of note, the systematic research employed by Panter-Brick and colleagues allowed for the development of a contextually relevant measure of resilience, demonstrated the feasibility and acceptability of implementing randomized controlled trials in a humanitarian setting, and is among the few studies that measured biomarkers (e.g., cortisol) involved in physiological processes of human's response to stress. The intervention was also evaluated for measures of social inclusion, trust, and children's in-group vs. out-group friendships, as well as for impacts on the cognitive skills needed for lifelong learning, such as working memory ⁴⁸. Further work led to the discovery that reductions in perceived psychosocial stress as a function of the intervention are largest in individuals with a low-activity allelic variant of the Monoamine oxidase A (MAOA) gene (a gene that is implicated in the regulation of neurotransmitters such as dopamine and serotonin) and low trauma exposure, or high resilience levels ⁴⁹. This research evaluation led to further work with Syrian refugees, assessing multi-level influences associated with children's literacy and attitudes toward reading ⁵⁰, and examining associations between war-related trauma and the avoidance or sustained attention to anger or threat ⁵¹. These efforts indicate that affective working memory capacity can be a promising target for intervention. Subsequent projects analyzed co-parenting and

family caregiving systems⁵², as well as social networks as pathways to empowerment⁵³, resilience and human flourishing⁵⁴.

Finally, early childhood and adolescence/youth are sensitive brain and human development periods. Intergenerational programs that concomitantly address young children and youth have the potential to drive sustainable development and propel system change significantly. Yet, they have been largely under-applied and seldomly evaluated in international contexts⁵⁵. Such work is underway in Colombia and co-led by ECPC member Angelica Ponguta. The JUNTOS program is a local adaptation of the *Youth Leaders for Early Childhood Assuring Children are Prepared for School* (LEAPS) program in rural Pakistan, which has emerged as one of the few intergenerational programs empirically evaluated for its effectiveness⁵⁶. A cluster randomized controlled trial showed that children participating in LEAPS had significantly better foundational skills than children in the control group⁵⁶. The study also showed that youth who participated in the program improved Early Child Development Education (ECDE) knowledge and vocational skills⁵⁷.

Social cohesion and (inter-)group dynamics

Over the past 25 years, ECPC members have undertaken research to examine the effects of the Early Years Media Initiative for Children (MIFC) in Northern Ireland and Ireland. The MIFC contains activities and modules for 3-4-year-old children that aim to promote respect for intergroup differences, reduce prejudice, and build healthier, more inclusive, collaborative, sustainable, and peaceful communities. MIFC is a holistic preschool program that includes children, early childhood practitioners, and parents. A large randomized controlled trial⁵⁸ with 1,181 children aged 3-4 years concluded that the children were better able to recognize emotions in others, more likely to identify potential instances of exclusion among others, and better able to realize that being excluded makes someone feel sad. The program also achieved remarkable outcomes concerning the recognition of cultural events and symbols associated with the Protestant and Catholic communities in Northern Ireland, as well as children's desire to

join in with cultural activities. Such improved attitudes about other religious groups are essential to horizontal social cohesion. The scaling of the program by the educational systems in Northern Ireland and Ireland is a vital testimony to the program's impact on vertical social cohesion. Finally, parents felt more confident dealing with diversity issues with their children and prejudice within their communities. A comprehensive account of the MIFC's impact in Northern Ireland and Ireland, as well as other conflict-affected countries around the globe, can be found in the recent chapter by ECPC member Siobhan Fitzpatrick⁵⁹. A recent investigation aimed to determine further the outcomes of the revised toddler module of the MIFC on children and their caregivers⁶⁰. This study invited 36 toddlers up to 42 months of age from one site to participate in MIFC. This group's social-emotional growth (e.g., child empathy, child self-regulation, social problem-solving) over one academic year (September 2021 to June 2022) was compared to a control group of 55 children from another site. The findings showed that the social-emotional skills of children older than 31 months increased from baseline to follow-up.

In addition to these long-term efforts to gain insights into the impact of the MIFC, ECPC members have been engaged in an international research group on early childhood development for peacebuilding (called LINKS) from six low and middle-income countries (LMICs) affected by conflict (Egypt, Kyrgyzstan, Mali, Tajikistan, Timor-Leste, and Vietnam). This group established an international research network to support effective ECD programs, particularly in LMICs affected by ethnic divisions and political violence, through strategic partnerships and research capacity building. For instance, a recent study from Kyrgyzstan recruited 726 children, 752 parents or caregivers, and 96 teachers from 48 kindergartens in 12 districts across the two provinces of Batken and Issyk-Kul to take part in an intervention called *The Magic Journey*⁶¹. *The Magic Journey* is an early childhood development program that aims to improve the attitude of children, parents, and teachers towards inclusion and gender and ethnic diversity. The authors found that children tended, on average, to express a preference to play with a child of their gender. However, from baseline to follow-up, this preference was reduced for those who participated in *The Magic Journey*. Moreover,

there were promising findings on the impact of the children's capacity to identify instances of exclusion and empathize with the experience of being excluded.

Conclusion and Future Directions

The reviewed research and examples highlight early childhood parenting education programs and home-visiting interventions to promote development and prevent violence among children 0-8 years of age. Other research described implementing professional development programs with preschool teachers in Chile and Ghana. Two examples showcase efforts to promote psychosocial and developmental outcomes of youth in Jordan and Sierra Leone. ECPC research also exemplifies the potential of family-based approaches to strengthen couple, co-parent, and parent-child relationships. Based on the review's findings, this final chapter presents a summary with conjoint recommendations for research, social policies, and options for future program development.

- **Innovation in early childhood care and education:** Early learning can be substantially boosted in preprimary education and 0-3 parenting programs overall⁶². When parents (and their partners) of young and very young children are supported and resourced to care for their children in the ways that mean most to them in these critical early years, with follow-up contact months down the road, child outcomes are effectively improved. Utilizing a structured, group-based parent training program like the one pioneered by the AÇEV foundation³⁹ has been a hallmark of many successful programs, e.g., in Lebanon and Saudi Arabia. Teaching parents (mothers and fathers) about the importance of early childhood is a crucial element of such programs. Harsh discipline as a family foundation for conflict can be effectively reduced in parenting programs. Groundbreaking research in hard-to-access regions (e.g., rural and remote Lebanon) led by ECPC members has generated remarkable discoveries involving caregivers implementing and teachers guiding pre-primary education. Over three months, language proficiency, numeracy skills, and social-emotional

development improvements were comparable to the progress typically achieved in a full year of traditional in-person preschool programs. The findings that these positive effects were equally pronounced among caregivers with the lowest levels of education and those lacking literacy skills convey hope that innovative programs can be feasibly developed and tested at scale. Additionally, the program had a welcome side effect: it reduced harsh discipline practices, as evidenced by the results of a three-arm randomized controlled trial, which included a weekly caregiving program as the second treatment arm. In regions affected by conflict and other crises, the implications of these findings are profound. Elevating children's learning outcomes and diminishing the prevalence of harsh discipline serve as critical underpinnings for fostering sustainable peace in such environments. The broader implications of this work suggest that mass media can play a pivotal role in early peace-building efforts. More research is urgently needed to determine the pathways through which these efforts can bring the transformative power of caregiver-guided education and mass media to even more children, thereby contributing to peace and stability. Continuous and coordinated research is needed to ensure that timely ECD support for families with young children becomes part of universal health care at a global level if nations are to have stable family-focused workforces that characterize peace-promoting and peace-building communities. It is essential to translate existing knowledge in creating future interventions to strengthen supportive, protective, and nurturing environments that are responsive to the holistic needs of children and adolescents throughout their lives. Moreover, we recommend that programmatic design and approaches be tailored to a gender assessment inclusive of analyzing and considering assumptions and risks related to gender norms.

- **Broaden the scope of research within and between families:** Parental conflict, violence and aggression, harsh parenting, depression, and anxiety are reduced or eliminated in one or both partners when the mother's partner (husband, cohabiting male or female partner, or extended family member) is

included and actively invited into early childhood-focused intervention. Such early interventions have a cascade of interacting effects that ultimately benefit the well-being and developmental outcomes of the parents' young children (positive school attitude, social adjustment, and self-regulation). Engaging fathers in early childhood care and development amplifies the likelihood of improved family well-being, reduced caregiving stress, and provision of nurturing care that meets the child's developmental needs. The available evidence documents how helpful it can be to encourage parents to inter-connect with one another. This is especially true in settings where communities are in conflict, e.g., Northern Ireland, Israel/Palestine, and Colombia. The role of the caregiver is essential in supporting a protective environment to reach core outcomes for children and youth. It is assumed that for parents to promote peacebuilding in their young children, they must first be able to acquire and enact the prosocial skills needed for peace. This assumption is an area of the literature that has not been widely researched, suggesting that further research is required. Effective community engagement must center the voices and participation of all families at all stages of ECD program conceptualization, implementation, and governance. Only through this building block can widespread peacebuilding be achieved. Developing and implementing self-sustaining programs is another key finding. Otherwise, the program's impact will be limited to a relatively small number of families. Another essential aspect involves actively involving stakeholders, especially government authorities, and persuading them about the significance of early childhood development.

- **Connecting youth to ECD research and service implementation:** The example of the LEAPS program has demonstrated the potential of involving youth in intergenerational programs that concomitantly address early childhood and youth development. The best way to begin engaging youth is to offer tangible and defined opportunities in which they can involve themselves. The ECPC is uniquely positioned to do this. Through its diverse members, it may serve as an access point for youth to many peacebuilding projects. The review of the

available research on youth engagement signals the need for providing more explicit opportunities for youth perspectives to be part of the intervention/program design and ensure research questions are designed to adequately assess peacebuilding over the life course. To address this, a qualitative study involving ECPC researchers involved with previous intervention studies to understand why or why not operational definitions of peacebuilding were explicitly provided may inform how stakeholders conceptualize peacebuilding across multiple contexts and sectors. More broadly, though, researchers both within and outside the ECPC should consider including young people in the design of future work to their mutual benefit.

- **Broaden the scope of peacebuilding outcomes:** Based on the analysis of the extant research, although the outcomes of children, caregivers, and teachers explored were diverse, most of the targeted outcomes tended to address individual levels. Despite the recognition from multiple existing conceptual models that peacebuilding is a multi-level construct, outcomes rarely explore community and structural factors. More studies are needed that show the **community-level effects** of ECD programs, especially on elements central to peacebuilding, such as social cohesion. Therefore, a new generation of research that can effectively pinpoint contextually-derived notions of peacebuilding on multiple levels is urgently needed. There is no universally agreed-upon definition of the term peacebuilding. Yet, key characteristics such as promoting trust and non-violence, social cohesion, inclusion, and political participation are frequently emphasized. Thus, including researchers with expertise in political science and anthropology and practitioners who can capitalize on local human capital would enrich the ECPC's research at the intersection of ECD and peacebuilding. Moreover, there is emerging evidence documenting the **role of biomarkers** in the reviewed research, such as brain activity (EEG patterns) in mother-child dyads ^{26,27}, variants of candidate genes and hormones implicated in stress response ^{49,63} and the differential impact of these genetic variants under different environmental contexts ⁶⁴. For instance, research has confirmed that

environment-dependent epigenetic modifications have a lasting influence on gene expression in the developing brain. Research is urgently needed to determine how responsive a child's genome-wide methylome is to early childhood intervention. The research conducted by the ECPC members has contributed substantially to our understanding of the "environome," the physical, social, and cultural influences that interact with inherent biological bases of young children⁶⁵. The ECPC is a unique conduit to propel research that examines the interaction between the neurobiological bases of peacebuilding skills and various environmental variations beyond a single society.

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