

Exploring the Concept of Parental Investment from an Evolutionary Psychology Perspective with an Emphasis on Investment Strategies for Adoptive Families: A Review of the Literature

Juan Bao^{1,a,*}

¹*University of Bristol, Beacon House, Queens Road, Bristol, BS8 1QU, UK*

a. b.joanna@foxmail.com

**corresponding author*

Abstract: Parental investment plays a crucial role in shaping children's well-being and development. While the parental investment of biological parents has been extensively studied, the dynamics of parental investment in adoptive parents have received increasing attention. The purpose of this paper is to explore key concepts and principles related to parental investment in adoptive parents, focusing on cultural beliefs and values, attachment and bonding processes, perceptions of genetic relatedness, adoptive parents' experiences and motivations, and support networks and resources. By examining these factors, this paper seeks to provide a comprehensive understanding of the complexities of parental investment in different family settings. And understanding the evolutionary origins and adaptive significance of adoptive parental investment in the context of adoption will contribute to a deeper understanding of human parental behavior and its impact on child well-being.

Keywords: parental investment, adoptive families, evolutionary psychology, cross-cultural variations

1. Introduction

1.1. Background on Parental Investment

The concepts of cooperation and mutual benefit are likely to be increasingly emphasized. This view, known as "parent-offspring mutualism", assumes that the interests of parents and offspring are often aligned and that cooperation can benefit both [1].

From an evolutionary psychology perspective, parental investment refers to the resources and energy that parents devote to the survival, growth, and development of their offspring, a theoretical framework that posits that individuals strategically allocate their limited resources to maximize reproductive success [2]. Based on evolutionary theory, the costs and benefits of raising offspring, as well as potential future reproductive opportunities, influence parental investment. As a result, parents will invest in the next generation more in favor of the next generation that is genetically similar to them and will provide more resources to offer them [1].

However, in recent years, research on parental investment has gained significant attention in the adoption context. The fact that adoptive parents voluntarily choose to invest in their non-biological

offspring provides a unique opportunity to explore the mechanisms and adaptive strategies underlying parental investment [3]. This seems to make the reason for the investment strategy of adoptive families ambiguous.

While parental investment is a universal phenomenon, its expression and distribution may vary across species and even human populations. This variation can be attributed to a variety of factors, including environmental conditions, social structures and individual characteristics [2].

1.2. Importance of Examining Parental Investment in Adoptive Families

Parental investment is a key factor in the healthy development of children, including those in adoptive families. Despite extensive research on parental investment in biological families, adoptive families face unique challenges and opportunities in providing parental investment, such as forming new attachments and addressing children's pre-adoption experiences [4]. At the same time, parental investment plays a critical role in children's development and well-being, and there remains a need for research on this concept in adoptive families. Understanding the factors that influence parental investment in adoptive families is critical to promoting positive outcomes for adopted children and informing adoption policy and support services.

On the other hand, understanding parental investment in adoptive families has practical implications for adoption policy and support services. Incorporating research findings into adoption policies and guidelines can ensure that adoptive families receive appropriate support and resources [5]. Identifying gaps in support services and interventions can help meet the specific needs of adoptive parents, including training programs that address the unique challenges they may face [4]. Promoting cultural sensitivity and understanding during the adoption process can also enhance parental investment and the overall well-being of the adoptive family.

The purpose of this paper is to examine the concept of parental investment from an evolutionary psychology perspective, with a particular focus on adoptive families. By synthesizing existing research, we will explore the factors that influence parental investment decisions, potential adaptive benefits, and contextual implications for child outcomes in different cultural contexts. Understanding the evolutionary origins and adaptive significance of parental investment in the context of adoption will contribute to a deeper understanding of human parental behavior and its impact on child well-being.

2. The Investment Strategies of Adoptive Families

2.1. Overview of Evolutionary Psychology and Its Relevance to Parental Investment

In the evolutionary past, parental investment played a crucial role in the survival of the offspring. Parental investment is a fundamental concept in evolutionary biology and psychology that helps to explain differences in parental behaviors and strategies across species. It provides insights into the complex dynamics of reproduction, survival and adaptation in nature [1]. Evolutionary psychology's theory of parental investment suggests that the level of parental investment differs between males and females in the first place, as a result of differences in the costs of reproduction [1].

Based on this theory, females invest more in their offspring in all species because of the higher costs of pregnancy and lactation, and because of the limited number of eggs available to females [6]. Males have lower reproductive costs, but the investment strategies that influence males tend to be the uncertainty of male paternity and the availability of resources [7].

Parental investment is understood through two basic principles: differences in parental resource investment between males and females, and the trade-off between investing in current offspring and future reproductive opportunities [8]. These principles are rooted in the evolutionary need to ensure the survival and reproductive success of one's genes. Evolutionary psychology theory provides a

theoretical framework for comprehending the concept of parental investment, especially in the context of adoptive families. Parental investment refers to the resources, time, and energy that parents allocate to the survival, growth, and well-being of their offspring [7]. From an evolutionary perspective, parental investment is determined by the principles of natural selection, reproductive success, and maximizing genetic health.

In biological families, parental investment is often driven by genetic relatedness. This is because biological parents are directly genetically linked to their offspring and therefore have a greater likelihood of passing on their genes through successful reproduction. However, in adoptive families that lack genetic relatedness, the motivations and determinants of parental investment may be different [9].

However, research has shown that the investment behavior of adoptive parents is similar to that of biological parents. This is attributed to the evolution of psychological mechanisms that promote parent-child bonding and caregiving, such as the release of oxytocin and the activation of the caregiving system [10]. Although adoptive parents may not be directly genetically related to their adoptive children, they still experience the same parental instincts and motivations to provide care and support.

From another perspective, the relevance of evolutionary psychology to parental investment in adoptive families transcends biological factors. Cultural context is critical in shaping parental investment behaviors, norms, and expectations. Cultural beliefs, values, and practices influence the extent and nature of parental investment, including the allocation of resources, the provision of emotional support, and the transmission of cultural heritage [10]. Understanding parental investment in adoptive families therefore requires consideration of both evolutionary and cultural factors.

2.2. Analyze the Experiences and Challenges of Adoptive Parents in Relation to the Attachment and Bonding Process

The way adopted children are raised looks different from the way biological children are raised. Recent research has expanded the understanding of parental investment beyond the traditional parent-child relationship. Adoption research has revealed the malleability and adaptability of parental investment behavior [5]. found that adoptive parents invested in and attached to their adopted children to a similar degree as birth parents invested in and attached to their biological children. This suggests that parental investment can transcend genetic ties, highlighting the importance of social and emotional bonds in caregiving behavior.

Biological parents: For biological parents, attachment and bonding usually begin during pregnancy and continue after birth [8]. Biological bonds between parents and children are usually formed through biological and hormonal processes, such as the release of oxytocin during labor and breastfeeding [5]. This bond helps to create a sense of security, trust and emotional connection between parents and their biological children. It is the foundation of the parent-child relationship and influences how parents invest their time, energy and resources in nurturing and caring for their children. Because of shared genes, characteristics, skills and behaviors, biological children develop a sense of identity and belonging to their families [11]. As a result, biological families are able to build bonds and attachments with their biological children before they are born, and these bonds are not broken after the birth of the child.

Adoptive Parents: Like biological children who are genetically linked to their parents, children placed in adoptive homes have given up the bonds and rights of their biological parents as they enter another family that is new to them. Adoptive parents and adoptive children must bond with each other over a period of months or years [11]. Although the parent-child relationship may not exist, the attachment and bonding process is equally important for adoptive parents. Adoptive parents will actively build secure attachment and bonding relationships with the adopted child. This process may

include creating a nurturing and responsive environment, providing consistent care, and building trust and emotional connection over time. Adoptive parents invest in building security and love, which helps children develop strong attachments and positive parent-child relationships.

The secure attachment and bond that children have with their parents positively impacts the child's cognitive development [8]. The emotional security provided by a nurturing and responsive environment sets the stage for optimal brain development [9]. Many doctors and psychologists now understand that the parent-child relationship does not begin at birth, it is a succession of physical, psychological and spiritual events that begin in the womb and continue through the postnatal period of parenthood [11]. When this natural evolution is interrupted by the postnatal separation from the birth mother, the resulting experience of abandonment remains in the child's unconscious mind.

Nonetheless, it's important to note that everyone deals with such feelings differently; each person who experiences trauma reacts and responds according to his or her emotions, cognitive functioning, coping skills, and internal perspective. New research even suggests that trauma can be passed from generation to generation through genes. Thus, trauma and behavioral disorders are not unique to adoption – many biological children are born with or develop trauma or behavioral disorders as well [12].

The attachment and bonding process strengthens the parent-child relationship. It promotes open communication, trust and understanding between parents and children. A strong parent-child relationship contributes to effective parenting, as parents are more likely to be attentive to their children's needs and respond appropriately [5]. Therefore, whether biological or adoptive parents, attachment and parent-child links are key to parental investment, and the formation of stable parenting relationships supports the investment theory of evolutionary psychology that ensures the probability of survival of offspring from another perspective as well.

2.3. Cross-cultural Variations in Parental Investment among Adoptive Families

In human societies, parental investment tends to refer more to the time, energy and resources that parents allocate to their children's education and is a key factor in child development [1]. Cultural influences play an important role in adoptive parents' parenting investments, and culture encompasses a range of beliefs and values that influence parenting practices and expectations [13]. Adoptive parents, influenced by their own cultural backgrounds, may have unique perspectives on parenting that may affect their parenting investments [14].

Different cultures have different adoption practices and beliefs. Compare the cultural differences between Western and non-Western cultures that affect every aspect of an adoptive family's life [15]. From the parenting style of the family to the adoption environment and legal process of the society as a whole, there are significant differences.

2.3.1. Cultural Values and Beliefs

Cultural beliefs and values determine expectations and practices regarding parental investment. Different cultures may emphasize different aspects of parenting, such as discipline, education, or emotional support [14]. These cultural norms influence the investment decisions of birth and adoptive parents as they strive to meet societal expectations and norms. For adoptive parents, cultural beliefs and values also influence their choice to adopt children and their commitment to provide a supportive environment for their non-biological children. These cultural norms can influence the decisions and behaviors of both biological and adoptive parents [14].

Western culture may emphasize individualism, personal fulfillment, and self-expression, which may influence the motivations and expectations of adoptive parents. On the other hand, individualistic cultures, which prioritize personal autonomy and independence, may place greater emphasis on

fostering individual abilities and achieving personal goals [16]. And with nuclear family structures more prevalent, extended family involvement may be less pronounced. Parental investment in these cultures may revolve around promoting self-esteem, encouraging independence, and supporting individual achievements [17]. Parents may invest time and resources in activities such as extracurricular pursuits, educational opportunities, and personal development to help their children excel individually.

It is important to note that cultural influences on parental investment are not solely determined by broad cultural categories but also vary within specific cultural groups, regions, and socioeconomic contexts [13]. Additionally, cultures are not static entities, and they can evolve over time, leading to changes in parenting practices and beliefs.

Non-Western cultures may prioritize collectivism, community harmony and respect for family lineage, which may influence the level of investment and commitment of adoptive families [18]. There are often stronger extended family networks, with grandparents, aunts, uncles and cousins playing an active role in parenting [17]. In collectivistic cultures where the emphasis is on the well-being and harmony of the clan, parental investment may prioritize the needs of the group over individual desires [19]. Parents in these cultures may invest heavily in aspects such as family relationships, interdependence, and maintaining social norms. This could manifest in parents dedicating time and resources towards fostering strong family ties, ensuring the success and reputation of the family, and prioritizing the collective interests of the family over individual goals [18].

In summary, cultural beliefs and values influence parental investment by shaping expectations and priorities regarding parenting practices. Whether it be investing in familial relationships and interdependence in collectivistic cultures or fostering personal autonomy and individual achievements in individualistic cultures, culture significantly influences parents' decisions and behaviors in providing for their children's needs and well-being.

Adoption practices and attitudes are evolving globally, influenced by factors such as globalization and the spread of Western values. It is therefore important to be culturally sensitive in making any comparisons.

2.3.2. Adoption Practices

The legal and administrative procedures involved in adoption affect the level of parental investment.

Western countries usually have well-established legal systems and adoption agencies to regulate the adoption process. Adoptive parents must meet certain criteria and undergo a thorough evaluation before they are authorized to adopt. On the one hand, adoption is a legal process that transfers the rights and responsibilities of the child from the biological parents to the adoptive parents Publishers [15]. Throughout the adoption process, legal procedures ensure that the best interests of the child are prioritized and their rights protected. This includes verifying the eligibility and suitability of prospective adoptive parents and ensuring that they can provide a safe nurturing environment for the child. On the flip side, Legal and administrative procedures establish a framework of accountability for adoption agencies and professionals involved in the adoption process. It ensures that adoption practices are transparent, ethical and in accordance with the law. This helps to maintain public trust in the adoption system and protects all parties involved [20].

For example, Norwegian parents do invest more in adoption than in many other countries. Norway attaches great importance to child welfare and ensuring the well-being of adopted children, and comprehensive support services are available to adoptive families [21]. This includes pre-adoption training and counseling, post-adoption support and access to health care and education. These support services are designed to ensure that adoptive parents have the necessary knowledge and resources to meet the needs of the child. The Norwegian Government provides financial assistance to adoptive

families to help them cover adoption-related expense [21]. This may include reimbursement of expenses related to the adoption process, such as travel expenses, attorney's fees and medical examinations. The financial assistance helps to alleviate the financial burden normally associated with adoption. Norway recognized the importance of providing ongoing support to adoptive families even after the adoption is finalized [21]. Post-adoption support services are on hand to deal with any challenges or problems that may arise. This includes counseling, therapy and support groups to help adoptive parents on their parenting journey.

Thus, even though Norway is a country with an individualistic cultural background, there is still a great deal of support in the social network. Thus, it is clear that the key to influencing parental investment is not only the cultural context, but also the legal and social policy improvements that can play a crucial role.

Informal adoption practices are more common in non-Western cultures. This may involve arrangements within extended family networks or community systems, whereby children are adopted by relatives or trusted community members. These informal adoptions usually do not involve legal proceedings or adoption agencies. The reason for this is more because non-Western cultures usually prioritize the preservation of cultural continuity and the maintenance of family links, and people are more inclined to adopt children of the same ethnic background and culture [22].

Another survey suggests that guardianship may be preferred over adoption. In some non-Western cultures, there may be a difference between guardianship and adoption [23]. Guardianship gives caregivers the legal authority to take care of the child and make decisions on the child's behalf. Guardianship gives the caregiver legal authority to care for the child and make decisions on the child's behalf, but the child may not be legally considered the biological child of the adopting parent [23]. Guardianship may be favored over adoption to preserve inheritance rights or cultural traditions related to lineage and family name.

Ultimately, in a non-Western cultural climate, people will be far less likely to adopt because they care about blood and inheritance. Even adoption is preferred to children of relatives in the same family to ensure a close correlation. Because of this, parental investment is also more likely to favor children within the kinship. In addition, since the duties of guardianship are different from those of adoption, this will also significantly reduce the level of parental investment in the child [23].

From the evolutionary psychological theory of parental investment, which suggests that parents are more likely to invest in their siblings' offspring when they have no offspring of their own, the practice of adoption in non-Western cultures is more in line with the evolutionary instincts of animals [1].

2.4. Parental Investment in Inter-country Adoption

Inter-country adoption, also known as international adoption, occurs between countries when individuals or families from one country adopt a child from another country. The specific countries involved in inter-country adoptions can vary greatly depending on various factors such as the adoption laws and regulations of each country, the availability of adoptable children, and the preferences of the adopting parents [23]. Inter-country adoption typically involves a longer and more complex process than domestic adoption. Prospective adoptive parents may need to navigate multiple legal systems, complete extensive paperwork, conduct home studies, and comply with the requirements of both sending and receiving countries [22]. This requires a great deal of time and effort on the part of the adoptive parents. Thus, intercountry adoption means a greater parental investment, including financial costs, language challenges, a more complex process of emotional bond building and a longer-term commitment.

Inter-country adoption will usually be found in Western countries, particularly in North America and Europe, where the practice of international adoption is often used [20]. This involves the adoption

of children from other countries who may be orphaned, abandoned or unable to be cared for by their biological families. Adoption agencies in the West are professional and often open adoptions, allowing for contact and communication between birth parents, adoptive parents and the child. The purpose of this practice is to maintain the child's bond with his or her birth parents and cultural traditions, while providing stability and permanence in the adoptive family.

3. Conclusion

3.1. Summarize the Main Factors of Parental Investment in Adoptive Families

3.1.1. Attachment and Linkage form Equally Strong Parenting Relationships

In summary, parental investment is relevant to evolutionary and reproductive perspectives, primarily because parental investment is an important way to ensure the survival and reproduction of offspring [5]. In evolution, the survival and reproduction of a species depends on the survival and reproductive success of its offspring [6].

This is because there is a genetic similarity between the parent and the offspring, and investing in their own genetically similar offspring helps to pass on their genes to the next generation, increasing the probability of their genes surviving [6].

In addition, the investment of adoptive parents in their children can also be explained as a result of social evolution. Social evolution theory suggests that parent-child relationships in human societies are not limited to blood relationships, but also include adoptive relationships. Adoptive parents' investment in their adopted children increases the probability of their adopted children's survival and reproductive success, thereby increasing the probability of their own genes being passed on in their offspring [24]. Both parents and adoptive parents invest in their children to ensure the survival and reproductive success of their offspring, thereby increasing the probability of transmission of their own genes in evolution. Investing in offspring is one of the key strategies for evolution and reproduction in both parent-child and adoptive relationships.

3.1.2. Adoptive Families in the Western Context Provide a Higher Investment in Their Adopted Children

In Western cultures, adoptive families usually invest more in their adopted children. This phenomenon can be partially attributed to the emphasis on family values in Western culture. Distinguishing from non-Western cultures' enthusiasm for collectivism, in Western societies the individual family is more recognized as an important support system for personal growth and well-being. As a result, adoptive parents will tend to provide more resources and support to ensure the health and well-being of their adoptive children.

In addition, the values of equality and human rights are emphasized in Western culture. Adoptive parents in this cultural context realize that it does not matter how their adopted children are related to them by blood, and instead focus on providing equal treatment and opportunities [14]. They may provide their adopted children with more resources in terms of education, medical care, cultural activities, etc. to ensure that they are given a fair chance to develop and grow.

Finally, Western societies also have well-established laws and professional adoption agencies to protect the rights and interests of adoptive families and adopted children. Thus even in an individualistic culture, the existence of these institutions and laws can increase the willingness of adoptive parents to invest in their children because they can trust and rely on legal institutions to protect their rights and interests [24].

In conclusion, the investment strategies of adoptive parents in their children are closely related to the cultural context. In the Western cultural context, adoptive families usually invest more in their

offspring, which can be attributed to the importance attached to family values, the notion of equality and human rights, as well as legal and institutional safeguards.

3.2. Improving the Well-being of Adopted Children in non-Western Countries

Although parental investment was theorized from an evolutionary and reproductive perspective, as society has evolved, not all parent-child relationships in human societies have relied on genetic continuity [25]. The complexity of parental investment strategies is also due to the vastly different cultural contexts.

Looking back at previous comparisons, it is easy to see that adopted children in a Western context are given better resources. The context of non-Western cultures, human beings are still closer to the parental investment proposed by evolutionary psychology, leaning more in the direction of blood, genetic, and racial links.

The cumbersome nature of intercountry adoption and the huge language and cultural differences also increase the difficulty of adoption, so increasing the willingness of national parents to adopt is the main direction that non-Western countries should consider.

3.3. Recommendation

Adoption systems in non-Western countries can be improved to safeguard the well-being of children in the following ways:

1. Legal and institutional reforms: Establish a clear legal framework for adoption, clarifying adoption procedures and standards to safeguard children's rights and well-being. Relevant laws and policies should be formulated to clarify the responsibilities of adoption agencies and regulatory measures to ensure the transparency and fairness of the adoption process.

2. Strengthening the review and assessment of adoption procedures: Ensure that adoption applicants have sufficient conditions and abilities to provide children with a healthy, safe and stable family environment. Comprehensive background checks, home visits and psychological assessments are conducted to ensure that applicants are suitable to adopt children.

3. Provide comprehensive support and training: Provide adoptive families with the necessary training and support to help them understand and cope with the special needs and challenges that adoptive children may face. This includes support for the child's mental health, cultural adaptation, education and social integration.

4. Strengthening the guardianship and protection of adopted children: Establishing a sound guardianship mechanism to ensure that adopted children receive adequate attention and protection in their new families. Strengthen monitoring and evaluation of adopted children to ensure that their rights and interests are safeguarded and protected.

5. Strengthening the management and supervision of adoption agencies: Establishing an effective management mechanism for adoption agencies.

References

- [1] Trivers, R., & Coultas, J. C. (1971). *The evolution of reciprocal altruism*.
- [2] Linquist, S. P., & Levy, N. (2017). *Evolutionary psychology*. Routledge.
- [3] Gibson, K. (2009). Differential parental investment in families with both adopted and genetic children. *Evolution and Human Behavior*, 30(3), 184–189. <https://doi.org/10.1016/j.evolhumbehav.2009.01.001>
- [4] Whitten, K. L., & Weaver, S. R. (2010). Adoptive family relationships and Healthy Adolescent Development: A risk and resilience analysis. *Adoption Quarterly*, 13(3–4), 209–226. <https://doi.org/10.1080/10926755.2010.524873>
- [5] Hamilton, L., Cheng, S., & Powell, B. (2007). Adoptive parents, adoptive parents: Evaluating the importance of biological ties for Parental Investment. *American Sociological Review*, 72(6), 1018–1018. <https://doi.org/10.1177/000312240707200610>

- [6] Low, B. S. (2000). *mother nature: A history of mothers, infants, and natural selection*. Sarah Blaffer Hrdy. *The Quarterly Review of Biology*, 75(2), 218–218. <https://doi.org/10.1086/393476>
- [7] Riehl, C. (2011). *Paternal investment and the “sexually selected hypothesis” for the evolution of eggshell coloration: Revisiting the assumptions*. *The Auk*, 128(1), 175–179. <https://doi.org/10.1525/auk.2011.10171>
- [8] Travis, R. (2002). *Natural selection and social theory: Selected papers of Robert Trivers*. Oxford University Press.
- [9] Verrier, N. N. (2012). *The Primal Wound Understanding the adopted child*. Gateway.
- [10] Gaulin, S. J. C., & Schlegel, A. (1980). *Paternal confidence and paternal investment: A Cross Cultural Test of a sociobiological hypothesis*. *Ethology and Sociobiology*, 1(4), 301–309. [https://doi.org/10.1016/0162-3095\(80\)90015-1](https://doi.org/10.1016/0162-3095(80)90015-1)
- [11] Sheyann, B. (2016, August 21). *What makes adoptive parenting different from parenting a biological child?*. Adoption.com. <https://adoption.com/what-makes-adoptive-parenting-different-from-parenting-a-biological-child>
- [12] Sara Johnson, A. A. J. 5. (2023, July 5). *Understanding epigenetics: How trauma is passed on through our family members*. Arkansas Advocate. <https://arkansasadvocate.com/2023/07/05/understanding-epigenetics-how-trauma-is-passed-on-through-our-family-members/>
- [13] Chen, X., Fu, R., & Yiu, W. Y. (2019). *Culture and parenting*. *Handbook of Parenting*, 448–473. <https://doi.org/10.4324/9780429401459-14>
- [14] Harkness, S., & Super, C. M. (2002). *Culture and parenting*. In M. H. Bornstein (Ed.), *Handbook of parenting: Biology and ecology of parenting* (pp. 253–280). Lawrence Erlbaum Associates Publishers.
- [15] Homans, M., Phelan, P., Ellerby, J. M., Walker, E., Balcom, K., Myers, K., Nelson, K. P., Briggs, L., Callahan, C., Peña, R., Wesseling, E., Perreau, B., Curzon, L., Leighton, K., & Yngvesson, B. (2018). *Critical adoption studies: Conversation in progress*. *Adoption & Culture*, 6(1), 1–49. <https://doi.org/10.1353/ado.2018.0015>
- [16] Siqi, L. (2021). *Differences in social support between collectivist and individualistic cultures*. *Psychology of China*, 3(3), 271–277. <https://doi.org/10.35534/pc.0303033>
- [17] Gelfand, M. J., & Christakopoulou, S. (1999). *Culture and negotiator cognition: Judgment accuracy and negotiation processes in individualistic and collectivistic cultures*. *Organizational Behavior and Human Decision Processes*, 79(3), 248–269. <https://doi.org/10.1006/obhd.1999.2845>
- [18] Mitra, S., Konantambigi, R. M., & Datta, V. (2019). *Adoption sharing in closed adoption system: The experiences of Indian adoptive parents*. *The Indian Journal of Social Work*, 80(3), 359. <https://doi.org/10.32444/ijsw.2019.80.3.359-378>
- [19] Grotevant, H. D. (1997). *Coming to terms with adoption*. *Adoption Quarterly*, 1(1), 3–27. https://doi.org/10.1300/j145v01n01_02
- [20] Gruber, C. (1994). *Adoption and the family system: Strategies for treatment*. *Child & Adolescent Social Work Journal*, 11(3), 247–255. <https://doi.org/10.1007/bf01875875>
- [21] Brottveit, A. (2003). *Ethnic identity among adult intercountry adoptees in Norway*. Paper presented at the International Adoptions Conference, Korea Norwegian Adoption of Indian Children 60 Klubben, The meaning of roots: Ethnic identity & biological heritage, Copenhagen, Denmark.
- [22] Hoksbergen, R.A.C. & Gokhale (Eds., 1986). *Adoption in worldwide perspective. A review of programs, policies and legislation in 14 countries*. Lisse: Swets and Zeitlinger.
- [23] Apparao, H. (1997). *International adoption of children: The Indian scene*. *International Journal of Behavioral Development*, 20(1), 3–16. <https://doi.org/10.1080/016502597385405>
- [24] Yang, H.-J., Kuo, Y.-J., Wang, L., & Yang, C.-Y. (2014). *Culture, parenting, and child behavioral problems: A comparative study of cross-cultural immigrant families and native-born families in Taiwan*. *Transcultural Psychiatry*, 51(4), 526–544. <https://doi.org/10.1177/1363461514532306>
- [25] Hrdy, S. B. (2000). *Mother nature: Maternal instincts and how they shape the human species*. Ballantine Books.