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The Continuity of Attachment Development from Infancy to Toddlerhood: The Birth of a Sibling

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The Continuity of Attachment Development from Infancy to Toddlerhood: The Birth of A Sibling

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INTRODUCTION

BACKGROUND

- Past studies have revealed both continuity (Frodi et al, 1985) and discontinuity (Belsky et al., 1996) of attachment patterns in early childhood.
- These diverse results appear to reflect meaningful variations or "lawful discontinuity" associated with changes in infant experience. In other words, a child in a secure relationship later encountering insensitive care should tend towards a non-secure relationship, and vice versa.
- We found substantial changes in attachment security across infancy in a recent investigation. However, these changes could not be attributed to changes in sensitivity, as predicted by theory.
- This result prompted an exploration of factors within the broader family context that are beyond the proximal impact of maternal sensitive interactions.
- The birth of a second child is a stressor for mothers and firstborns (Dunn & Kendrick, 1982), and has been theorized to be a potential factor that alters the quality of the firstborn's interactions with the mother and their attachment relationship.

PRESENT STUDY

- The current study investigates the impact of the arrival of a new infant on firstborn attachment. The patterns of attachment continuity and discontinuity are compared between children who transitioned to siblinghood for the first time and children who did not experience this transition.

METHOD

PARTICIPANTS

- Community sample of $n = 61$ adult mothers and their first-born infants.
 - $n = 15$ (25% of sample) experienced the birth of a sibling between the 1st and 2nd year of life.
 - $n = 46$ did not.
- Mean age of mothers was 30.12. Majority of mothers were married (77%) and had completed an average of 14.57 years of education. Average household income was \$50,000 - \$70,000.

METHOD Cont'd

MEASURES

- Maternal Sensitivity:**
 - Based on 2-hour observations of parent-infant interactions at home; maternal sensitivity was assessed using the *Mini-Maternal Behaviour Q-Sort* (Mini-MBQS; Pederson et al., 1999).
- Strange Situation Procedure (SSP; Ainsworth et al., 1978):**
 - Standardized laboratory assessment of attachment in infancy.
- Interesting-but-Scary Paradigm (IbS; Forbes et al., 2007):**
 - Standardized laboratory assessment of attachment in toddlerhood.

PROCEDURE

- 10-Months: Home Visit**
 - Maternal sensitivity and demographics.
- 13-Months: Laboratory Visit**
 - Strange Situation assessment of attachment.
- 21-Months: Home Visit**
 - Maternal sensitivity.
- 27-Months: Laboratory Visit**
 - Interesting-but-Scary Paradigm assessment of attachment.

RESULTS

Table 1. Attachment Classifications at 13 and 27 Months

	Months	2-way attachment classifications		Total	
		Secure	Non-Secure		
New Sibling	No	13	27 (59)	19 (41)	46
	Yes	27	35 (76)	11 (24)	46
No New Sibling	13	7 (47)	8 (53)	15	
	27	6 (40)	9 (60)	15	

Note. Non-secure classification is composed of avoidant and resistant dyads.

1. CHANGES IN ATTACHMENT SECURITY ACROSS TIME

Mother-child dyads without a new sibling

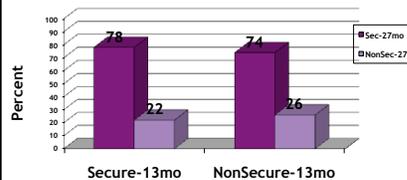


Figure 1. Attachment security is not stable between 13 and 27 months (57% stability, $\chi^2(1) = .10, ns; \kappa = .04, ns$). A great proportion of non-secure dyads became secure by 27 months (74%).

Mother-child dyads with a new sibling

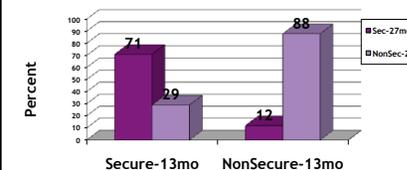


Figure 2. Attachment security is stable between 13 and 27 months (80% stability, $\chi^2(1) = 5.40, p < .05; \kappa = .60, p < .05$). A great proportion of dyads remained non-secure at 27 months (88%).

2. CHANGES IN MATERNAL SENSITIVITY ACROSS TIME

Table 2. Birth of a new sibling is associated with an increase in maternal sensitivity towards the firstborn

New Sibling	Means (SD)		t	p
	10 mo.	21 mo.		
No	.23(.58)	.30(.63)	-.80	ns
Yes	.21(.67)	.49(.48)	-2.28	<.05

Note. Correlation between 10 and 21 months Sensitivity for dyads without a sibling is .42, $p < .01$, and for dyads with a sibling is .70, $p < .01$.

4. ASSOCIATION BETWEEN CHANGE IN MATERNAL SENSITIVITY AND CHANGE IN ATTACHMENT SECURITY

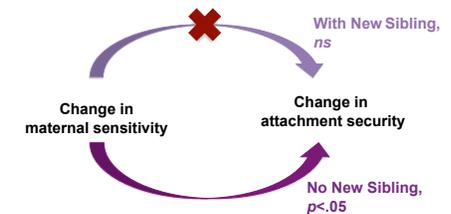


Figure 3. Change in maternal sensitivity between 10 and 21 months was associated with parallel change in attachment security between 13 and 27 months, but only for dyads that did not experience the birth of a second child.

Note. Three step logistic regression was used. For dyads without a new sibling, the likelihood of being secure at 27 months increased by 3.72 times for every SD increase in sensitivity at 21 months ($p < .05$). No significant associations were found for dyads with a sibling.

CONCLUSIONS

- This study found that among children without a new sibling, changes in maternal sensitivity were associated with parallel changes in attachment quality, as predicted by attachment theory.
- However, among children with a sibling, there were no associations between changes in sensitivity and changes in attachment quality. Specifically, despite an increase in sensitivity, there was no accompanying shift towards security.
- A possible explanation of this puzzling finding may be provided by Fearon's et al. (2010) proposal that the arrival of a sibling provokes "niche competition, expressed as sibling rivalry for the limited resource that is maternal sensitivity.
- Although this is an intriguing and promising hypothesis, it is not clear that it could fully explain the results of the current study.
- The striking result of this study and the relative scarcity of evidence on the topic of transition to siblinghood in infancy provide a compelling argument for additional research in this area.