The Interplay of Children’s and Parents’ Networks in Shaping Each Other’s Social Worlds

ChiParNet

As our social worlds remain divided by categories such as ethnicity, religion, and social class, attenuating social boundaries is paramount to creating equal opportunities and building cohesive societies. Segregated networks mark boundaries from childhood on and persist through adolescence and beyond. Research stresses parents’ influence on children’s contacts, but it largely neglects that children also influence their parents’ contacts. If we do not account for the interplay of children’s and parents’ networks, we may draw wrong conclusions about how segregation emerges and under which conditions it persists or diminishes. Since younger generations are more diverse, we must understand whether children adopt their parents’ network structures or whether diversity in children’s social lives also diversifies the social worlds of their parents.

My project aims to advance our knowledge of mutual intergenerational boundary-making by developing and testing a theory of how child–parent networks co-evolve over time in educational settings with varying degrees of diversity. I propose to collect an innovative panel dataset of children’s and parents’ networks for multiple cohorts from kindergarten to secondary school. These unique data will allow me to rigorously examine how the interplay of children’s and parents’ networks affects boundaries in each other’s social worlds and how this varies by children’s age and diversity in educational settings.

By showing how children and parents shape each other’s social worlds, the project will provide decisive new insights into the (bi)directionality and conditions of the intergenerational reproduction of social boundaries. This will change our understanding of segregation and break new ground in the interdisciplinary fields of intergroup relations, family studies, and network science. The results of the project will create a solid scientific basis on which policymakers can develop measures to reduce boundaries between future generations.
Section a: Extended Synopsis of the scientific proposal

1. Motivation and Objectives of the ChiParNet Project

Our social worlds remain divided by social categories such as ethnicity, religion, and social class (Lamont & Molnár, 2002) that segregate the social networks of youth and adults alike (McPherson et al., 2001). Attenuating social boundaries is paramount to creating equal opportunities and building cohesive societies. Moreover, intergroup contact benefits both individuals and society by providing psychosocial benefits (Jugert & Feddes, 2017; Kornienko & Rivas-Drake, 2021) and improving intergroup attitudes (Davies et al., 2011). Explaining how and why social segregation emerges and persists in diverse societies is thus an urgent task for social research.

Addressing this task, few researchers dispute that parents can facilitate or hamper children’s intergroup contact. Yet, research tends to treat parental influence as a one-way street, often acknowledging but rarely examining that children can also affect the networks of their parents (Bagci & Gungor, 2019; Smith et al., 2015; Windzio, 2015). The chief argument of the ChiParNet project is that, if we fail to understand how reciprocal child-parent influence creates segregation in the networks of both children and parents, our explanation of segregation remains incomplete at best and misleading at worst. Adopting a bidirectional approach is particularly important because young generations in Europe and beyond are more diverse (Eurostat, 2020; Fry & Parker, 2018). Against this background of growing diversity, ChiParNet will answer an essential question about the future development of segregation in diverse societies: Do children adopt their parents’ network composition, or does rising diversity in children’s lives also diversify the social worlds of their parents?

ChiParNet thus aims to advance our knowledge of mutual intergenerational boundary-making in children’s and parents’ networks. I seek to achieve this overarching objective through three successive tasks:

1. I will develop a comprehensive theory of how children’s and parents’ networks affect one another. The theory addresses reciprocal child–parent influences on each other’s preferences and opportunities for contact with different ethnic, religious, and socioeconomic groups. It further highlights how the interplay of children’s and parents’ networks is affected by diversity in educational settings in which children are embedded and how it varies with children’s age.

2. I will collect innovative panel data of children’s and parents’ networks for multiple starting cohorts from early childhood to adolescence. This unique data set is the first to combine the benefits of child–parent dyads with those of longitudinal social networks, capturing both schoolmates’ and their parents’ contacts in educational settings with varying diversity. It will also include measures of children’s and parents’ intergroup preferences, opportunities, and contacts in neighborhoods, clubs, or at work.

3. Based on this novel data set, I will use cutting-edge methods of longitudinal social network analysis and panel modeling to rigorously test my theory of intergenerational boundary-making. Examining the dynamic interplay of child–parent networks for children aged 4–15 will allow for determining whether and how children and parents shape the boundaries in each other’s social worlds. I will also assess how diversity in educational settings as well as individual and group-specific characteristics affect these interrelations.

2. The (Missing) Links between Children’s and Parents’ Networks

Although the social worlds of children and parents overlap, research usually treats them as independent. Research on the networks of children concentrates on schools, typically studying friendships between schoolmates (Kalder et al., 2019; Leszczensky et al., 2021). A key finding is that even in diverse schools with opportunities to mix with others, young people tend to be friends with peers of the same ethnic background, religion, or socioeconomic status (Leszczensky & Stark, 2019; Smith et al., 2014; Windzio & Wingens, 2014). Research on children’s networks mainly uses information on parents to measure children’s ethnicity or socioeconomic status but rarely considers the role of parents’ social contacts (but see Smith et al., 2015; Windzio, 2015).

Research on parents’ networks is scarce. The few available studies indicate that parents’ networks are rather homogenous in terms of ethnicity and social class (Fletcher et al., 2007; Horvat et al., 2003; Lareau, 2000). Yet, just as studies on children’s networks neglect the role of ties between parents, studies on parents’ networks ignore the role of ties between children. The rare exceptions are the studies by Bagci and Gungor (2019), Meeussen (2014), and Windzio (2012, 2015). Their findings support the idea of mutual child-parent-influence, but they cannot disentangle underlying mechanisms, and their cross-sectional data challenge causal interpretations.

I argue that children’s and parents’ networks are interrelated and that failing to account for their interplay threatens our conclusions about segregation. Neglecting the interplay of children’s and parents’ networks threatens to overlook a major source of segregation and misattribute the observed patterns. Given the increased diversity in rising generations, it is important to know whether children adopt the rather homogenous network structures of their parents or whether diversity in children’s lives also diversifies their parents’ social lives. To this end, we must theorize and examine the links between children’s and parents’ networks.
Figure 1 illustrates the theoretical model I propose to explain how children and parents affect each other’s networks. It recognizes that children’s and parents’ intergroup preferences and opportunities determine their own networks (Rivera et al., 2010). Previous studies suggest that children and parents can affect each other’s preferences and opportunities (arrows P and O), but they have not been able to identify underlying mechanisms. Extending prior research, I contend that children’s and parents’ networks also mutually affect their preferences and opportunities. First, their networks mutually influence their intergroup preferences, as contact with each other’s out-group friends improves out-group preferences (arrow N1). Second, their networks mutually affect their intergroup opportunities, as children meet the children of their parents’ friends and parents meet the parents of their children’s friends (arrow N2). Next, I outline what we (do not) know about the links described in the model and what related research questions ChiParNet seeks to answer.

3. State of the Art and Research Questions (RQ)

RQ1: How Do Children and Parents Affect Each Other’s Intergroup Preferences? The first path by which children and parents affect each other’s networks runs through mutual influence on their preferences. Children’s intergroup attitudes mirror those of their parents, but we know little about why (Degner & Dalege, 2013). The prevailing view is that children learn intergroup preferences from their parents (Aboud & Amato, 2003; Allport, 1954; Smith et al., 2015). Through socialization, parents transmit their attitudes to their children (Grusesc, 2011). This can be deliberate or unintentional, e.g., parents can encourage children to establish or avoid out-group contact (Edmonds & Killen, 2009; Hamm, 2001; Munnikama et al., 2012) or children observe how their parents interact with or talk about out-group members (Castelli et al., 2008; Segall et al., 2014). However, bidirectional models of socialization question this conventional view of a one-way street, maintaining that children can also influence their parents (Ambert, 2001; Knafo & Galansky, 2008). This can also be intentional or unintentional, e.g., children may try to change their parents’ attitudes or just accidentally provide them with information leading to attitudinal change. Research on child effects is scarce, but in an early study, one-third of parents reported that their out-group attitudes had changed because of their children (Peters, 1985).

While most studies assume that parents influence children, it is unclear whether children also influence parents and how strong mutual influences are (Jugert et al., 2016; Miklikowska et al., 2019). Most research is cross-sectional, which prevents firm causal conclusions. Since research on the transmission of intergroup attitudes runs parallel to network research, we do not know whether such influence translates into social relationships. Research on how parents influence children’s friendships is equally scarce (Bagci & Gungor, 2019; Jugert & Feddes, 2017), and we know little about whether children’s intergroup preferences affect parents’ preferences.

ChiParNet will advance our knowledge by identifying if and how children and parents affect each other’s intergroup preferences.

RQ2: How Do Children and Parents Affect Each Other’s Intergroup Opportunities? The second path by which children and parents affect each other’s networks is through shaping each other’s intergroup opportunities. Parents influence whether and where children meet peers, for example by choosing their school or managing their social activities (Ladd & Pettit, 2002; Rubin & Sloman, 1984). As with the transmission of attitudes, parents intentionally or unintentionally determine their children’s opportunities to encounter out-group members. Yet again, children are hardly passive, as they can ask to meet peers or refuse to participate in activities organized by their parents (Parke et al., 2003). Children can also influence parents’ intergroup opportunities by involving them in diverse contexts such as clubs or by initiating activities between families (Knafo & Galansky, 2008).

We do not know how important parents are for children’s intergroup opportunities as there is no systematic research on this. Children’s and parents’ opportunities for intergroup contact are intertwined, and disentangling their mutual influence again requires longitudinal data. It also is unclear how much influence children have on parents’ opportunities. While education researchers, psychologists, and qualitative studies stress that parents meet out-group members through their children (Ambert, 2001; B. B. Brown & Mounts, 2007; Small, 2009), with few exceptions (Schaeffer, 2013; Windzio, 2015), quantitative research has neglected to ask—let alone examine and answer—this question.

1 For the sake of clarity, Figure 1 depicts mutual parent–child influence. This is not to deny omitted other influences; e.g., children’s and parents’ preferences are likely to be shaped by their own networks as well (e.g., Brachegirdle et al., 2021).
RQ3: How Do Children and Parents’ Networks Affect Each Other’s Preferences and Opportunities? Beyond children and parents’ influencing each other’s preferences (RQ1) and opportunities (RQ2), their networks also can influence each other’s preferences and opportunities. Such network effects operate beyond the preferences and opportunities of children and their parents, and they capture the creation of new ties resulting from crosscutting social circles of children and parents. For example, irrespective of parents’ preferences and opportunities, a diverse parent network may affect children’s preferences and opportunities for intergroup contact; likewise, a diverse child network may affect parents’ contacts. Children often meet their parents’ friends and their children, and if these are out-group members, intergroup contact theory suggests that this improves youth’ intergroup attitudes (Pettigrew, 1998). Meeusen (2014) speculates that the impact of parents’ intergroup friends is even stronger than that of parents’ intergroup attitudes, as it is easier for children to observe their parents’ contacts than their attitudes. Children of parents with a diverse circle of friends may therefore also prefer a diverse friendship network, whereas children of parents with little out-group contact may not (Bagci & Gungor, 2019; Smith et al., 2015). At the same time, parents also interact with their children’s friends, for example when these children visit or when parents drive them and their own children to joint activities. Moreover, children may expose their parents to other parents, so social contact between children facilitates social contact between parents (B. B. Brown & Mounts, 2007; Nast & Blokland, 2013). For instance, parents meet the parents of their children’s friends at social events such as birthday parties (Windzio, 2015). Parents may thus be influenced by direct contact with other parents they encounter through their children (Ambert, 2001).

The few studies that examine the effects of parents’ networks on children’s networks share two major shortcomings (Bagci & Gungor, 2019; Meeusen, 2014; Windzio, 2012, 2015). First, they are cross-sectional, so it is unclear whether parents’ out-group contact increases their children’s out-group contact or vice versa. Second, most studies rely on children’s perceptions of parents’ relationships rather than parents’ self-reports (Windzio, 2012, 2015). This may cause bias because children tend to perceive parents to be similar to themselves (Aboud & Amato, 2003; Degner & Dalege, 2013) and are more likely to know and report parents of their friends than parents of children they are not friends with.

RQ4: How Does Diversity in Educational Settings Affect the Interplay of Child–Parent Networks? Children’s educational settings are key contexts for their own and their parents’ intergroup experiences (Bohman & Miklikowska, 2020; Eckstein et al., 2021; Small, 2009; Vincent et al., 2018). Diversity in educational settings has crucial but often overlooked consequences for mutual parent–child influences. Concerning parent-to-child influence, children in diverse educational settings may be less susceptible to parental influence, as their intergroup experiences may shield them from the impact of parental prejudice (Dhont & Van Hiel, 2012; Miklikowska et al., 2019; Rodríguez-García & Wagner, 2009). On the other hand, parents’ prejudice may undermine the impact of diversity on children (Thijs & Verkuyten, 2014), because parental influence may override children’s own contact experiences (Allport, 1954; Cernat, 2016).

As to child-to-parent influence, parents of children in multi-ethnic schools may be more likely to accept that their children have out-group friends since they have become more tolerant through their children’s experience with diversity (Munniksema et al., 2012). However, parents with negative out-group attitudes are unlikely to send their children to diverse schools in the first place. Parents with little or no intergroup contact may particularly benefit from their children’s embeddedness in diverse educational settings, as this could diversify their own social world. While quantitative research is lacking, qualitative studies show that friendships between parents of children in diverse schools can cross ethnic or class divides (Nast & Blokland, 2013; Wilson, 2013).

RQ5: How Does Children’s Age Affect the Interplay of Child–Parent Networks? The mechanisms discussed in RQ1–RQ4 are likely to depend on children’s age. For parent-to-child influence, age is essential in two opposing ways. On the one hand, parents’ influence may decline as children grow older and are less dependent on their parents and spend less time with them (Allport, 1954; Vollebergh et al., 2001). On the other hand, when children hit puberty, some parents try to restrict their out-group contact, especially of daughters (Kretschmer & Leszczenski, 2021; Munniksema et al., 2012). This double standard is ubiquitous but particularly strong among minority parents, many of whom fear the preservation of their culture to be threatened if their daughters mingle with the out-group (Suárez-Orozco & Qin, 2006). Children’s age also could affect child-to-parent influence in
different ways. On the one hand, parents may rarely observe adolescents’ peer relations, whereas they regularly supervise young children’s interactions with peers and are therefore more likely to meet and thereby be influenced by their young children’s friends and their parents. On the other hand, group boundaries tend to be stronger in adolescence than in childhood (Umaña-Taylor et al., 2014). Since parent-child relations become more egalitarian over time, adolescents’ changing intergroup perceptions may influence parents (Vollebergh et al., 2001).

While researchers speculate that parents have a stronger influence on the contacts of children than on those of adolescents (Smith et al., 2015; Windzio, 2015), research on age differences is scarce. Comparative research across different stages of child development is lacking (Degner & Dalege, 2013; Jugert et al., 2016).

ChiParNet will theoretically explore and empirically examine whether and how mutual child–parent influence on each other’s networks varies at different stages of child development.

4. Ground-Breaking Nature and Impact of the ChiParNet Project
As outlined above, there is scattered evidence but little secure knowledge on the various links between children’s and parents’ networks. Most studies examine parent-to-child influence, acknowledging but ultimately ignoring the mutual influence of children and parents. ChiParNet goes beyond this conventional approach that treats the social worlds of children and parents as independent. This is crucial because if we continue to overlook the interplay of children’s and parents’ networks, we do not understand fully how segregation emerges and under which conditions it persists or disappears. For example, research on youth’ networks that ignores parents’ influence may falsely attribute segregation to peer processes. Similarly, research may erroneously attribute child–parent similarity to parental influence if it neglects that children also influence parents.

ChiParNet will break new ground by comprehensively theorizing and rigorously examining the dynamic interplay of children’s and parents’ networks. The project will thereby challenge our understanding of network segregation and advance our knowledge of its underlying processes. ChiParNet will provide decisive new insights into the (bi)directionality and conditions of the intergenerational reproduction of social boundaries. These insights will provide fruitful avenues for future research on segregation and group boundaries. Moreover, they will create a firm scientific foundation on which policymakers, educators, and school administrators can develop measures to diminish boundaries and promote integration.

5. Methodology and Implementation
Task 1: Developing a Theory of How Children and Parents Affect Each Other’s Networks. I will first elaborate my theoretical model, which addresses RQ1–RQ3 and is sketched in Figure 1. As stated in RQ4 and RQ5, the interrelations between children’s and parents’ networks are likely to depend on the diversity of educational settings and children’s age. A key part of the theory development is a comprehensive interdisciplinary literature review of qualitative and quantitative studies in developmental and social psychology, education research, family studies, demography, network science, and sociology. Moreover, I will incorporate group-specific influences; for example, parent–child interaction tends to be more hierarchical in low SES and in immigrant families (Carol, 2014), which may affect the interplay of child–parent networks.

Task 2: Collecting Panel Data of Children’s and Parents’ Networks. Data to assess the interplay of children’s and parents’ networks must meet three criteria. First, they must include direct measurements of intergroup preferences and opportunities of children and parents. Second, they must contain information on the social networks of both children and parents, including attributes of peers and their parents, who are also surveyed. Third, all information must be longitudinal to empirically disentangle parent-to-child from child-to-parent influence.

Since no existing data meet all criteria, I propose to collect a unique multi-cohort German panel dataset that combines the strength of child–parent dyads and network panel data. Second only to the U.S., Germany is the world’s leading destination country for migrants (OECD, 2021). In contrast to immigrant societies such as the U.S. but like other European countries, Germany has only relatively recent experience with growing shares of ethnoreligious minorities, thus making it an important case with implications beyond national borders. Here, my rich experience in collecting school-based network data will be beneficial (Leszczensky et al., 2021; Leszczensky, Beier, et al., 2016).

As shown in Figure 2, the data will consist of three yearly waves for four cohorts that are defined by children’s age and educational settings, ranging from kindergarten (age 4–6) to elementary school (age 7–9) and lower secondary school (ages 10–12 and 13–15). Each cohort will survey about 600 children and both their parents. The core of the survey are children’s and parents’ networks as

![Figure 2. Three-Wave Multi-Cohort Panel Dataset of Children’s and Parents’ Networks.](image-url)
defined by various types of relationships between the children and their schoolmates on the one hand and their parents on the other. To capture diversity in educational settings, each cohort will comprise settings with low (<10%), medium (~20-30%), and high (>50%) shares of families with a migration background. For both children and parents, I will also collect ego-centered network data on contacts in clubs, neighborhoods, or at work.

**Task 3: Testing the Theoretical Model.** I will use the collected dataset to rigorously test the components of the developed theoretical model. The empirical tests are based on stochastic actor-oriented models of network and behavior dynamics, which break down the underlying mechanisms of network formation and separate them from network influence (Snijders et al., 2010; Steglich et al., 2010). I am highly familiar with these methods, having used them to examine both network formation (Leszczensky & Pink, 2015, 2019) and peer influence in youth’ networks (Leszczensky, Stark, et al., 2016; Leszczensky & Pink, 2020). In recent and ongoing work, I have also used these methods to investigate variation in religious friendship segregation by age and religious school composition (Leszczensky & Kretschmer, 2022a, 2022b). An extension of these models will allow me to study the interrelations of children’s and parents’ networks by treating each network as a joint dependent variable while considering reciprocal cross-network effects (Snijders et al., 2013).

Besides using longitudinal social network analysis, I will exploit recent advances in panel models addressing reverse causality (Allison et al., 2017; Hamaker et al., 2015). As I have shown, reciprocal effects can be identified by specifying cross-lagged panel models with fixed effects (Leszczensky & Wolbring, 2019). In addition to identifying processes of intergenerational boundary-making, addressing the influence of peers and parents on network segregation will allow me to re-evaluate the role of parental and peer influence based on past research that often concentrates on one of them while neglecting the other.
References


