Networks and Success
Access and Use of Social Capital among Young Adults in Sweden
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Abstract
The thesis explores the role of social capital in shaping inequality among young adults. Social capital is defined as resources embedded in a social network and the thesis investigates differences in access to social capital, and the effects in the labor market and the housing market. The thesis consists of four empirical studies and an introductory chapter that develops the theoretical and empirical background. The four empirical studies use a Swedish survey titled “Social Capital and Labor Market Integration” that includes individuals born in 1990 living in Sweden. A gross sample based on three subsamples was selected based on the country of birth of the respondents’ parents (Sweden, former Yugoslavia, or Iran). The survey consists of two waves of panel data and most respondents were 19 years old at the time of the first survey and 22 at the time of the second. The four studies investigate: (1) the effect of social class and migration background on access to social capital through national and transnational ties, (2) the effect of socioeconomic segregation in schools and neighborhoods on access to social capital through occupational networks and close friendship ties, (3) the effect of social capital in the process of labor market entry, and (4) the effect of social capital on the likelihood to move away from parents. All four studies measure social capital with ego network measures and the main measurement is the position generator that asks the respondent about contacts in occupational positions spanning the socioeconomic structure. Results show that family background factors and socioeconomic segregation affects access to social capital, and that social capital affects labor market and housing market outcomes. The thesis concludes that social capital is an important factor to understand unequal outcomes among young adults.

Keywords: Social capital, labour market, housing market, young adults, social class, immigration background, neighbourhood.

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For my social capital
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Study I: The intersection of class origin and immigration background in structuring social capital: The role of transnational ties
Together with Christofer Edling and Jens Rydgren
   *Accepted for publication in The British Journal of Sociology*

Study II: Socioeconomic Segregation and Access to Social Capital: The effect of schools and neighborhoods on the social capital of young adults
   Manuscript

Study III: You can do it: The effect of social capital on self-efficacy, information, and job search in the process of labor market entry
   Submitted

Study IV: Nest leaving and social capital: channels, housing tenures and resources
   *Manuscript*
Sammanfattning

Denna avhandling handlar om hur socialt kapital bidrar till att skapa ojämna lika utfall för unga vuxna. Socialt kapital definieras här som tillgång till resurser genom sociala nätverk och denna avhandling undersöker vad som påverkar individens tillgång till socialt kapital samt vad det har för effekter på arbetsmarknaden och bostadsmarknaden.

Avhandlingen består av en kappa och fyra empiriska delstudier. Kappan diskuteras olika definitioner av socialt kapital, följt av en diskussion av de strukturer och mekanismer som skapar ojämlikhet i tillgången till socialt kapital. Kappan diskutera också hur socialt kapital kan vara användbart, hur det ska mätas och avslutas med en normativ diskussion.

De fyra empiriska studierna baseras på en enkätundersökning som intervjuat unga vuxna födda 1990. Den består av två vågor där de flesta respondenterna är 19 år i den första vågen och 22 år i den andra. Bruttourvalet utgörs av tre stratum baserat på om respondenternas föräldrar var födda i Iran, f.d. Jugoslavien eller Sverige, vilket möjliggör mer detaljerade studier av dessa tre grupper. De fyra empiriska studierna undersöker: (1) effekten av klass bakgrund och föräldrarnas födelseland på individens tillgång till socialt kapital genom nationella och transnationella kontakter, (2) effekten av socioekonomisk segregation i skolor och bostadsområden på tillgången till socialt kapital genom kontakter i yrkespositioner och nära vänner, (3) hur socialt kapital har effekt på ungas inträde på arbetsmarknaden, (4) effekten av socialt kapital på sannolikheten att unga vuxna flyttar hemifrån samt på vilken kanal de använder för att hitta sin bostad.

Alla fyra empiriska studier använder sig av mått på individens nätverk insamlade i enkäten. Dels en "namngenerator" som frågar efter de fem närmsta vänerna, dels "positionsgeneratorman" som frågar efter kontakter i yrkespositioner som utspridda över den socioekonomiska strukturen.

Resultaten visar att tillgången till socialt kapital påverkas av klassbakgrund och föräldrarnas födelseland, samt av den socioekonomiska segregationen. Resultaten visar också att socialt kapital har effekter på utfall på arbetsmarknaden och bostadsmarknaden.

Avhandlingens slutsats är att det är viktigt att förstå fördelningen av socialt kapital för att förstå ojämnlika utfall för unga vuxna.
In writing this thesis, I have struggled with the concept “group”, called by some the main study object of sociology, and by others considered an oversimplification of a reality with relations, affiliations, identities and loyalties. While I certainly do not agree with the former position, I did hold the latter true for a while, but later recognized how useful and necessary “the group” is to describe a complex social reality. Without groups it is difficult to describe the fact that there are tendencies of interaction, activity, characteristics and roles among a population. Although this comes at the cost of ignoring individual within-group differences, as well as the almost always occurring overlap between different groups, I will here make use of the group concept to try to thank those who needs to be acknowledged, while at the same time mention a few names of special importance.

Starting with the largest group, I would like to thank the Swedish taxpayers who generously paid my salary for a few years. Their contribution is however overshadowed by the 3,609 respondents to the survey analyzed in this dissertation. Without the thousands of hours they together have spent in responding to tiresome questions, mainly about their friends, this project would not have been possible. The same goes for the interviewers who have spent just as much time asking questions. I would also like to thank other employees at Statistics Sweden and the members of the department’s administrative staff.

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learned a lot about research in general and about social networks in particular.

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Anton B. Andersson
Frescati, May 2017
1. Introduction

From the moment we are born, we rely on social relations and the assistance or encouragement that others are willing or unwilling to provide. This thesis takes its point of departure from the effects these social relations on later outcomes, and focuses on the formative years between late adolescence and early adulthood. The choices made and positions achieved in these years have consequences for the rest of the life course. Since life, to some extent, has a path dependency, early events will tend to matter more than later ones. For instance, early employment might generate advantages that lead to new employment, while those beginning their working life as long-term unemployed start off from a difficult position. The social environment of adolescents is different from that of children: their social networks are no longer determined by parents, but include larger networks of friends, acquaintances, siblings, relatives and partners, which points to the need to go beyond the nuclear family to investigate how social relations affect outcomes.

This thesis focuses on a particular feature of relations, namely resources embedded in social networks, or social capital, and how this can enable an individual to perform certain actions. Social capital has been described as an umbrella concept that has received manifold definitions and applications (Adler and Kwon, 2002), which will be described below. Social capital in this thesis however has a specific meaning viewed from a network-resource perspective, and it is here used to answer the classic stratification question: who gets ahead and why?

The studied context is Sweden, a country with a universalistic welfare state and low corruption (Transparency International, 2017), which arguably provide a strong test case for examining the effect of the use of contacts.

The general aims of the thesis are (1) to explain inequality in social capital and in particular to examine how distribution of social capital is linked to classic forms of stratification such as social class origin, immigration background, and socioeconomic segregation; (2) to better understand when and how social capital is useful by investigating effects of social capital in the labor and housing markets. The aim is to contribute to the general field of stratification by providing mechanisms that can explain inequality in life chances.

A model of how social capital affects outcomes is presented in figure one (below). This model synthesizes the theories of Nan Lin (2001) and describes the process of social capital acquisition and its effects on outcomes,
divided into three steps. First, the model suggests that differences in access to social capital can be explained with factors such as socioeconomic background or individual resources. Second, individuals can make different use of the resources they access, even when embedded in the same social networks. Third, social capital affects returns or influences outcomes such as labor market entrance.

This theoretical model is utilized to organize this thesis. The first part of the model—the structures and processes that give rise to inequality in social capital—is discussed in section three of the introduction, which presents the opportunity (supply) – choice (demand) model of social capital formation. The second and third part of the model are about activation and returns of social capital and are discussed in section four of this chapter, clarifying some theoretical points and contextualizing the empirical papers through a discussion of returns on social capital across contexts and time.

This introductory chapter also discusses the methodology used in the thesis focusing on how to use survey data to measure social capital. The empirical papers are presented, and then the chapter concludes with discussion of normative questions and policy implications.

Lin’s model also structures the empirical papers. Studies I and II are about inequality in social capital: study I discusses the joint effects of social class background and immigration background, and study II shows the unequal effects of socioeconomic segregation on social capital. Studies III and IV address the activation of resources and their effects. Study III investigates effects of social capital on the labor market and study IV effects of social capital on the housing market.

Figure 1
2. Definitions of social capital

Social capital has received several meanings and definitions from earlier scholars, and has been described as an umbrella concept pointing to the positive side of social norms, relations and interactions, to explain why some collectives or individuals are more successful than others. According to Putnam (2001), the first known use of social capital as a scientific concept was Lyda Hanifan’s (1916) account of its role in strengthening rural schools. By “social capital”, Hanifan (1916: 130) meant “those tangible assets [that] count for most in the daily lives of people: namely good will, fellowship, sympathy, and social intercourse among the individuals and families who make up a social unit.” Jane Jacobs (1961) was also relatively early in using the concept and wrote about networks of social relations as a city’s vital social capital. The economist Glen Loury (1977) used the term to critique orthodox economics for being too individualistic and focusing exclusively on human capital, which, he argued, does not fully explain racial inequality in the United States (Portes, 2000). It was however Bourdieu who was the first to give the concept a thorough treatment, first in French in 1980 (Bourdieu, 1980) and a few years later in English in a book on the sociology of education (Bourdieu, 2011 [1986]). At about the same time, Nan Lin started to develop his theory of “social resources” (Lin, 1981), which he later rephrased as social capital (Lin, 2001). Furthermore, dating back to the 1970s the concept social support has been used in social medicine with a similar meaning, but with a higher emphasis on emotional support and appraisal (House, Umberson and Landis, 1988; Langford et al., 1997). Yet, the breakthrough of social capital into a broader scientific and public discourse came with the work of Coleman (1988) and Putnam (1995) that used the concept to explain why certain social environments are more productive than others.

This development of social capital has led to the term as an umbrella concept, used for various empirical phenomena at several levels. Although all definitions have a common core—that social capital stands for the ability of actors to secure benefits by virtue of membership in social networks or other social structures (Portes, 1998)—they have differing theoretical approaches to the problem, as well as differing units of study. One distinction is between studies of macro-level versus micro-level outcomes, another between functionalist and non-functionalist approaches.

James Coleman has a broad, functional view of social capital. Coleman (1988) states that the value of social capital is that it identifies certain aspects of social structure by their function, just as “chair” identifies certain physical objects by their function. Coleman (1988) writes:
Social capital is defined by its function. It is not a single entity but a variety of different entities, with two elements in common: they all consist of some aspect of social structures, and they facilitate certain actions of actors—whether persons or corporate actors—within the structure. (Coleman, 1988: S98)

For Coleman (1998) social capital is about a combination of norms and social relations of mutual obligation. His definition can be classified as functional because social capital is possible to identify by its effects only. Note that according to this definition, both persons and large entities can gain from social capital while “social structure” is the source of possible advantages, which makes the concept wide reaching in the scope of phenomena that can be included both on the dependent and the independent side of an equation. While clearly functionalist, Coleman’s theory does not have a clear macro or micro orientation, as various levels are studied.

Robert Putnam (1995) view on social capital differs from Coleman in that he has a clear macro-level perspective. He defines social capital as:

Features of social life—networks, norms, and trust—that enable participants to act together more effectively to pursue shared objectives. (p. 664-665)

The reference to “shared objectives” clearly places Putnam (1995) in the macro-level view of social capital that is interested mainly in outcomes of social capital at the collective level, such as communities or regions. Although, Putnam’s (1995) definition is not explicitly functional like Coleman’s, it can be argued that it is semi-functional. Putnam states that social capital is social networks, norms, and trust that enable participants to act together, which means that it is difficult to identify and measure social capital when it does not have this function.

Another author with a macro perspective is Francis Fukuyama (2001), who defines social capital as, “an instantiated informal norm that promotes co-operation between two or more individuals” (Fukuyama, 2001: 7). This definition focuses on norms and can be classified as macro, since outcomes are on the group level, and as non-functional, as a norm of cooperation can be found without actual cooperation and it is hence possible to separate the cause and the effect. This type of social capital—trust and norms of cooperation—has been shown to relate to economic performance (Knack and Keefer, 1997).

Other researchers are more micro oriented in their approach to social capital. Burt (2000) views social capital as resulting from positions in net-
works, and more specifically the brokerage opportunities in networks that depends on the existence of structural holes. Burt (2000) writes, “Participation in, and control of, information diffusion underlies the social capital of structural holes... The argument describes social capital as a function of brokerage opportunities…” (Burt, 2000: 353). Burt views unique in that he sees an individual’s structural position in a network is the key source of access to social capital.

A more broad view of social capital is associated with Pierre Bourdieu (2011 [1986]) who defines it as:

> Social capital is the aggregate of the actual or potential resources which are linked to possession of a durable network of more or less institutionalized relationships of mutual acquaintance and recognition – or in other words, to membership in a group – which provides each of its members with the backing of the collectivity-owned capital, a “credential” which entitles them to credit, in the various senses of the word. (p. 86)

This definition of social capital includes informal relations, group memberships and rights granted by institutionalized relationships. Although this definition includes individuals and collectively-owned capital, and hence both micro and macro (or meso) levels, the main focus of Bourdieu’s theory is how capital is used in micro level social stratification. Bourdieu’s (2011 [1986]) approach to social capital is not functionalist since it is possible to distinguish the factors making up social capital from their effects. Nevertheless, the broad scope of this theory makes it difficult to use in empirical investigations of the role of social capital in explaining outcomes.

Nan Lin’s view of social capital is similar to Bourdieu’s, but with a narrower application. Lin (2001) defines social capital as: “resources embedded in a social structure that are accessed and/or mobilized in purposive actions” (Lin, 2001: 29). Like Bourdieu, Lin (2001) includes access to resources through ties, but in contrast to Bourdieu, he does not include institutional rights or privileges as social capital. Instead, Lin (2001) states that social capital can be the result of group memberships, institutions, position or rights if these leads to informal relations. This makes it possible to study social capital as a result of certain positions or group memberships.

These different definitions and measurements of social capital have led to difficulties in uniting social capital research. While it could be argued that the different authors focus on different dimensions of the same underlying latent concept, the macro versus micro perspectives are in tension with each other to the extent that they are used to explain two opposing phenomena: cooperation and competition. The cooperation view sees social capital as benefiting all involved\(^2\) while the competition view regards it as necessarily

\(^2\) Some scholars argue that there is a dark side with too much social control or when cooperation is used to harm outsiders (Portes, 1998).
exclusive, as networks between people also involve non-ties with outsiders who are excluded from social capital (Li, Pickles and Savage, 2005). This suggests that keeping the different dimensions of social capital under the same umbrella concept is problematic since it can induce misunderstandings. In addition, the functional view can be criticized for being tautological as it does not separate cause from effect (Portes, 1998; Lin, 2001).

This thesis uses a particular strand of social capital research interested in networks and resources that is only somewhat connected to the functional and macro applications of social capital. Studies of social capital in this tradition are based on the theories of Nan Lin and Pierre Bourdieu, and the thesis will use the more theoretically limited and clear view proposed by Nan Lin (2001), well suited for a study of the role of social capital in socio-economic stratification. An advantage of Lin’s approach is that he has developed a measurement of social capital focusing on access to positions through informal relations (Lin and Dumin, 1986), which has been used in many studies and also will be used in the present study.

The definition of social capital herein is slightly different from the one used by Lin. Social capital is here defined as resources embedded in a social network that can be used in intentional action. The first part of the definition makes clear that social capital is a potentiality (“access to”). The second part of the definition (that can be used in intentional action) concerns the relationship between resources, desires and agency and makes clear that desires or intentions are not the result of social capital.

This definition implies that social network effects on what people want to do are not considered effects of social capital. In contrast, there are several network mechanisms that also include effects on desires such as: contagion, adoption (DiMaggio and Garip, 2012), influence (Aral, Muchnik and Sundaranarajan, 2009) or imitation (Burt, 2000). Furthermore, social capital is not the same as “peer effects” describing how people in a certain setting might affect each other’s outcomes. Peer effects not only refer to effects channeled through social networks but “nearly any externality in which peers’ backgrounds, current behavior, or outcomes affect an outcome” (Sacerdote, 2011: 250). The processes this thesis focuses on are somewhat more limited in scope, but nonetheless, I will argue, important in explaining who gets ahead in society.

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Footnote 3: I draw extensively on Nan Lin’s (2001) work, but unlike Lin, I do not assume that actors are rational and act to promote their self-interest. This thesis does not use a rational choice perspective, but adheres to methodological individualism in the study of how resources make it possible for individuals to pursue the actions they have in mind (Udehn, 2002).
3. Inequality in social capital

3.1 Social capital and social structure

This thesis investigates how certain aspects of social structure can lead to inequality in social capital. The question is what mechanisms can explain how attributes and place in a social structure determine an individual’s social network. This section starts with a definition of social structure and a discussion of the mechanistic approach, followed by a theoretical model that provides mechanisms that can explain inequality in social capital.

Social structure here refers to something different than just a “structured” or non-random distribution affected by some underlying mechanism. Instead, social structure is here defined as (1) a pattern of formal and informal relations, (2) the rules and procedures regulating how resources can be used and (3) how resources are tied to positions (c.f. Sewell, 1992; Lin, 2001).4 Note that this view sees social structure as external to individuals and exerting constraints on them (c.f. Rytina et al., 1988). This differs from Anthony Giddens (1984) structuration theory in which social structure is seen as constantly created by knowledgeable individuals existing virtually in their minds.

According to the definition above, structure includes both formal and informal relations. Examples of formal elements of social structure are the occupational structure, laws, the school system, and political parties. The pattern of informal relations between individuals refers to a durable network of social ties or relations based on sentiments of recognition such as friendship, romantic, and kinship ties. Resource is defined as material or symbolic goods that have meaning and significance to human groups (Lin, 2001).5 Below, I will describe mechanisms through which formal social structure and distribution of resources and characteristics can cause inequality in social capital, but first, I will define the term mechanisms.

3.2 Mechanisms explaining relational creation

To refer to social structure to explain individual outcomes risks becoming fuzzy if the explanation cannot account for how the particular social structure was brought about. The mechanistic approach to social sciences suggests that a purely statistical account of a process is not enough to explain it.

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4 This is close to Lin (2001: 33) but Lin also includes the relation to authority, which here is considered an important feature of many structures, but not a defining characteristic.

5 Resources can be embodied human skills but only to the extent that they are valued by others.
Explanation, according to this view, is to “detail the cogs and wheels of the causal process through which the outcome to be explained was brought about” (Hedström and Ylikoski, 2010: 50). A mechanism is identified by the kind of effect or phenomenon it produces and is hence an irreducibly causal notion. The focus on mechanisms breaks up the original explanation-seeking “why” question into a series of smaller questions: what are the participating entities, and what are their relevant properties (Hedström and Ylikoski, 2010)? In the case of sociology such mechanisms can be sought in psychological processes or in distributions of individuals and their characteristics. The challenge for a mechanistic approach is to find the probable mechanisms among several plausible mechanisms that can account for the empirical regularity in question.

3.3 A general model of friendship

In this section, I will describe the mechanisms that can explain patterns in relationship formation. The process of tie formation and dissolution might be thought of in terms of a preference (demand) – opportunity (supply) model. This two-factor model specifies that the likelihood of a tie between ego and alter is dependent on (1) preferences for interaction with others and (2) meeting opportunities (Blau, 1977; McPherson and Smith-Lovin, 1987). I will describe two types of individual mechanisms based on homophily and status, and two types of opportunity mechanisms related to spatial distance and focused interaction.

3.4 Individual preference: homophily and status

3.4.1 Homophily

To describe the tendency toward interaction with similar others, Lazarsfeld and Merton (1954) introduced the term homophily to denote “a tendency for friendships to form between those who are alike in some designated respect” (p.23). In the literature that followed, homophily has been used both in reference to an empirical regularity, and a process or mechanism that explain that empirical regularity. Most papers refer to homophily as the observed result of a social process, for instance the review paper by McPherson, Smith-Lovin and Cook (2001). A few authors do maintain that the term should be used for the mechanism leading to an empirical result and that the

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6 There are early observations of the fact that similar people tend to interact: the idiom “birds of a feather flock together” dates back to at least the 15th century (Currrarini, Jackson and Pin, 2009). There are also early observations of a behavioral micro-level mechanism that might create such a pattern. Simmel (1949 [1910]) wrote that sociability between members of different social classes is “burdensome and painful” (p. 257).
effect observed in networks should be described as *homogeneity* or *network autocorrelation* (e.g. Feld and Grofman, 2009). As a result of this confusion, researchers need to be explicit about the usage (c.f. Roman, 2016), and I will henceforth refer to a homophily mechanism indicating a preference or similarity, and use homogeneity to denote the outcome.

The tendency to interact with similar others might be explained by higher gains in interaction. Similarities in terms of shared attitudes or interests might lead to more attraction and a greater interest in exchange (Homans, 1950; Blau, 1964; Huston and Levinger, 1978). Byrne (1961) found that people with similar attitudes are judged to be more intelligent, more moral and generally evaluated more positively. Heider (1946) states that cognitive balance is created when two persons attach the same value to a third person or object. For example, liking a political party that a friend dislikes creates an uncomfortable cognitive dissonance, at least if that thing is really important to both of you, implying that similarity between two individuals likely leads to cognitive balance.7

3.4.2 Status mechanisms

Another oft-observed property of networks is that people with more resources are more attractive and tend to have more relationships. This phenomenon can be explained with what Weber (1946) labeled *status*. Weber (1946) distinguishes between class and status, where class refers to relations originating in the economic sphere and status is related to socially positive or negative estimations of a person. Class is based on a market situation and opportunities for income, which is determined by ownership of property and the type of service that non-owners provide in the market (Weber, 1946; Marx, 2001 [1818-1883]).8

There are two types of status mechanisms active in network formation. First, people want to have gainful relations in terms of the resources they can extract from the relationship (Homans, 1958; Van Der Gaag and Snijders, 2005), which Laumann (1966) called the *prestige hypothesis* (p. 13). A special case of this is a mechanism stating that people want to interact with al-

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7 There is an interesting property of the similarity mechanism for continuous variables: namely that people at the top and bottom of the distribution will have fewer relations compared to people in the middle (or, a lower "in-degree" in network terminology). That is, people in the middle of the distribution are expected to have a larger and broader network. This edge effect and its outcomes, described by Laumann (1966), was shown in one of the first works in the subfield of network inequality (Verbrugge, 1977). There is evidence in line with this in the social capital literature. Savage et al. (2013), using similar methodology as this thesis, find that the upper class has a lower extensity of contacts compared to upper-middle class due to their lack of connections with people in lower class positions.

8 The neo-Marxian perspective of class also points to the importance of command over authority within organizations (Wright, 1997), but is otherwise similar to the Weberian perspective with its base in economy.
ready well-connected others or, put differently, those that have rich social capital, which means that attractiveness arises from within the network itself (c.f. Van Der Gaag and Snijders, 2005; Lusher and Robins, 2012). This type of status mechanism leads to constantly reinforcing inequality (c.f. Barabási and Albert, 1999). However, the status mechanism can also lead to similarity in relations. In situations where both sides have to accept that the relationship is mutual and exclusive, such as marriage, there will be tendencies toward similarity, assuming that both parties reach for the highest status partner possible, and will only accept others with a certain status. The result of this matching process is similarity in the amount of resources (Skopek, Schulz and Blossfeld, 2010). Note however that this does not apply to weak ties as high status individuals need to be less picky about such relations and can instead have many relationships.

Second, resources also have an effect from the ego’s point of view. People rich in resources can sustain unequal relationships and maintain many outgoing as well as incoming ties. More material resources imply the possibility to arrange parties, give appropriate gifts and afford to participate in joint activities (c.f. Hjalmarsson and Mood, 2015). The implication of these status and resource mechanisms is that people with higher status and resources will have more outgoing and incoming ties, and hence more social capital.

3.4.3 Differences in the interaction mechanisms and their effects on social capital inequality

There are some differences in the prediction of the status and homophily mechanisms. The main difference is that the status mechanism implies that higher status is related to higher social capital, while homophily mainly gives homogeneity in networks and hence differences in the type and amount of resources contacts possess rather than the total network size. Put differently, homophily is associated with knowing people with similar resources while the status mechanism implies that high status individuals know people with both similar and different resources.

Another difference is the extent to which one characteristic can be exchanged for another. The status theory suggests that one element of status can be exchanged for another. For instance, someone poor and handsome may marry someone less attractive but rich. Such “trade” is not possible for similarity. For example, disagreement on one subject is not compensated by disagreement on another.

These mechanisms however generate the same result to the extent that ties are constrained by costs and require some reciprocity. Both the homophily
and status mechanisms predict that people have their strong reciprocal relations with others with about an equal amount of status. However, the status mechanism suggests that they actually prefer to have relations with people with higher status. Laumann (1966) found support for a divergence between preferred and actual relations among lower status individuals. He demonstrates that low status individuals prefer to have relations with high status individuals, but actually mostly have relations with people similar to themselves.

In the case of this thesis, homophily and status mechanisms can explain the difference between social class origin and parental education. Findings in study II indicate that parental education is related to the types of positions individuals have access to. While respondents with highly educated parents have access to more upper-service-class positions, social class origin is related to both the type of position and the total extensity of contacts. This indicates that class has effects through the status mechanism while parents’ education only has effects through the homophily mechanism.10

3.5 Opportunity structure: Propinquity, foci and context

The first two mechanisms are related to individual attributes. Another type of mechanism is related to meeting opportunities, or the “supply side” of relationships. It has been noted that what looks like preferences for similarity might actually be the result of segregation in meeting opportunities (Feld, 1982; McPherson and Smith-Lovin, 1987). The general mechanism is that meeting someone greatly improves the chance of interacting with them and two sub-mechanisms can be distinguished. First, spatial distance—both physical distance and distances dependent on technology, such as travel time—inhibits contact and hence relationships. Wellman (1996) showed that relations, and in particular interactions, are geographically bounded. Even though online platforms have greatly changed the way people meet and interact (Ellison, Steinfield and Lampe, 2007), offline meetings (and thus offline distance) are important. Even in online networks, people tend to interact more with those who live nearby (Scellato et al., 2010).

Second, however, simply being in the same place is insufficient for explaining interaction. People are often close to each other because they perform the same activity such as work, play or just hanging out. According to Homans (1950), human interaction is facilitated by performance of activities together, and interaction implies a sentiment of affection. Based on this theory Feld (1981) developed his idea of the role of focused activity (foci) in providing interaction opportunities, and that such activity brings people to-

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10 The findings in study I are somewhat different as a result of a less optimal measure of parental education.
gether as a consequence of interaction within joint activities. Feld (1981) notes that the relation to an outer object is important for individuals relations to each other, and states that the process depends on the behaviors and interactions of others.

These two mechanisms can together be described by the concept context, referring to a macro unit including spatial closeness, focused activity or both. A context can consist of several focused activities and is thus a broader concept. Contexts differ in their participants and, accordingly, in their opportunity structure for interactions. From a social capital perspective, the most important aspect is whether participants possess valuable resources, which can be described as a context’s socioeconomic composition. The effect of school and neighborhood context on social capital is the topic of the second empirical study in this dissertation. Furthermore, national context is a special type of macro context and has an effect on both the usefulness of relations and how easy they are to maintain. The extent to which people have relations across borders is a topic developed in study I.

3.6 Interaction between macro and micro mechanisms

The preference (demand) – opportunity (supply) model suggests that the socioeconomic composition of people within a certain context structures the likelihood of meeting someone with certain characteristics, but that this choice is conditioned by individual preferences and resources. The effect of individual preferences is however mediated by how constraining the context is, where constraint refers to what extent the context enforces interaction. A less constraining focus implies uncertainty in interaction and more importance of preference mechanisms such as choice homophily. Previous research has supported this statement and indicates that between-classroom interaction tends to be more driven by homophily than within-classroom interaction (Leszczensky and Pink, 2015; Roman, 2016). Likewise, research on university campuses has found weak or non-existent effects on social networks for the low constraint of campus composition, but strong effects for higher constraint activities, such as sharing a dorm (Mayer and Puller, 2008; Stearns, Buchmann and Bonneau, 2009).
4. The use of social capital

4.1 Motivation for the use of social networks in economic action

So far, I have described how to explain inequality in access to social capital. In this part, I will discuss why people use their ties for transactions. I argue that there are two general types of motivations. In the first, the transaction through the network is a means to an end, such as reducing the risk of a negotiated exchange or finding information not available through other means. In the second, the transaction can be an end in itself, where gift giving is an example.

First, when the use of social networks in transactions is a means to another end, it is based on a more or less strategic choice that considers if network transactions are preferable to transacting with strangers. The method is typically a negotiated exchange were both partners agree upon the exchange at the same time and the benefits for both partners are easily observed (Molm, Collett and Schaefer, 2007). Social ties can make the cost of opportunistic behavior in transactions higher, which reduces the risk of fraud (DiMaggio and Louch, 1998), or has other positive functions like credit or delayed payment (Uzzi, 1997). Thus, economic relations might be gainfully embedded in social relations (Granovetter, 1985).

The second motive, in which the transaction is an end in itself, has been discussed in previous research aiming to answer the underlying question of why people engage in practices giving away time, energy or resources to others without getting anything immediately in return. For a naïve observer assuming a self-interested motivation, such behavior may seem self-harming. Although the biological literature has provided genetic explanations for altruism, genetic factors cannot explain differences between contexts in patterns of cooperation or defection. These explanations should be sought at the level of an evolution of cultures and social interactions (Fehr and Fischbacher, 2003).

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11 Altruism, defined as a self-sacrificing behavior for the good of others, might seem to have little place in a Darwinian “survival of the fittest” model, assuming a psychological egoism and a Hobbesian war of “all against all” (Kavka, 1983). Some have however maintained that altruism may have genetic explanations. Trivers (1971) suggests that altruism may be an evolutionary positive trait if it is reciprocated. Trivers argues that natural selection could operate against the non-altruist if the non-altruist is not given the same lifesaving treatment as the altruists are given, and thus the altruistic trait increases survival. An alternative natural selection argument is provided by Dawkins (2016) who suggest that altruistic behavior at the level of the individual in fact might be explained by selfish genes. That is, the genes an individual carries may benefit from altruistic behavior even if the individual does not, like when a mother sacrifices her life for her children.
A general explanation is that people do get something in return for their seemingly unselfish actions, either by feelings of gratification and approval (Homans, 1958), or through benefits from reciprocity. Scholars use the concept reciprocity to denote actions that have an expectation of returned favors, where the action is part of a larger social system benefiting the individual. Reciprocity is an often observed tendency of social relations (Fehr and Gächter, 2000), and one explanation for it is the norm that we owe others certain things because of a history of previous interactions with them (Gouldner, 1960). The interpretation of a normative system is also found among the early anthropologists that describe exchange as part of a normative institution, enforcing a moral obligation to give and receive gifts (Mauss, 2000 [1922]). Thus, this suggests that explanations of reciprocity need to go beyond the dyad to explain the fact that reciprocity often is based on a general system in which transactions are not necessarily returned by the same individual, but can be returned by someone else (Molm, Collett and Schaefer, 2007).12

Reciprocity theories have received support in empirical research. Experimental research shows that giving large gifts implies large gifts in return, which has been shown both in laboratory (Berg, Dickhaut and McCabe, 1995) and non-laboratory settings (Falk, 2007). It can be noted that reciprocity with strangers is low in these studies, and relationships might increase willingness to support.

4.2 Inequality in mobilization of resources

The previous section suggests that individuals differ in the social capital they have access to. In the social capital literature, it is common to distinguish between access to resources and mobilization of those resources (Lin, 2001; Smith, 2008). I prefer the term activation over mobilization since mobilization connotes a deliberate act of asking for resources. In many cases, the use of social capital includes someone else taking the initiative, for instance by providing information or job opportunities that the individual did not ask for.13

Activation of social capital depends on a number of factors. According to Smith (2005), there are factors on the level of the individual, the dyad, the network or the community. On the individual level, actors look at an individual’s reputation based on the assumption that past behavior is indicative of future behavior, but group belonging or status can also have an effect. A successful activation also depends on the position of the referral. Smith

12 An example is the Kula ring in Malinowski (1920).

13 Smith, Menon and Thompson (2012) use the term activation to refer to cognitive activation, but it is used more broadly here.
(2005) argues that an individual is at risk when referring applicants, putting one’s own reputation at stake, and notes that an individual with a better reputation or status might be more willing to take that risk. At the level of the dyad she thinks of factors such as tie strength and trust, which are based on a history of successful exchanges. Factors at the level of the network have mainly to do with network closure or other ways of assuring that potential exchange partners will honor obligations. These ideas are similar to Coleman’s (1988) argument of the benefits of a closed network as well as Granovetter’s (1985) view of embeddedness that facilitates trust and economic transactions. Finally, the main factor at the community level is the amount of general trust/distrust in the network as a whole (Smith, 2005).

Most of the mentioned factors describe different characteristics of the social structure, and there is a critique that the structural network paradigm does not give enough attention to individual agency (Gulati and Srivastava, 2014). A stream of research focuses on the role of individual traits in mobilizing social resources, investigating why people differ in their ability to form or mobilize networks. Explanations could be (1) differences in cognitive flexibility or style (Diószegi, 2016), (2) differences in motivation (Anderson, 2008) or (3) status. Smith, Menon and Thompson (2012) propose that high status individuals are more likely to be active in their networking in face of a threat while low status people are more likely to turn inward toward close ties. Oesch and von Ow (2017) have a somewhat similar result: workers rely more on family and friendship ties in job searches while upper-service class individuals rely more on previous work colleagues. However, their explanation does not rely on cognitive resources but differences in network structure. Furthermore, demand-side factors may explain differences in the use of social networks in the labor market. Manual sector firms tend to recruit more often through informal channels such as social networks, while white-collar or non-manual jobs more often use formal methods such as ads in newspapers to find their candidates (Marsden and Gorman, 2001). Thus, an analysis of network activation and formation needs to consider both structural and individual level factors.

4.3 Social capital, health and other benefits

This thesis focuses on outcomes of social capital in the housing and labor market, but there are also non-market outcomes. Services and gifts may result from activation of social capital (Bourdieu, 2011 [1986]), and examples are wide ranging such as neighbors helping each other, or borrowing each other’s tools (Wellman, 1992). Social capital has also been shown to be related to emotional and personal support (Van der Gaag, Snijders and Flap, 2008), what Lin (2001) labels expressive action. There are some studies finding social capital related to health (Ferlander, 2007; Song and Lin, 2009), and Ferlander (2007) argues that it is vital to distinguish between
different forms of social capital as their effect on health may vary. For instance, weak ties may mainly have an indirect effect on health through the opportunities they create, while strong ties and expressive support may have more direct effects. There is also a literature using the concept *social support* to study health outcomes and a positive relation between social support and health is generally accepted (Langford *et al.*, 1997; Heaney and Israel, 2008).

There is some evidence that access to social capital—measured as access to concrete resources through a social network—differs across countries. Rostila (2008) shows, with data from the Eurobarometer, that the proportion of citizens reporting that they receive no social support from networks in a variety of situations is much higher in southern Europe than in the Nordic countries, suggesting that the welfare state generosity is not “crowding out” social capital—a finding that is corroborated by van Oorschot and Arts (2005).

### 4.4 Returns to social capital in the labor market

There are several theoretical arguments for why and how networks and social capital can have effects in the labor market. Lin (2001) lists four relevant mechanisms: influence, information, social credentials, and confidence/self-esteem. These, as well as the evidence of effects of social capital in the labor market, are discussed in study III.

Literature has investigated whether weak or strong ties are most important in the labor market. Granovetter (1973) argued for weak ties because they provide more and better information, as an individual’s strong ties lead to a densely knit network of persons who know one another, while weak ties lead to another densely knit clump of social structure in which ego is not a part (Granovetter, 1983). The results in previous research are inconclusive however. Some studies find that weak ties lead to better jobs, but several studies suggest that there is no difference between strong and weak ties (Korpi, 2001; Marsden and Gorman, 2001; Bian, Huang and Zhang, 2015). Bian, Huang and Zhang (2015) show that strong and weak ties have effects through different kinds of mechanisms. Strong ties are more useful for influence or favoritism, while weak ties are better for information. Their results also show that both of these forms are related to better job matching, but only influence/favoritism is related to higher wages. There could also be a difference depending on occasion. Granovetter (1974) argues that strong ties are more supportive when someone is in great need of assistance, such as long term unemployment.

Lin (2001) argues that what matters the most is not the strength of the tie, but its position in a social structure. The resources accessed through strong or weak ties depends on ego’s position in the social structure; a lower position might mean that a weak tie is needed to reach someone high in the so-
cial structure (Lin and Dumin, 1986). Lin, Ensel and Vaughn (1981) note that:

if the distribution of job information and influence is not random, but is a part of the hierarchal structure of social resources, then the probability of an individual’s gaining access to job information and influence increases when he or she makes contact with positions higher up in the social structure. (p. 396)

Lin and Erickson (2008) did note however that different types of ties have different effects, meaning that contacts placed higher are not always better. Specifically, working class contacts might be more valuable for entry into the manual sector of the labor market (study III).

There is also a demand side to social capital as employers tend to use social networks in the hiring process. Fernandez, Castilla and Moore (2000) suggested that employers act as “social capitalists” by investing in, and gaining from, social networks. Social networks are used to expand the pool and quality of applicants, get better information, and recruit people that would fit into the team socially. Montgomery (1991) points to another function of networks by arguing that employers use their productive workers to recruit new workers based on the assumption that they will refer other productive workers. Thus, the demand-side mechanisms imply that individuals with resourceful networks will be more requested in the labor market, which is similar to what the supply-side mechanism suggests.

4.5 The context dependence of the use of social networks in the labor market

In addition to using social networks there are also other methods to find work. These can be classified into the general distinction formal and informal. Informal methods refer to methods such as asking friends and relatives. More formal methods of search include responding to ads, using state or private employment agencies and other types of organizations that provide job information such as unions or student organizations (Rees, 1966). Thus, formal methods can be said to be open to everyone, whereas informal methods are less regulated by rules and are more particularistic. Direct application constitutes a middle category, sometimes subsumed under informal methods and sometimes reported as a category of its own.

Both employers and employees use informal methods such as asking their social networks, indicating that there is both a demand-side and a supply-side component in how often networks are used in the labor market. A special feature of informal methods is that they include passive searches, in which someone informs an individual of a job or offers them one without having to ask (the jobs “fall into your lap” (Granovetter, 1995 [1974]: 145)).
Likewise, employers do not always have positions to fill, but sometimes create positions if the opportunity arises (Marsden and Gorman, 2001).

Most studies show that social networks are one of the most common methods used by individuals in their job search, as well as the most used method in successful job attainment (Marsden and Gorman, 2001). A few studies compare the role of social networks in the labor market across countries. Franzen and Hangartner (2006) show that there is substantial cross-country variation in the use of networks in the labor market. Respondents were asked how they first found out about their current job and results indicate that in Scandinavia networks are used the least (Sweden is not surveyed), while more common in South America and South East Asia, with the US in-between. In Finland, 26 percent of employed people found their job through networks, while 83 percent of people in the Philippines and 68 percent of people in Chile found their job through networks. The results for the US and Europe are largely corroborated by other studies comparing different data sources (De Graaf and Flap, 1988). To explain differences, De Graaf and Flap (1988) highlight the importance of labor market regulations such as job search requirements to obtain employment benefits. They also mention the school-to-work transition (e.g. in Germany the “Lehrstellen” system is responsible for many placements into first jobs), the required qualifications for job entry, average job turnover and the size of the labor market (De Graaf and Flap, 1988).

The importance of interpersonal social networks may also vary within a country over time. Behtoui (2008) presents results for Sweden based on a representative sample of employees that had been in their current jobs for one year or less. The study reports that informal methods became much more important during the 1990s, and suggests that it is related to the higher unemployment rate, and thus that the use of informal methods is related to the business cycle (see also Okeke, 2001).14

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14 Note that there are several methodological choices affecting the share of informally recruited. First, the question asked how the individual first got to know about the job, which limits the active mechanism to information while other mechanisms, such as influence, are not taken into consideration. Second, the friends and relatives category does not include all cases when employers used their social networks to find out about employees. Third, it matters whether the point of view is all individuals in the labor force or newly employed. The latter method is likely to estimate higher the use of informal channels, to the extent jobs transmitted through these channels are more short term.
5. Methodology

5.1 Access or mobilization of resources

Estimating the effects of social capital requires measurement of networks and their effects. A straightforward way to go about it is to study use of networks and equate the use of a good contact with social capital. There are, however, methodological and theoretical reasons to separate access to social capital from the activation and use of social capital. The first reason is to avoid circular reasoning implying that social capital only can be identified when it leads to certain effects (see part 2). The second is to avoid bias in estimation of the effect of social capital related to differences in the desire, possibility or necessity to use them. Some resources can only be mobilized when the actor itself possesses the necessary requirements, such as a certain education. Other resources only need to be mobilized in the event of a crisis, such as falling ill or becoming unemployed.

It is better to separate how much social capital the respondents have access to from its use. Measuring access to social capital should take into account (1) the number of alters in an individual’s social network, (2) the resources these alters give access to, and (3) the availability of these resources, which depend on the willingness to help (Flap, 2002). Ideally, the measurement of social capital should be based on an individual’s entire network and the resources of all network members. Some studies investigate the total network within limited settings such as schools or workplaces. This retrieves information about all relevant outgoing and incoming ties within a setting, but does not give information about the network outside the context. Furthermore, these networks are not representative of larger populations such as those of countries.

To estimate network characteristics of larger populations, researchers have relied on so-called ego-network data that extracts part of the individual network based on a soliciting question. An analytical problem is that most individuals have hundreds of people in their social network and the researcher needs a technique to sample from these contacts. The first established method is the name generator/interpreter which generates names based on a certain criterion (Fischer et al., 1977; Van Der Gaag and Snijders, 2005). The soliciting question is based on a property of the relationship such as its affective or normative content, or based on a certain exchange such as people who can “help around the house” or “you can pay social visits to” (McCallister and Fischer, 1978; Marsden, 1987; Van der Gaag, Snijders

15 Examples of school studies are the American Add Health and the European CILS4EU.
and Flap, 2008). Van Der Gaag and Snijders (2005) developed the latter criterion in an alternative method called the resource generator. They argue that the name generator/interpreter is not cost efficient as it collects redundant information from a social capital perspective. The resource generator is based on questions about access to a number of resources, each representing a concrete sub-collection of social capital, together covering several domains of life, but not querying about the names of helpers (Van Der Gaag and Snijders, 2005). A problem with the resource generator is that it specifies the relevant resources, which makes it context specific. Important resources vary depending on the situation and individual needs. Thus, it does not necessarily measure a general dimension of social capital.

The third alternative used to measure access to social capital is the position generator developed by Nan Lin and colleagues. It is based on the assumption that social resources are tied to positions in the social structure and that these can be accessed through contact with these positions (Lin and Dumin, 1986; Lin, 2001). In contrast to the name generator, it is in principle role and location neutral (Lin, Fu and Hsung, 2001), meaning that named alters can have any type of relation to ego of any strength. Compared to the resource generator, it measures a more general dimension of social capital that is not context specific.

The position generator is the preferred measure in this thesis for several reasons. First, the position generator is apt to get at socioeconomic context, because it measures socioeconomic components of the network. Second, it gets at the total volume of resources to some extent (at least better than the name generator). Third, it has proven to be related to labor market outcomes (Lin and Erickson, 2008). However, a disadvantage of the position generator is that it lacks detailed information about alters, and study II complements the position generator with an analysis of name generator alters. 16

5.2 The view of relations in measurement

A key question for both name generator and position generator measures is how to elicit meaningful relations that are relevant in terms of access to resources. There are three alternatives for how to measure ties. The first is based on affective content, defined as a subjective orientation or feeling. An example is a question asking for people who are “close to” the individual. The second class of items are based on normative content, understood as a specific cultural set of obligations, expectations and rights. Normative content can be friendship or family relations, and this type of question assumes that most people know what friendship means and can classify their relations

16 It is possible to include some information about alters. Moren Cross and Lin (2008) use a position generator with some sociodemographic information.
accordingly. The third type asks for exchanges between two people, such as core discussion networks investigating “with whom do you talk about personal matters?” A variation of this type of item is questions based on resources in networks, for instance asking about “people that can help around the house” (McCallister and Fischer, 1978).

McCallister and Fischer (1978) criticize approaches based on affective or normative content for being too subjective; they argue that respondents differ in their interpretation of categories such as “friend”, and what it means to be close to someone. An advantage with the questions based on normative content, however, is that the researcher can investigate certain domains of life such as friendship or kinship that might differ in interesting aspects.

5.3 The relations between positions and resources

The position generator builds on the assumption that there are private resources as well as resources tied to positions, and that positions differ both in the amount and type of resources they possess (Lin, 2001; Lin and Erickson, 2008). Thus, the analysis needs to take into account the different types of positions respondents have access to. For this purpose, the prestige or “status” of occupations could be used to summarize the resources that can be extracted (Van der Gaag, Snijders and Flap, 2008). It can be argued however that resources not only can be summarized in a single scale, but that there are multiple dimensions (Verhaeghe and Li, 2015). This thesis uses a particular strand of social capital operationalization based on social class of occupations to estimate their resources. Social-class-based measures of social capital have been used in several other studies and assume qualitative differences in the types of resources accessible from different class positions (Verhaeghe and Li, 2015). The measures are calculated by counting the number of positions that the respondent has access to in each class. Distinguishing between types of contacts is useful since previous research has shown that not all positions are “good” for all outcomes. Instead, they can have adverse or no effects depending on the context and outcome in question (Hällsten, Edling and Rydgren, 2015; Verhaeghe and Li, 2015). This thesis contributes to this discussion by showing how class-based measures capture different aspects of the social structure and their relation to different outcomes.

5.4 Validity and reliability of measuring social capital with the position generator

There are some evaluations of the position generator with regards to its usefulness, validity, reliability and likely sources of measurement error.

The position generator is relatively practical to administrate and does generally receive high response rates (Lin and Erickson, 2008).
The reliability of the measure seems fairly good. It has been shown to have high test/retest reliability in a 2-3 week interval (Webber, 2008). Another type of reliability test is to give two different but corresponding lists of occupations to respondents. With this method, Verhaeghe, Van de Putte and Roose (2013) found that the estimated social capital depends, to some extent, on the occupations included. The highest reliability is found for the number of accessed occupations, while it is considerably lower for variables that depend on single items such as the highest accessed prestige, which depends quite a lot on the particular items included. This suggests that results partly depend on the particular positions included. Thus, given that people tend to interact with similar others, researchers need to take into consideration factors such as covering the entire prestige scale of occupations as well as the gender distribution in occupations (Lin and Erickson, 2008). Furthermore, Van der Gaag, Snijders and Flap (2008) note that it could be biasing to only focus on occupations as some people may have a large network of not employed alters, which can be circumvented by asking for positions such as homemaker, student, retiree, or prisoner.

Van der Gaag, Appelhof and Webber (2012) perform an indirect test of the reliability and validity of the position generator in their evaluation of the underlying response process. They find that answering the position generator is a relatively demanding task involving a number of uncertainties. They show that most interviewees respond seriously about alters, but have problems in retrieving all alters and sometimes think of alters that no longer work in that position. In rare cases, respondents thought about the same individual for several occupations.

There are a few direct tests of the validity of the position generator. Fu (2008) compares position generator answers to a contact dairy of daily interactions over a three-month period. Findings show that the position generator identifies 20-40 percent more occupations compared to the contact diaries. The higher estimation of the position generator is expected given that it is not only supposed to measure people met recently.

A test of content validity is to examine if position generator measures have effects on expected outcomes. Van der Gaag, Snijders and Flap (2008) show that a higher estimate in position generator measure is correlated with a range of different concrete resources accessed through social networks and measured as items in the resource generator. However, their study suggests that the position generator is only weakly related to an expressive social support dimension, and that the name generator is a better measure for such resources.

There are also some sources of measurement error. First, the position generator is based on outgoing nominations, and it is not known if ties are reciprocated and to what extent alters are willing to help, which could introduce a bias. This type of measurement error may lead to an underestimation of social capital inequality given the status mechanisms described above.
Second, the position generator assumes that diverse occupational networks are better than homogenous ones as knowing more than one person in an occupation does not increase the measured social capital. This can however be motivated with the idea that a more diverse network gives access to more kinds resources and that there is a diminishing marginal return to knowing more people possessing the same kind of resource (Van Der Gaag and Snijders, 2005). This feature of the measure implies that it measures the respondents total network size imperfectly, which makes it difficult to separate the effect of having a large overall volume of social capital from having a more diverse network.

In total, I argue that the position generator is a great methodological innovation as it is a reliable and valid measure of social capital that gives a fairly good solution to the problem of sampling resources from an individual’s social network.

5.5 Endogeneity

There are several problems in estimating access to, as well as the effect of, social capital. The first is the problem of reverse causality or, more likely, reciprocal causality. Social capital is formed as a result of an opportunity structure, but getting the opportunity often hinges on already having a good network. Thus, there is a reciprocal causal relation that makes each step hard to identify. To address this, a few studies use models with lagged dependent variable design, where employment is the outcome, starting with a sample of unemployed (Sprengers, Tazelaar and Flap, 1988; Bonoli and Turtchi, 2015). The second problem has to do with mutually experienced events between ego and alters, such as good labor market conditions. This can be controlled for by including these in the analysis. The third problem is confounding individual factors. Mouw (2003) argues that a large part of the effect of social capital on labor market outcomes is a result of confounding variables related to a homophily in network formation and hence that ego and alters tend to be similar to each other. Such non-random relationship formation means that ego and alter share certain (unmeasured) characteristics and may refer to (1) general human capital, (2) a specific human capital related to labor market experience, (3) personality traits such as appearance, (4) a shared context, for instance a favourable labor market, (5) social skills.

While there are strategies to address these omitted variable problems in empirical research such as introducing relevant control variables, measuring all other relevant personality traits is difficult and it may be better with an experimental design (c.f. Mouw, 2006). A fixed effects model also solve some omitted variable problems given an assumption that most characteristics are time constant while social capital is not, but one preferably needs more than two waves of panel data to avoid reverse causality interpretation.
Addressing the fifth factor, social skills, is more complicated since it is conceptually close to social capital. The question is whether social capital variables measure the resources in networks or the social skills required to build such networks. With social skills, I refer to the ability to make others feel comfortable, appreciated or joyful, and to handle social situations with a sense of tact. Social skills might explain both network formation and access to social capital, as well as labor market effects if social skills are valued by employers.17 The first question to be discussed is to what extent such social skills actually are a part of social capital. That is, should the pure effect of social capital be identified as an exogenous change in social networks, or does it include the skill to build and mobilize networks? Second, the training of this skill might itself be a factor of the environment, implying that variables that I have investigated, such as social class background, might apply to them too (c.f. Jackson, Goldthorpe and Mills, 2005). There has been surprisingly little research investigating the relation between social skills and social capital. An exception is Flap and Boxman (2001) who test for social skills and do not find any significant effect on job searches.18

I would argue that social skills are a part of social capital but it would be surprising if this accounted for all inequality in social capital. Indeed, papers I and II in this thesis show that social capital is affected by social structure, family background and context and geographic mobility. Nevertheless, it is an interesting and difficult task for further research to disentangle the role of social skills from the external network part of social capital.

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17 Another similar concept is social intelligence defined as “the ability to understand and manage people” (Thorndike and Stein, 1937: 275). Salovey and Mayer (1990) describe emotional intelligence as a subset of social intelligence and define it as “The ability to monitor one’s own and others’ feelings and emotions, to discriminate among them and to use this information to guide one’s thinking and actions” (Salovey and Mayer, 1990: 189).

18 However, they do not describe how they measure the variable.
6. Data

6.1 The survey

The data used in the present dissertation come from a Swedish survey titled “Social Capital and Labor Market Integration” designed by Jens Rydgren and Christofer Edling as part of the LIFEINCON project. The studied population includes individuals born in 1990 living in Sweden with three different background characteristics. The sampling frame was people found in the Swedish register of the total population in July 2009. A gross sample based on three different sub-samples was selected: first, all individuals with at least one parent born in Iran, second, a random sample of 50 percent of all individuals with at least one parent born in former Yugoslavia and, third, a simple random sample of 2,500 individuals with two Swedish-born parents. Interviews for the first survey were conducted between October 2009 and January 2010 and for the second between January and March 2013. This gross survey sample consists of 5,836 individuals selected for telephone interview. From this gross sample, 2,942 interviews were conducted in Wave 1 and 2,244 in Wave 2, which gives a response rate of 51.6 percent in Wave 1 and 39.7 in Wave 2. The number of individuals participating in both waves was 1,577, which means that 28 percent of the gross sample answered both waves.\textsuperscript{19} Note that the gross sample is the same over the two waves and that it was possible to be interviewed in the second wave without having answered in the first.

\textsuperscript{19} Excluding over-coverage.
6.2 The position generator in this survey

The position generator used in this thesis contains 40 positions, which are regarded to be important in the Swedish occupational structure. There are 39 occupations plus the position of university student (table 1). The eliciting question in both waves of the survey is:

I will now read a list of occupations and ask you to state whether you have a close friend, acquaintance, family member, girlfriend/boyfriend, or relative in that occupation [my translation].

(1a) Doctor?
(1b) Is it a close friend, acquaintance, family member, girlfriend/boyfriend, or relative? (Wave 1 version)
(1b) Does this or these person(s) live in Sweden or aboard (or both)? (Wave 2 version)
(2a) …

This question is based on normative content, where there is an underlying assumption of cultural norms about what these relations mean, such as a certain level of intimacy or expectation of reciprocity.

Table 1 shows the social class of each position according to the Swedish SEI (SCB, 1982), which closely resembles the EGP (Erikson, Goldthorpe and Portocarero, 1979). To assess the personal resources that occupants of each position might have, data from Swedish administrative registers is used to compute the average education and total wealth of the occupants of each occupation. Data was gathered from the occupational, educational and tax registers from 2007 and 2009 (SCB, 2011 ; 2016). Total wealth is calculated as a sum of housing and other assets, and average years of education is based on number of years each education is assumed to take. This shows that occupants of positions indeed differ in their average access to resources. Working class occupations are clustered around having low average education and wealth, while there is a considerable spread among service class occupations in the amount of resources occupants tend to possess. Occupants of some sociocultural occupations have a higher amount of education in relation to their economic capital, and occupants of some positions like financial manager have considerable average wealth in relation to their education (c.f. Bourdieu, 1984 ; Flap and Völker, 2008).
Table 1 – Respondents’ access to positions and average characteristics of people inhabiting those positions

<table>
<thead>
<tr>
<th>Position</th>
<th>Average Access in %</th>
<th>Working class</th>
<th>Upper service class</th>
<th>Years of education</th>
<th>Wealth (M-Kr)</th>
<th>Wave 1</th>
<th>Wave 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>Disabled’s assistant</td>
<td>X</td>
<td>11.2</td>
<td>0.4</td>
<td>54.9</td>
<td>65.4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cleaner</td>
<td>X</td>
<td>10.3</td>
<td>0.3</td>
<td>38.4</td>
<td>39.8</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Server</td>
<td>X</td>
<td>11.7</td>
<td>0.4</td>
<td>64.3</td>
<td>66.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Child care assistant</td>
<td>X</td>
<td>11.4</td>
<td>0.6</td>
<td>34.8</td>
<td>45.4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Caretaker/janitor/attendant</td>
<td>X</td>
<td>10.7</td>
<td>0.8</td>
<td>26.1</td>
<td>30.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Construction worker</td>
<td>X</td>
<td>10.5</td>
<td>0.6</td>
<td>59.7</td>
<td>60.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Factory worker</td>
<td>X</td>
<td>10.7</td>
<td>0.5</td>
<td>49.8</td>
<td>60.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Security guard</td>
<td>X</td>
<td>11.8</td>
<td>0.5</td>
<td>32.2</td>
<td>45.2</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Warehouseman</td>
<td>X</td>
<td>11.1</td>
<td>0.5</td>
<td>48.1</td>
<td>62.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cook</td>
<td>X</td>
<td>11.1</td>
<td>0.6</td>
<td>52.4</td>
<td>55.2</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Taxi driver</td>
<td>X</td>
<td>10.7</td>
<td>0.7</td>
<td>29.3</td>
<td>31.2</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hairdresser</td>
<td>X</td>
<td>11.8</td>
<td>0.6</td>
<td>60.6</td>
<td>60.8</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Telemarketer</td>
<td>X</td>
<td>11.8</td>
<td>0.4</td>
<td>55.6</td>
<td>46.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mail carrier</td>
<td>X</td>
<td>11.7</td>
<td>0.6</td>
<td>30.7</td>
<td>31.6</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Truck driver</td>
<td>X</td>
<td>10.8</td>
<td>0.6</td>
<td>46.8</td>
<td>48.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cashier</td>
<td>X</td>
<td>11.8</td>
<td>0.5</td>
<td>67.8</td>
<td>73.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Receptionist</td>
<td>X</td>
<td>11.8</td>
<td>0.7</td>
<td>25.9</td>
<td>39.6</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nursing assistant</td>
<td>X</td>
<td>11.4</td>
<td>0.6</td>
<td>58.7</td>
<td>68.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mechanic</td>
<td>X</td>
<td>11.1</td>
<td>0.7</td>
<td>52.9</td>
<td>53.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nurse</td>
<td></td>
<td>14.8</td>
<td>0.9</td>
<td>43.5</td>
<td>59.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Professional musician</td>
<td></td>
<td>14.3</td>
<td>1.2</td>
<td>26.8</td>
<td>28.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Police officer</td>
<td></td>
<td>14.0</td>
<td>1.2</td>
<td>33.2</td>
<td>31.4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Self-employed with staff</td>
<td></td>
<td>11.6</td>
<td>1.0</td>
<td>62.7</td>
<td>63.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bank clerk</td>
<td></td>
<td>13.0</td>
<td>1.6</td>
<td>25.4</td>
<td>35.2</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Estate agent</td>
<td></td>
<td>13.1</td>
<td>1.5</td>
<td>13.9</td>
<td>24.6</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Recreation leader</td>
<td></td>
<td>12.6</td>
<td>0.6</td>
<td>32.3</td>
<td>38.4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer programmer</td>
<td>X</td>
<td>14.1</td>
<td>1.5</td>
<td>32.5</td>
<td>42.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer technician</td>
<td></td>
<td>12.5</td>
<td>1.0</td>
<td>45.8</td>
<td>53.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>University student</td>
<td></td>
<td>87.1</td>
<td>92.4</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Teacher</td>
<td></td>
<td>15.1</td>
<td>1.1</td>
<td>56.3</td>
<td>60.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Professional actor</td>
<td></td>
<td>14.1</td>
<td>1.4</td>
<td>8.6</td>
<td>9.3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reporter</td>
<td></td>
<td>13.8</td>
<td>1.4</td>
<td>20.7</td>
<td>24.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Financial manager</td>
<td>X</td>
<td>14.2</td>
<td>2.3</td>
<td>16.5</td>
<td>19.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Headmaster</td>
<td>X</td>
<td>15.0</td>
<td>1.6</td>
<td>17.5</td>
<td>16.5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Accountant</td>
<td>X</td>
<td>14.3</td>
<td>1.7</td>
<td>14.6</td>
<td>22.4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Researcher</td>
<td>X</td>
<td>17.0</td>
<td>1.4</td>
<td>20.2</td>
<td>26.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Engineer</td>
<td>X</td>
<td>14.2</td>
<td>1.5</td>
<td>41.2</td>
<td>52.8</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dentist</td>
<td>X</td>
<td>17.1</td>
<td>1.7</td>
<td>27.7</td>
<td>28.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lawyer</td>
<td>X</td>
<td>16.0</td>
<td>2.8</td>
<td>21.0</td>
<td>23.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Physician</td>
<td>X</td>
<td>17.3</td>
<td>2.1</td>
<td>39.4</td>
<td>41.6</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note: The table shows access to the positions in the position generator as well as the social class of these positions. The table also shows average years of education and wealth for each occupation calculated for 4 digit occupational codes (SSYK) and based on register data of the entire working population. Income is displayed in thousand crowns (kr) and wealth in millions of crowns.
6.3 A network map of the correlations

Another way to study positions is in terms of their social distance to each other (similar to the “social distance approach” (Bottero and Prandy, 2003)). A method to do this is to use the items measuring respondents’ access to positions and examine how access to each position correlates with access to others. This measures the indirect relations between positions via the respondent. Figure 2 visualizes the correlation matrix as a network graph that marks correlations above 0.15 with a link. Node colors denote social class, while size and number indicate placement on the prestige scale (Treiman, 1977). The resultant network describes social structure from the respondents’ point of view.

The mechanisms described in section 3 above explain this network well. Most positions are connected to others close in prestige, which results in middle class occupations bridging high and low prestige occupations. Further, there is evidence of interaction through focused activity, with a school cluster (teacher, headmaster recreation leader), a hospital cluster (physician, nurse, assistant nurse), and a banking cluster (bank clerk, accountant, financial manager). Also, there is considerable clustering among the upper-service-class occupations, while there are surprisingly few correlations above the threshold between lower-service-class positions (knowing one does not necessarily mean knowing another). However, note that this analysis is based on Wave 1 of the survey, where social structure is seen from the eyes of a nineteen year old, which may distort the picture. For instance, the divide between working class and service class occupations could be enhanced because the former are held by same-age friends, while the latter are held by weak ties (analysis not shown).

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20 Bottero and Prandy (2003) think of structure as a social space where social distances are determined by interaction and cultural similarity. That is, structure is not determined a priori, but is a result of social distances measured by social interaction. Their main aim is to measure social stratification in a society by social interaction. This approach has made empirical contributions to patterns of associations and the construction of the Cambridge scale (Prandy, 1990).
Figure 2 – A network based on correlation matrix of access to positions

Note: Based on correlation of access to positions of respondents in Wave 1. Black = Upper service class, Dark gray = Lower service class, Light Gray = Routine-non manual, White = Working class.
6.4 Non-response bias

The dissertation is based on a survey with a response rate between 28 and 50 percent, depending on the waves and samples used. Non-response implies a risk of selection on certain variables, which can bias the analysis. In this case, there are two stages of selection, first into the survey and then into the panel, as this requires answering both waves. For the first stage of selection, Statistics Sweden analyzed whether the respondents were representative of the population defined by the administrative register. They compared a number of variables and concluded that non-respondents are more likely to have an immigration background, less educated parents, live in a large city and have lower grades compared to respondents (SCB, 2010).

The key variables here—the social capital variables—are however only measured in the survey and cannot be compared with register data. A method to get a sense of the effects of non-response is to compare respondents depending on how many and which waves they answered, given the assumption that those who only answer one time are more similar to non-respondents. Thus, one-time respondents should have values in between non-respondents and the panel sample. We see in table 2 that this assumption is confirmed: there are differences between the non-panel and panel sample that are in line with those between the non-respondents and respondents. Respondents in the panel sample have higher grades, more highly educated parents, infrequently live in large cities and parents more likely born in Sweden compared to the non-panel sample. Most of these effects are similar across the two waves but there is an interesting exception. People with parents born in Iran are overrepresented among those who only answered the second wave. This is likely because this group contains some recent immigrants that had not had the time to learn Swedish in order to answer the first wave. Turning to social capital, we see that people with higher social capital are overrepresented in the panel sample, suggesting that respondents have more social capital than non-respondents.
Table 2 – Description of variable means in the different samples

<table>
<thead>
<tr>
<th></th>
<th>Wave 1 Non-panel sample</th>
<th>Wave 1 Panel sample</th>
<th>Wave 2 Non-panel sample</th>
<th>Wave 2 Panel sample</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Labor market</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Neet*</td>
<td>0.23</td>
<td>0.19</td>
<td>0.18</td>
<td>0.10</td>
</tr>
<tr>
<td><strong>Educational variables</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>GPA</td>
<td>197.70</td>
<td>216.56</td>
<td>197.82</td>
<td>216.58</td>
</tr>
<tr>
<td>Highly educated parents</td>
<td>0.23</td>
<td>0.27</td>
<td>0.24</td>
<td>0.27</td>
</tr>
<tr>
<td><strong>Parents country of birth</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yugoslavia</td>
<td>0.35</td>
<td>0.28</td>
<td>0.34</td>
<td>0.28</td>
</tr>
<tr>
<td>Iran</td>
<td>0.22</td>
<td>0.21</td>
<td>0.27</td>
<td>0.21</td>
</tr>
<tr>
<td>Sweden</td>
<td>0.42</td>
<td>0.51</td>
<td>0.39</td>
<td>0.51</td>
</tr>
<tr>
<td><strong>Place of residence 2008</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Large city region</td>
<td>0.33</td>
<td>0.30</td>
<td>0.36</td>
<td>0.31</td>
</tr>
<tr>
<td><strong>Social capital</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total number of contacts (Extensity)</td>
<td>14.97</td>
<td>15.74</td>
<td>17.53</td>
<td>17.99</td>
</tr>
<tr>
<td>Upper service class contacts</td>
<td>2.34</td>
<td>2.58</td>
<td>2.88</td>
<td>3.09</td>
</tr>
<tr>
<td>Lower service class contacts</td>
<td>2.61</td>
<td>2.80</td>
<td>3.32</td>
<td>3.39</td>
</tr>
<tr>
<td>Working class contacts</td>
<td>8.56</td>
<td>8.87</td>
<td>9.79</td>
<td>9.94</td>
</tr>
<tr>
<td>Self-employed</td>
<td>0.61</td>
<td>0.63</td>
<td>0.65</td>
<td>0.63</td>
</tr>
</tbody>
</table>

Note: * Not in Education, Employment or Training

Table 3 replicates the tables in study I investigating what background factors affect social capital, but differs between non-panel and panel respondents and thus tries to see if results can be related to non-response. We see that estimations of social capital inequalities are somewhat different between the panel and non-panel respondents, and a few differences seem to be consistent across the two waves. The coefficients for the second Iranian cohort are higher in models using the panel-sample in the second wave, which could be expected given the arguments about higher selection based on language proficiency in the panel sample. The most consistent, and unexpected, difference however is that the social capital of respondents with working class and routine non-manual background is estimated higher in the non-panel sample, which applies both to working class and service class contacts in both waves. This suggests that the analysis using the panel sample slightly overestimates social capital inequality. That is, the social capital difference between working and service class is overestimated compared to the population.

The strategy used in this thesis to handle selection as a result of non-response is to include the factors that might cause selection in the models which should decrease their biased effects according to Winship and Radbill (1994). This strategy is only applicable, however, to observed factors and not if the bias is in the dependent variable.
Table 3 - Access to social capital in Sweden and abroad by socioeconomic and immigration background - by number of responses and wave

<table>
<thead>
<tr>
<th>Parents' immigration cohort</th>
<th>Extensity of upper service class contacts</th>
<th>Extensity of working class contacts</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Wave 1 Non-Panel-sample</td>
<td>Wave 1 Panel-sample</td>
</tr>
<tr>
<td></td>
<td>Wave 2 Non-Panel-sample</td>
<td>Wave 2 Panel-sample</td>
</tr>
<tr>
<td></td>
<td>Wave 1 Non-Panel-sample</td>
<td>Wave 1 Panel-sample</td>
</tr>
<tr>
<td></td>
<td>Wave 2 Non-Panel-sample</td>
<td>Wave 2 Panel-sample</td>
</tr>
<tr>
<td>Yugoslavian, pre-1990</td>
<td>0.0818</td>
<td>-0.0377</td>
</tr>
<tr>
<td></td>
<td>0.1910</td>
<td>0.2535*</td>
</tr>
<tr>
<td>Yugoslavian, post-1989</td>
<td>0.4301**</td>
<td>0.5127***</td>
</tr>
<tr>
<td></td>
<td>0.5532*</td>
<td>0.4713*</td>
</tr>
<tr>
<td>Iranian, pre-1990</td>
<td>0.5415**</td>
<td>0.5131**</td>
</tr>
<tr>
<td></td>
<td>1.5375***</td>
<td>0.7924*</td>
</tr>
<tr>
<td>Iranian, post-1989</td>
<td>0.9473**</td>
<td>0.7924*</td>
</tr>
<tr>
<td></td>
<td>0.6361</td>
<td>0.6572*</td>
</tr>
<tr>
<td>Parents' class (Ref=Working class)</td>
<td>Routine non-manual</td>
<td>0.1910</td>
</tr>
<tr>
<td></td>
<td>0.7056*</td>
<td>0.1073</td>
</tr>
<tr>
<td></td>
<td>0.7754**</td>
<td>0.7020***</td>
</tr>
<tr>
<td>Self-Employed</td>
<td>0.3757***</td>
<td>0.0432</td>
</tr>
<tr>
<td></td>
<td>0.4860***</td>
<td>0.8909***</td>
</tr>
<tr>
<td>Lower Service class</td>
<td>1.1127***</td>
<td>0.1215***</td>
</tr>
<tr>
<td></td>
<td>0.2947</td>
<td>0.2174</td>
</tr>
<tr>
<td>Upper Service class</td>
<td>0.3757***</td>
<td>0.0432</td>
</tr>
<tr>
<td></td>
<td>1.1127***</td>
<td>0.1215***</td>
</tr>
<tr>
<td>Not in the labor market</td>
<td>0.0879</td>
<td>0.0310</td>
</tr>
<tr>
<td></td>
<td>0.1287</td>
<td>0.0310</td>
</tr>
<tr>
<td>Parents' education (Ref=No university education)</td>
<td>Higher education only in Sweden</td>
<td>0.6375***</td>
</tr>
<tr>
<td></td>
<td>0.5415**</td>
<td>0.5127***</td>
</tr>
<tr>
<td></td>
<td>0.5140***</td>
<td>0.5140***</td>
</tr>
<tr>
<td>Higher education only abroad</td>
<td>0.8822***</td>
<td>0.5842***</td>
</tr>
<tr>
<td></td>
<td>0.8326*</td>
<td>0.8326*</td>
</tr>
<tr>
<td>Higher education both in Sweden and abroad</td>
<td>1.0766***</td>
<td>1.1869***</td>
</tr>
<tr>
<td></td>
<td>1.1383***</td>
<td>1.1383***</td>
</tr>
<tr>
<td>Gender</td>
<td>Woman</td>
<td>-0.0279</td>
</tr>
<tr>
<td></td>
<td>0.1287</td>
<td>0.0310</td>
</tr>
<tr>
<td>Control for place of residence</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Constant</td>
<td>1.4152***</td>
<td>1.2997***</td>
</tr>
<tr>
<td></td>
<td>7.7881***</td>
<td>7.7498***</td>
</tr>
<tr>
<td>Observations</td>
<td>1.317</td>
<td>1.561</td>
</tr>
<tr>
<td></td>
<td>1.317</td>
<td>1.561</td>
</tr>
<tr>
<td>R-squared</td>
<td>0.1883</td>
<td>0.1701</td>
</tr>
<tr>
<td></td>
<td>0.0391</td>
<td>0.0278</td>
</tr>
</tbody>
</table>

Note: Standard errors in parentheses. *** p<0.001, ** p<0.01, * p<0.05, ^ p<0.10
7. Overview of the studies

Study I: The intersection of class origin and immigration background in structuring social capital: The role of transnational ties (Together with Christofer Edling and Jens Rydgren)

This paper explores how access to social capital among young adults is structured by their parents’ social class trajectories and migration. A survey is used that allows distinction between children of immigrants from three immigration groups that generally differ in their class compositions and motivation for migration: first, a cohort of labor migrants from former Yugoslavia, second, refugees that migrated after the Yugoslavian wars, and third, refugees from Iran that often belonged to the cultural or political elite. The results show that an advantaged class background is associated with higher access to social capital. Children of immigrants have access to more contacts, and differences in the average socioeconomic standings of the different groups within Sweden contribute to the understanding of the inequalities, but the results also show that access to social capital of children of immigrants should take into account parents’ class mobility and social ties to people residing abroad. A distinction between national and transnational ties shows only small differences between immigrants and natives in Sweden, but larger differences including transnational ties. This suggests that studies of the immigrant population need to take both national and transnational ties into account to understand inequality in social capital.

Study II: Socioeconomic Segregation and Access to Social Capital: The effect of schools and neighborhoods on the social capital of young adults

Neighborhood and school are often shown to affect life chances and the outcomes are sometimes explained with social networks, but seldom tested. This paper investigates how schools and neighborhoods structure the social capital of young adults. Two waves of panel data are used to study a sample of young adults in Sweden. Social capital is defined as access to resources through a social network and measured by the number of the five closest friends in higher education and employment, as well as the extensity and class composition of the occupational positions respondents have access to. The result demonstrates that close friends very often share school context and somewhat less often neighborhood context, and that the socioeconomic composition of both upper secondary schools and neighborhoods structures an individual’s access to social capital. In addition, variation between the two waves in the neighborhood context composition is shown to lead to change in the socioeconomic composition of the network. Results indicate a substantial persistence of context effects over time. School friendships formed during adolescence continue to be important into early adulthood,
and the effect of context composition is maintained over time. Thus, it is concluded that the “growing up context” matters for social capital in early adulthood, which implies that social networks can be a mediator explaining possible effects of schools and neighborhoods on life chances.

Study III: You can do it: The effect of social capital on self-efficacy, information, and job search in the process of labor market entry

Social capital has shown to be related to labor market outcomes, with many ways for contacts to affect these outcomes. The paper asks through what pathways social capital affects labor market outcomes and analyzes effects on intermediate variables such as number of job tips, job search methods and labor market self-efficacy. The social-class-based measures of social capital are used to show that different kinds of contacts are associated with different outcomes. Upper-service-class contacts are positively related to university education while working class contacts are positively related to employment. Results also show that more social capital is associated with more job tips and higher labor market self-efficacy. Furthermore, individuals with higher social capital tend to use informal methods for job searches more often, while those with lower social capital tend to rely on formal methods, job centers in particular. The study tests if immigrants have trouble mobilizing their social capital, but does not find convincing evidence of mobilization difficulties. The study concludes that the labor market effects of access to social capital may include both network pathways, such as information, and individual pathways, such as better self-efficacy.

Study IV: Nest leaving and social capital: channels, housing tenures and resources

Housing shortage can make it difficult for young adults to move away from their parents. This paper investigates nest leaving and to understand resources and channels young adults use to move away from parents, with focus on the role of social capital and informal channels. The study uses a survey of young adults in Sweden that oversampled children of immigrants and measures social capital with the position generator. Results show that both economic and social capital have positive effects on nest leaving. While social capital is linked to the use of contacts and informal, “secondhand”, rental agreements, often transmitted via contacts, economic capital is connected to formal housing tenure. The study also indicates that immigrants are more likely to live with their parents, and discusses discrimination as well as social capital shortage as possible explanations. The paper concludes that access to both economic and social capital make it more likely to move away from parents, but that they operate through distinct channels and lead to different housing tenures.
8. Conclusion and normative discussions

The four empirical papers investigate inequality in social capital based on family background and socioeconomic segregation, and show how social capital has effects on the labor and housing markets. The results suggest that some factors of social capital are beyond individual control. Furthermore, the results of papers III and IV suggest that social capital has positive effects on the labor market. In this concluding discussion, I ask four questions. Can the importance of social capital in allocation of valuable goods and positions be affected? Should it? Does social capital amplify inequality in other dimensions? How can a more equal distribution of social capital be achieved?

8.1 Can the role of social capital in allocation of valuable goods be affected?

A hypothesis about the usefulness of social capital is that it depends on the extent to which transaction tend to be informal. There is some support for this informality hypothesis in study IV that shows that social capital is more useful for informal agreements. The results for study III are less clear about this matter; although results show that people with higher social capital preferred informal methods in job searches, it did not test the usefulness of social capital for different modes of job attainment. Comparisons across countries do suggest that countries with higher formalization in terms of labor market regulations have a lower share of use of contacts (De Graaf and Flap, 1988; Franzen and Hangartner, 2006), but no studies exist on whether this means that the usefulness of social capital also differs across countries.

In addition to social networks, two allocation mechanisms have been discussed in previous research: markets and organizations (Aspers, 2011). Organizations are based on bureaucracy and Weber (1968 [1922]: ch 3) states that the consequence of bureaucracy is a formalistic spirit, devoid of personality, without anger or passion, and hence without love or enthusiasm, and that a bureaucratic system, in principle, should treat everyone equally (Swedberg and Agevall, 2005). Likewise, exchanges in the open market are supposed to reflect purely monetary values. Thus, at least in principle, the formal market and bureaucracy treat everyone based on impersonal characteristics or resources such as merit, monetary exchange value, or entitled rights (Weber, 1968 [1922]; Granovetter, 1995 [1974]). This suggests that formalization of previously informal processes by regulation according to non-personal rules is a counterforce to informal practices and will limit the usefulness of social capital. In some cases, nation states try to counteract informality by making activation of social capital illegal. Helping friends and relatives from a power position within a bureaucracy can be considered
corruption, and doing a major service for a neighbor could be seen as tax fraud.

Thus, this discussion suggests that increased formalization will decrease the scope for social capital. In the housing market, study IV suggests that there are at least two different formal alternatives. Both the public housing list and formal market principles reduce the role of social capital. Regarding the labor market, study III shows that the job center is an employment service that is used more often by people with low social capital. Labor market policies that help those without a network to get a job, such as job centers, can likely reduce the importance of social capital. In addition, policies that organize and formalize the school-to-work transition are likely to reduce the role of social capital in labor market entrance (Granovetter, 1985; De Graaf and Flap, 1988).

8.2 Is the use of social capital at odds with a meritocratic society?

This thesis shows that social capital has effects on labor market and housing outcomes in a modern society. Use of social capital can be said to represent a sphere of personal favors in which already established relations make the difference. There is a tension between commonly held ideals about universalistic and meritocratic principles and such particularistic informal practices. But is it certain that it is desirable to reduce the role of social capital? The idea of meritocracy can be reconciled with the importance of social networks by pointing out that networking is an effort also, and should be rewarded. In fact, Steijn (2016) shows in a study conducted in the Netherlands that if you ask people what factors they think should matter for economic success, they rate “social skills” higher than education, and they also perceive it as a very important factor for economic success. Thus, social skills are perceived as “merit”.

The findings in papers I and II provide a counterargument by showing that social capital is partly the result of factors outside individual control. On the other hand, it could be argued that most social capital is not independent of individual achievement, and that the part resulting from segregation and family connections is either small or unimportant. This thesis cannot fully resolve the issue of comparing what part of the variance in social capital results from different sources, or what parts are most important for outcomes; further research is needed on these issues.
8.3 Does the use of social ties amplify inequality based on class and immigration background?

In this thesis, I show that social capital is important for life chances, and that its distribution depends partly on background factors such as social class origin and immigration background.

One of the contributions of this is to explain intergenerational transmission of advantage based on class origin. This does however not mean that the intergenerational effects related to class origin is higher in a society with more importance of social capital compared to a more formalized society. Given an inter-generational transmission of economic capital and intergenerational reproduction in the educational system (Breen and Jonsson, 2005), it is a question for further research whether the usefulness of social capital reduces or increases inequality based on class origin.

Regarding immigration background or ethnicity, it should be emphasized that the answer also depends on the particular group and context. Results in previous research suggest that social capital inequality varies with the labor market standing of the group. In studies sampling from the adult population, there seems to be relatively extensive support for that immigrants or ethnic minorities that are disadvantaged in the labor market also have a shortage of social capital (Behtoui, 2007; Li, Savage and Warde, 2008; Moren Cross and Lin, 2008; Bonoli and Turschi, 2015; van Tubergen and Volker, 2015; Chua, Mathews and Loh, 2016). Studies of young adults have however found mixed evidence regarding if children of immigrants experience social capital disadvantages. Some even find an advantage of children of immigrants compared to natives controlling for class background (Study I; Lannoo et al., 2012; Verhaeghe, Li and Van de Putte, 2013; Behtoui, 2015; Verhaeghe, Van der Bracht and Van de Putte, 2015).

It is possible that social capital could work as a compensatory factor that lets immigrants do better than they would in processes without referrals (Bonoli and Turschi, 2015). Such results have been suggested in the “ethnic enclaves” literature arguing that these geographically bounded communities support employment of co-ethnics (Edin, Fredriksson and Aslund, 2003; Portes and Manning, 2005). Furthermore, research has shown impersonal discrimination in many audit studies and seems to be quite strong even for candidates who are otherwise equal (Riach and Rich, 2002; Bursell, 2007; Ahmed and Hammarstedt, 2008). It seems reasonable that statistical discrimination is stronger when there is no personal tie to convey information about the applicants (Mouw, 2002), and it could be argued that inequality in social capital needs to be quite strong to be more important than discrimination of strangers. Nevertheless, inequality in social capital is an important complementary explanation to discrimination that can account for ethnic labor market inequalities.
In addition to social class origin and immigration background, there might be other aspects of family background that have effects on an individual’s social capital. In particular, parents’ social capital itself could have effects on their children’s social capital. Unfortunately, there are to date no studies of intergenerational reproduction of social capital, which is an area for further research.

8.4 Reducing social capital inequality

Given that social capital has an effect on outcomes it is important to ask how access to social capital can be equalized. Access to social capital is shown in this thesis to depend on the distribution of individual resources and opportunity structures. First of all, policies such as reducing educational and income inequality might reduce social distance and increase intergroup interaction. Regarding opportunity structure, decreased socioeconomic segregation may be a way to reduce inequality in social capital. It is perhaps most straightforward to change school segregation since distribution of pupils is determined by government policy.

Furthermore, the most important factor for social capital might be to participate in focused activity such as work or associations. The labor market has a key role and the results in papers I, II and III show that having parents with no labor market connection is associated with a major social capital disadvantage. Thus, employment policies may support social capital creation to the benefit of individuals and their children. Similarly, policies to promote equal access to associational life and sports activities could also equalize access to social capital.

However, it should be noted that relatively little research exists to support the hypothesis that changes in the formal social structure suggested here gives a change in social capital distribution. More research with cross-country, over-time, and experimental designs are needed.

In sum, there are already policies in place that work to counterbalance social capital inequality, even if they often are not framed as such. This dissertation has not come up with new policy suggestions, but has illuminated the effects of different policies on the distribution and outcomes of social capital. This knowledge will hopefully make policymakers and street-level bureaucrats more aware of the types of problems they face and lead to better policies to address them.
8.5 Conclusion

This thesis investigates the role of social capital in the process of establishing oneself as an adult with a job and an independent home. The results demonstrate that social capital indeed has an effect on the housing and labor markets, and that those who have this resource have more opportunities to establish themselves in both, enabling the transition to adulthood. Results have also shown that social capital is unequally distributed and this can be attributed partly to socioeconomic segregation and family background. This raises normative questions about fairness and to what extent social capital is at odds with a meritocratic society. This chapter also has suggested that it is possible to use policy to counteract social capital inequality. In conclusion, the thesis shows that social capital is a vital part of the social structure linked to, but also independent of, classic dimensions of stratification, such as immigration and social class. The thesis has also shown the effect on outcomes, suggesting that social capital is important to take account for everyone that wants to understand who gets ahead, or life chances in general.
9. Bibliography


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