Network Restructuring and Firm Creation in East-Central Europe: A Public-Private Venture

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Abstract

The transformation of East-Central Europe deepens the debate about firm creation in a unique way: how do approaches to institutional creation impact the creation of firms? This paper theoretically and empirically explores this question by offering an alternative, *embedded politics* approach to explain the sharp contrasts in policy and SME manufacturing growth in the Czech Republic (CR) and Poland. Whereas Polish policies of gradual privatization and state intervention into restructuring led to significant growth in new firms, Czech policies of rapid, mass privatization produced stagnation. I argue that institutional experiments based on public actors becoming financial partners and conflict mediators enhance the ability of network actors to learn and monitor one another, and thus experiment with new forms of organization. Poland facilitated such institutional experiments not only in the ways it approached the creation of market institutions, but also in the ways it decentralized power and resources to local and regional political actors. The study utilizes data on manufacturing networks, privatization, bankruptcy, and regional government reforms collected over the past six years.

Non-Technical Summary

The transformation of East-Central Europe deepens the debate about firm creation in a unique way: how do approaches to institutional creation impact the creation of firms? This paper theoretically and empirically explores this question by offering an alternative, *embedded politics* approach to explain the sharp contrasts in policy and small and medium sized enterprise (SME) manufacturing growth in the Czech Republic and Poland.

There are two dominant approaches to firm creation that have informed policies and our understanding of institutional creation. First, property rights and Kirznerian views of entrepreneurship are reflected in reform approaches that understand transformation as discontinuous change from communism to capitalism and advocate the rapid privatization and liberalization of the economy. The Czech Republic stood out among its neighbors in forming an autonomous and coherent state apparatus that designed and implemented policies of rapid liberalization and mass privatization. In contrast, countries such as Poland became bogged down in political infighting and delayed mass privatization until 1995-96. However, Polish industrial output and manufacturing SME manufacturing sector grew rapidly and extensively while Czech output and manufacturing SMEs languished.

Second, the work on socio-economic networks argues that the reproduction of dense manufacturing networks provides the optimal conditions for new firms to enter and innovation to thrive. Leading scholars to this work pointed to the Czech Republic as an optimal case for this to occur. However, not only did Czech manufacturing SMEs stagnate but also the highly touted financial networks among banks and investment funds at best severely mismanaged assets.

My *embedded politics* approach builds on network theory but offers an alternative understanding of firm and institutional creation that accounts for both continuity and change. The conceptual point of departure from both approaches is that firms and entrepreneurial activity are embedded in both social and political ties that link the necessary **reorganization** of networks with institutional change. In this view, industrial networks were politically constructed by distinct groups of firm and public actors to obtain resources and develop informal regimes of authority for the coordination of improvised routines under the uncertainties of shortage. Similar to the literature in economic sociology, this view understands change as evolutionary, where new firms largely emerge not from a *tabula rasa* but as part of the reorganization of networked assets. While interlinked assets curb individual discretion, the experimental process of asset reorganization also impedes cooperation via contractual methods. Yet, this view departs from much of the economic sociology literature in understanding that existing networks only function in a specific, in this case previous, political-institutional context. Historical social bonds can fail as well to mediate change and conflict over asset reorganization since they are derived from previous political relations with public institutions that provided key resources and bases of network authority structures. In turn, the experimental process of asset reorganization extends to the simultaneous experimental process of creating new roles for public institutions.

This paper applies my approach in two empirical ways. First, I examine the Czech machine-tool network, a sector of historical strength in Czech industry and, in general, of growth in manufacturing SMEs. In 1990, the sector embraced voucher privatization and had a network

structure that was in many ways optimal for firm creation and innovation. The network, however, quickly fragmented and became insolvent as member firms were unable to cooperate on product development and out sourcing. I argue that a key reason for its demise was the institutional change was enacted. The ability of machine-tool firms to cooperate in the past depended on the network authority structure in which several firms had build alliances with former communist regional and district councils to obtain resources and provide bargaining power. Alterations in the authority structure of a network emerged from both changes in the economic environment, like the relative importance of a particular product, and changes in the political-institutional environment, like privatization rules, financial regulations, and public sector reforms. Under new uncertainties, interdependent firms were unable to cooperate over the reorganization of common assets, since the ability of one member to impose its will on or give reliable guarantees of compensation to another member depended not only on the risk associated with the investment and the historical bonds between them but also the support of public actors who may be no longer available. Key machine-tool firms often lost their authority and access to resources when the centralization of policy-making power eliminated virtually eliminated regional and local councils and the rapid privatization of banks and the new financial regulations gave the banks little incentive to finance restructuring.

In linking institutional and asset-reorganizational experiments, my approach can help clarify the conditions that promote cooperation and lead to dynamic firm creation. The recombination of network assets is an iterative negotiating process at two levels: the selection of restructuring projects and the creation of rules (formal or informal) about monitoring one another. Akin to workouts, this process is fraught with questions of how risk is shared, of who decides what, and how the process is governed. The history of western capitalism has shown that workouts for both financial institutions and firms demand that public actors share some of this risk and adjudicate conflicts over the control of assets and liabilities. This history has also shown that the creation of institutions to facilitate workouts, be they directed by a central bank, a ministry, or the courts, has been an experimental one, in which public and private actors enact one set of rules, analyze the results, and reform the existing rules. In turn, the restructuring of existing networks that lead to growth and firm formation in East-Central Europe depends largely on both the ability of public actors to become risk sharers and conflict mediators and the ability of the political system to allow public actors to experiment and learn to take on these new roles.

Polish policies appeared to facilitate manufacturing SME growth by allowing stakeholders to lease assets and directly negotiate their use; by initiating state-backed workouts of both banks and large firms; and by allowing local governments to directly participate in the reorganization of manufacturing networks. These policies promoted institutional experiments based on public actors becoming financial partners and conflict mediators and enhanced the ability of network actors to learn and monitor one another, and thus experiment with new forms of organization.

Introduction

Since the decline of mass production models in the 1970s, scholars and policymakers alike have debated over the forces that promote the creation of new firms (i.e., entrepreneurship) and the contribution of small- and medium-sized firms (SMEs) to growth and innovation.[1] Some analysts focused on the individual entrepreneur as arbitrageur and advocated the importance of policies that promoted the free movement of resources and market competition. Others focused mainly of the characteristics of inter-firm networks that promoted resource-sharing and cooperation.[2]

The events of the last decade in East-Central Europe offer scholars and policymakers a unique opportunity to evaluate these arguments in two important ways. First, because of communism's adherence to the economies of scale model, for both political and economic reasons, and the virtual absence of the private sector and SMEs, economic renovation in the region is closely linked not only to the restructuring of inherited state firms but also the creation of new SMEs.[3] Second, but in sharp contrast to the reorganization of industries in advanced countries, economic transformation in East-Central Europe is also wedded to the wholesale creation of market-based and democratic institutions. Thus, the changes in East-Central Europe deepen previous debates on SMEs by linking firm creation to institutional creation: how do approaches to institutional creation impact the creation of firms?

This essay theoretically and empirically explores this question in light of two major analytical traditions on firm creation and SMEs while offering a third, alternative approach. On the one hand, Kirznerian views of entrepreneurship are reflected in reform approaches that understand transformation as discontinuous change from communism to capitalism and advocate the rapid privatization and liberalization of the economy.[4] In these approaches, economic renovation hinges on the ability of private individuals with secure ownership and creditor rights to "read" clear price signals and become arbitragers to fill both market and institutional gaps. On the other hand, economic sociology views of entrepreneurship and innovation are reflected in reform approaches that emphasize the continuity of past social structures determining strategy and policy choices.[5] Firms remain embedded in old socio-economic networks, which are the sources of trust and reciprocity that facilitate the flow of resources and information needed for

the firm restructuring and creation. In this view, policy should be directed at preserving the relationships of networks.

While building on the views of economic sociology, this paper attempts to offer an alternative understanding of firm and institutional creation that accounts for both continuity and change. The conceptual point of departure from both approaches is that firms and entrepreneurial activity are embedded in both social and political ties that link the necessary **reorganization** of networks with institutional change. In this view, industrial networks were politically constructed by distinct groups of firm and public actors to obtain resources and develop informal regimes of authority for the coordination of improvised routines under the uncertainties of shortage. Similar to the literature in economic sociology, this view understands change as evolutionary, where new firms largely emerge not from a *tabula rasa* but as part of the reorganization of networked assets. While interlinked assets curb individual discretion, the experimental process of asset reorganization also impedes cooperation via contractual methods. Yet, this view departs from much of the economic sociology literature in understanding that existing networks only function in a specific, in this case previous, political-institutional context. Historical social bonds can fail as well to mediate change and conflict over asset reorganization since they are derived from previous political relations with public institutions that provided key resources and bases of network authority structures. In turn, the experimental process of asset reorganization extends to the simultaneous experimental process of creating new roles for public institutions.

To clarify the deficiencies in the fore-mentioned dominant approaches and the advantages of my alternative, *embedded politics* approach to firm and institutional creation, this paper seeks to explain the stark differences between the Czech Republic (CR), Poland, and Hungary in terms of entrepreneurial performance during the last decade. Section I offers summary data on the differences between these countries and a critique of the two dominant approaches. Despite their gradual approach to privatization, Poland and Hungary clearly outperform the CR in terms of industrial output growth and the creation of manufacturing SMEs. Section II briefly reviews the main points of an embedded politics approach. Sections III and IV then explore these arguments empirically, using network and institutional data from the two extreme cases, the CR and Poland.

The upshot, as discussed in the conclusion, is that institutional experiments based on public actors becoming financial partners and conflict mediators enhance the ability of network actors to learn and monitor one another, and thus experiment with new forms of organization. Poland facilitated such institutional experiments not only in the ways it approached the creation of market institutions, but also in the ways it decentralized power and resources to local and regional political actors.

I. Explaining the Divergence in Growth and Firm Creation

By the mid-1990s the Czech Republic was viewed as the crowning success of the depoliticization model advanced by those who viewed transformation as one of epochal change – a leap from one complete set of organizing principles to another.[6] In this view, communist countries were essentially composed of a unified party-state hierarchy commanding atomized firms or individuals. During transformation, an insulated state alone can and should define and impose a new institutional order upon a *tabula rasa* of atomized, self-interested actors. Depoliticization is the ability of the state to eschew negotiations with economic actors about the initial institutional designs and their subsequent revisions by cutting off a powerful "change team" from society to impose rapidly a new set of rules that directly guide actors toward efficient resolution of restructuring conflicts.[7]

Three key factors enabled the Czechs to achieve depoliticization: optimal starting conditions, an autonomous, powerful change team, and policies for rapid liberalization and privatization.[8] Because of their orthodox political and economic policies, the communists left the Czech Republic with a stable macro-economy, low foreign debt, weak social and political groups, and a central government with virtually complete legal control of assets. A coalition led by Vaclav Klaus used these conditions to virtually eliminate the powers of regional and local governments and construct a strong policy apparatus that cut itself off from potential "rent-seekers," such as parliament and special interest groups. In turn, the Czech government rapidly liberalized trade and most prices, enacted conservative monetary and fiscal policies, created bankruptcy laws based on liquidation of defaulting debtors, instituted a limited, rule-based,

recapitalization of banks, and, above all privatized over 1,800 firms in less than four years through its now famous voucher method.[9]

In contrast, Hungary and Poland were deficient in all three areas.[10] Policies of partial economic and political liberalization, particularly in the 1980s, left both countries with relatively large fiscal deficits and foreign debt and relatively strong social groups and competing political parties. These economic factors created multiple goals for privatization, such as maximizing sales revenues and maintaining employment, rather than simply keeping privatization focused on the rapid delineation of private ownership rights. The political factors allowed organized groups and parties to contend for policy control and enabled stakeholders, such as workers councils, managers and local governments, to intervene in, if not exercise veto rights over, the privatization of assets. The governments were then forced to include several potentially conflicting aims into privatization and banking policies as well as engage in the arduous task of re-claiming full control over assets in order to privatize them. In turn, Hungary and Poland experienced stop-and-go policies in privatization and the reforms of banking and commercial laws. For instance, between 1990 and 1995, Hungary underwent three reorganizations of their privatization agency and policy, three revisions of bankruptcy law, and a series of problematic bank bailouts. During the same period, Poland was unable to initiate mass privatization and dealt with large industrial firms and banks mainly through a complex, state-backed plan for the restructuring of bank debt.

The depoliticization agenda rests on two key premises regarding firm creation.[11] First, in its emphasis on speed and discontinuous change, the depoliticization agenda views that the main social and institutional ties under communism were ones that promoted cancerous bargaining between firm managers and central state officials. Optimal asset reorganization and firm creation can only come about when these ties are destroyed and the state is no longer permitted to enter into economic activities, otherwise prices and incentive will remain distorted. Second, mass privatization allows various claimants to assets strike "efficient bargains" so that resources can be quickly directed to the enterprising investors. These bargains are typically the consolidation of control rights over assets and cash flows, the liquidation of loss makers and

delinquent debtors, the break-up of large firms, and the creation of enforceable contracts for outsourcing and alliances.

These two premises echo common market-based understandings of entrepreneurship. First, the emphasis on destruction of past forms of economic organization is a strong reminder of conventional interpretations of Schumpeter that creation of the new can only come by first destroying the old.[12] Second, the importance of clear price signals and property rights for individuals to be able to create "efficient bargains" through secondary market arbitrage is in direct line with Kirzner's argument that equates wealth and firm creation with "the daring, imaginative, speculative actions of entrepreneurs who see opportunities for pure profit in conditions of disequilibrium."[13] Indeed, this convergence of ideas between the two literatures may come as no surprise, as Dusan Triska and Tomas Jezek, the architects of Czech privatization, based their understanding of economic activity, like Kirzner, heavily on the work of von Mises and Hayek.[14]

Triska and Jezek's philosophy served the Czechs well in receiving praise from both independent scholars and such organizations as the IMF, World Bank, and EBRD.[15] As can be seen in Table 1, by 1995 the Czech adherence to depoliticization had allowed the country to race ahead of Poland and Hungary in the transfer of property from state to private hands, especially in industry. The Czech gains in private sector creation indeed boosted confidence in using depoliticization model elsewhere, including Russia.[16]

Ia. A Closer Look at the Data

The eventual outcomes of these contrasting approaches to transformation, however, conflicted significantly with the expectations of the depoliticization model. First, it has now been well documented both by independent scholars and even the World Bank that Czech mass privatization did not facilitate firm restructuring and new firm formation.[17] Rather, the evidence shows that the combination of rapid delineation of private ownership rights and weak capital market and banking regulation created incentives for short-term gains through equity arbitrage in the secondary market and not for investment into corporate governance and reorganization. At

best, the subsequent creation of dominant investment funds with cross-holdings in the main Czech banks led to mismanagement of assets, with financiers more concerned about blocking outside investors and unwilling to bear the risks of leading corporate reorganizations. At worst, new Czech entrepreneurs manipulated lax rules on shareholder protection and public oversight to reap profits through insider trading schemes and asset stripping. Such actions not only impeded potential new firms from making productive use of existing assets and from gaining contracts, but they also thwarted the development of a capital market as a source of financing for both established and new firms. For instance, by 1998, no firm, old or new, used the Czech bourse to raise capital while Poland saw a substantial rise in the liquidity and amount of capital raised in its bourse.[18]

Second, the divergence in the performance of financial entrepreneurs was matched by that of industrial entrepreneurs. Despite the rapid increase in private control over GDP and industry, the Czech Republic significantly lagged Hungary and Poland in the growth of both industrial output and manufacturing SMEs.[19] (See Figure 1 and Table 2.[20])

The two sets of evidence clearly present explanatory problems for the depoliticization approach to transformation and the Kiznerian view of entrepreneurship. The collapse of the Czech capital market and strengthening of the Polish market, on the one hand, and the significant differences in industrial output and manufacturing SME growth undercut the argument that rapid state withdrawal from the economy and rapid delineation of property rights lead to growth and firm creation. One way to save the depoliticization approach is to argue that contrasting banking policies allowed Hungarian and Polish start-ups had better access to bank credit than their Czech counter parts. Yet, the existing evidence, particularly during the first half of the decade, shows that Czech SMEs and start-ups had relatively greater access to bank loans.[21]

Another way to save the tabula rasa understanding of transformation is to argue that firm creation has little to do with the existing state sector, as long as governments pursue strict fiscal and monetary policies, liberalize markets, protect private property rights.[22] A good example of this view is the work of Johnson and Loveman (1995), who argue that Poland's growth comes from the development of *de novo* private SMEs and not necessarily the reform and privatization

of the existing state firms. *De novo* firms adapt relatively better and faster to the new conditions than existing state firms since they start from scratch and are smaller. That is, lacking the organizational baggage of existing firms and utilizing their relatively small size, *de novo* firms can quickly resolve the "complementarity" problem – the simultaneous reorganization of the strategy, structure, and compensation systems of a firm's operations (pp. 104-105).

While it may be true that new, small firms have relative adaptability advantages over existing large firms, this argument becomes self-defeating. The basic problem is that in order to sustain the importance of clear property rights and mass privatization, Johnson and Loveman must argue the development of new private firms has no connection to existing state firms, other than the latter free up resources. First, this argument ultimately ignores the fact that Poland's governments made significant interventions into the restructuring of the financial and industrial sectors and followed a gradualist path of transforming ownership, capital markets, and governance institutions. These actions not only violate rules of clear property rights and incentives but also are critical background conditions for the creation of new firms (see below). Second, Johnson and Loveman's own empirical evidence shows government assistance with debt reduction as key to the restructuring of transforming state firms and the importance of linkages between existing state firms and new private manufacturing firms as channels of sales, supplies, facilities, and personnel.[23]

The upshot is that one cannot explain dynamic new firm formation without understanding the linkages between the past and the present, the inherited state sector and the emerging private one as sources of incubation and resources. Indeed, one of the few recent multi-country econometric analyses of *de novo* firms suggests this.[24] Moreover, even if one tries to base the relative performance differences on Poland and Hungary's former *second economies*, the research on this small private sector under communism clearly shows that it was intimately woven into the operations of state firms.[25]

Ib. Continuity and the Role of Socio-economic Networks

Much of the work in economic-sociology has focused on the importance of inter-firm networks, as opposed to markets or hierarchies, in determining the ability of firms to adapt and innovate. In this view, the different structure, density, and strength of inter-firm ties help gauge the ability of firms to cooperate, access new information, maintain market positions, and innovate.[26]

The work of David Stark is the most prominent in extending the field into analysis of post-communist countries.[27] First, Stark was among the first scholars who showed that communist economies were less collections of atomized firms hierarchically commanded by the party state and more akin to constellations of firms embedded in a variety of horizontal and vertical social and economic ties that grew out of improvised responses to the uncertainties of the shortage environment. Second, he argued that after the collapse of communism, firms remained embedded in these ties, and, thus, emphasized the continuity of past socio-economic structures. The reproduction of network ties not only promoted a diversity of experiments for firms to "recombine" assets but also provided them with norms of reciprocity and reliable channels of information and resources vital for generating and selecting restructuring strategies.

This approach is extremely useful in that it directs comparative analysis away from the use of idealized images of modern capitalism as benchmarks for reform to the use of mid-range analytical categories that help highlight the distinctive patterns of economic organization created within and across countries during transformation. Moreover, in demonstrating that the network, rather than the firm, was the unit of analysis, Stark reveals how old ties turn Johnson and Loveman's "complementarity" problem into an inter-firm issue that links existing state firms to the creation of new firms. However, in his emphasis on the preservation of network relations and on the disconnection of the process of asset recombination from that of network reorganization, Stark reveals the limitations of economic sociology explaining the divergence in growth and firm creation, and in general the relationship between firm creation and institutional transformation.

First, although Stark shows how networks can impact asset recombination, his emphasis on continuity over determines the ability of old ties to govern asset reorganization under new

uncertainties in ways that lead to productive outcomes, rather than, say, to self-dealing or mismanagement. For instance, Stark argues that the Czech case is a prime example where past informal network relationships were best preserved and formalized into sound governance institutions *writ large* by a responsive government. His evidence is the emergence of the complex interlocking ownership and financial links among the main Czech banks, their investment funds, and the overlapping portfolios of privatized state firms. In light of the evidence on Czech privatization discussed above – both the aggregate economic data as well as the virtual collapse of the Czech capital market – one must question whether the reproduction of "old school" ties are sufficient mechanisms for governing restructuring. Although the investment funds of the main Czech banks did not appear responsible for the most glaring cases of asset stripping, any vestiges of associationalism were apparently insufficient to help the banks and funds cooperate, select restructuring projects and invest in the corporate governance of jointly controlled firms.[28]

Such empirical problems reveal a second, theoretical limitation to the work in economic sociology. In focusing on socio-economic ties among firms, this approach is remarkably silent about how institutional change may inter-act directly with network reproduction, other than emphasizing institutional policies that preserve past network ties. For instance, Stark argues that reversals in Czech policies to partially suspend bankruptcy laws and to use public finances to net-out chains of inter-firm debt were positive recognitions of the importance of inter-firm networks. Yet to what end? The evidence shows that the netting out policy did little to lower debt and was cancelled, since firms were unwilling to cooperate and fully reveal their liabilities.[29] Conversely, evidence that Polish SMEs use relatively high levels of inter-firm credit and leasing arrangements, without creating unmanageable leverage, suggests that Polish policies have not only helped preserve but also reorganize intra-network relations.[30] In turn, if past norms were insufficient to aid firms to cooperate over restructuring and debt reduction, then either the inherited network relationships had been altered in some significant way or they lacked qualities in and of themselves to help firms adjust to the new uncertainties. In either case, one would have to surmise that institutional factors can have a direct impact on the ability of networks to alter themselves and on the ways network actors select a set of restructuring strategies over another. But this would lead one to move beyond the purview of economic

sociology, since conventional network analysis largely ignores changes in networks nor integrates institutional-political factors into its understanding of the origins of inter-firm networks.

Id. An Embedded Politics Approach

The alternative, *embedded politics* approach advanced in this paper attempts to identify factors that continue to shape and constrain firm strategy, such as economic and social links that tie actors to common assets, as well as factors that can alter the structure and cohesion of inherited networks, such as specific institutional supports for networks. This approach departs, then, from conventional network analysis in understanding that firms are embedded in *socio-political* networks that are constructed and re-constructed by specific firms and public actors under different political-economic regimes. By clarifying the factors that shape the movement from one equilibrium to another, one can begin to specify the conditions that promote or impede firm formation in post-communist countries.

The basis for advancing an embedded politics approach to entrepreneurship in post-communism is twofold. First, there is increasing evidence from a variety of East European countries that industrial networks include not just firms but also regional bank and party council officials.[31] For instance, my own research has shown that even in the relatively orthodox communist Czechoslovakia planning experiments allowed mid-level institutions, such as industrial associations (VHJs) and regional councils, to take on greater decision-making rights over, respectively, production and the provision of social-welfare services.[32] Distinct patterns of industrial networks grew around different VHJs. Constituent suppliers, customers, managers and work groups formed alliances with local state bank branches and party councils to gain privileges from the state center and create informal channels of coordination to adjust to the uncertainties of the shortage economy. These alliances solidified the network authority structure, since they were sources of political and financial risk sharing to limit central intervention and facilitate the autarky and improvisation needed to adapt to an ineffective institutional structure.

Second, much of the research on the importance of inter-firm networks in advanced industrialized countries came out of the work on industrial districts.[33] This research emphasized not only the determining influence of different network characteristics on firm behavior but also the political-institutional architecture that was interwoven with inter-firm relationships.

In the embedded politics approach, a key variable is power. The power a firm or plant may have over assets and the creation of formal and informal rules of inter-firm relations is derived from not only one's position in the value-chain, such as a critical supplier or purchaser, but also the strength of one's ties to local public actors, such as bank and party-council officials during communism. A network may be more hierarchical or more egalitarian, depending on the mix of these two factors. This understanding of the construction of the authority structures of economic networks becomes critical for post-communist restructuring in two ways.

First, alterations in the authority structure of a network emerge from both changes in the economic environment, like the relative importance of a particular product, and changes in the political-institutional environment, like privatization rules, financial regulations, and public sector reforms. Under new uncertainties, interdependent firms may be unable to cooperate over the reorganization of common assets, since the ability of one member to impose its will on or give reliable guarantees of compensation to another member depends not only on the risk associated with the investment and the historical bonds between them but also the support of public actors who may be no longer available. For instance, in the Czech Republic (CR) firms often lost their authority and access to resources when the centralization of policy-making power eliminated virtually eliminated regional and local councils and the rapid privatization of banks and the new financial regulations gave the banks little incentive to finance restructuring.

Second, in linking institutional and asset-reorganization experiments, the approach can help clarify the conditions that promote cooperation and lead to dynamic firm creation. As suggested already by my discourse, the recombination of network assets is an iterative negotiating process at two levels: the selection of restructuring projects and the creation of rules (formal or informal) about monitoring one another. Akin to workouts, this process is fraught with questions of how risk is shared, of who decides what, and how the process is governed. The

history of western capitalism has shown that workouts for both financial institutions and firms demand that public actors share some of this risk and adjudicate conflicts over the control of assets and liabilities.[34] This history has also shown that the creation of institutions to facilitate workouts, be they directed by a central bank, a ministry, or the courts, has been an experimental one, in which public and private actors enact one set of rules, analyze the results, and reform the existing rules. In turn, the restructuring of existing networks that lead to growth and firm formation in East-Central Europe will depend largely on both the ability of public actors to become risk sharers and conflict mediators and the ability of the political system to allow public actors to experiment and learn to take on these new roles.

The rest of this paper will empirically illustrate this argument, by applying this approach first to analyze the fragmentation and demise of a potentially prosperous Czech machine-tool network, and then to analyze the respective political institutional conditions that facilitated network restructuring and firm creation in Poland. Although the data presented here, particularly with respect to the latter cases, is somewhat incomplete, the evidence suggests Polish growth was due to two key factors: the initiation of policies that allowed public and private actors to engage jointly in the gradual reorganization of assets and policies that fostered the participation of local public actors in restructuring. Rather than drawing bright lines between the public and the private, between the center and the periphery, such policies understood restructuring as a negotiated process, in which rules of participation helped public and private actors share information and learn how to monitor one another's use of common assets.

II. The Fragmentation of Old Ties

Czech machine tool firms form a vital part of the country's machinery and equipment sector, which was the engine of industry for Czechoslovakia and the Austro-Hungarian Empire and continued even during the decline of the 1990s to account largest share of manufacturing employment and second largest share of manufacturing value added in the CR.[35] The Czech firms were also the premier machine tool suppliers to the CMEA during communism and among the top 8 nations in machine tool production in the world for much of the post-WWII period.[36] Since the mid-1970s, scholars have viewed the machine tool industry worldwide as a

paradigmatic example of SME creation and flexible specialization.[37] With their decades of experience and skill, Czech machine tool firms were poised to join this trend in 1990. Moreover, the traits of the network of these firms and their embrace of rapid privatization pointed in their favor.

First, by 1990 the machine tool industry was already organized into many legally independent firms, as opposed to a few large, vertically integrated firms that were common in other branches.[38] During communism, the VHJ, TST, managed the large majority of firms and plants that produced machine tools and many of their key components. By the late 1980s, TST had over 20 firms, comprising about 30,000 employees and a rather broad production profile of machines and components. When Czechoslovakia dissolved the VHJ system in 1987-88, TST members (including many plants) chose to become legally independent state firms. This movement toward deconcentration grew out of TST's a *polycentric* network, which possessed many qualities associated with networks that facilitate the transfer of tacit knowledge, flexibility, and access to new information and resources.[39] (See Figure 2.) Structurally, there were several central firms that worked with the directorate on a consensual basis, and members had retained considerable decision-making powers and independent financial accounts. Relationally, although members had a deep history of overlapping, direct social and professional ties, they were usually horizontally associated with limited direct operational links and had often generated their own links outside of TST. For instance, a TST firm typically focused on a certain class of machines, had several plants, and produced over 80% of its inputs in-house. While parts like hydraulics, pneumatics, and ball bearings, as well as specific metal castings, came from other members, the firms acquired certain electronic components from other VHJs jointly via the TST directorate or directly, depending on the quality of their local professional linkages. A key reason for the development of this polycentric network with its combination of rich social ties and potential "brokerage" opportunities for members[40] was that most member firms developed direct links to regional bank branches and regional/district administrative-communist party councils. These linkages aided firms in managing inter-firm debts, mediated delivery disputes with non-TST firms in the region, and were sources of countervailing bargaining power vis-à-vis one another, the TST directorate, and the central state ministries.

Second, in 1990 and 1991 and in the face policies directed at the dissolution of regional councils, the weakening of local councils, strict banking laws, and rapid privatization, the ex-TST firms took advantage of their network structure by embracing privatization, spinning off new firms, and grafting indirect equity alliances onto their inherited social. The firms and plants entered privatization individually (mostly via vouchers). In 1991, ex-TST firms had already broken themselves up into 40 firms, with the 6 largest allowing their plants to operate as semi-autonomous profit centers and prepare themselves for eventual spin-offs. At the same time, ex-TST firms sought to balance individual autonomy with group cohesion by bolstering past professional ties with new equity and financial ones. In particular, members sought to combine social and equity links to help manage areas in which they lacked individual resources and know-how, such as in foreign trade, common trademarks, critical supplies, vocational training, and development loans. They converted the former TST directorate into the support headquarters of new machine tool association, SST, in which each firm was an owner. SST, in turn, used its historical ties to actors in the trade and financial sectors to take a 30 to 40% equity stake in one of the major trade houses, Strojimport, and build an alliance with members of the foreign trade financial group, FINOP, and the Czech Republic's main trade bank, CSOB. With FINOP and CSOB, SST created a new private bank, Banka Bohemia, and an equity investment company, ISB, whose engineering fund bought strategic stakes in SST member firms and important suppliers/customers.[41] The result of this elaborate equity and financial alliance can be seen in Figure 3. Member firms would renew past direct ties with one another owned, and via SST have a collective brokerage link outside the group. While member firms owned SST, SST ran the boards of Strojimport and the engineering fund, provided strategic information to its members, and aided members in negotiations with banks, notably via Banka Bohemia.

By mid-1996, however, the industry had fragmented into insolvency. The attempt by SST members to preserve their past social relationship, reinforce them with new governance mechanisms of equity and contracts, and also replace past public external partners with new private financial ones did little to promote cooperation and restructuring.

First, the uncertainties of new production experiments demanded a reorganization of existing network ties and undermined the cooperation between member firms. As each firm began to

experiment with new products or alterations of existing ones, they turned to one another for the development or sub-contracting of certain components and the cost sharing of exporting and importing (especially for CNC electronics). Since these experiments were highly uncertain and often conflicted with one another, no firm could give the guarantees to the others to forego their own plans and invest in those of the solicitor. For instance, with the collapse of trade in the CMEA and the domestic recession, SST firms sought new market niches based on short pilot production runs. Even when the solicitor demonstrated that the trial runs were for a credible international client, these runs were often too short with poorly defined future revenue streams to instill confidence in other members to prioritize their own component production for the given project. Experimentation had also led member firms often to encroach on one another's product lines in such a way that had firms fearing that collaboration would undermine individual export revenues.[42]

Secondly, the supporting equity alliances failed to provide needed financing to overcome the hold-up problems among members. As one of the "big-five" Czech banks, CSOB was the critical financial link in the alliance. Yet the combination of the collapse of CMEA trade, new creditor rules, and government enforcement of hard budget constraints, left CSOB and Strojimport with a large stock of non-performing credits and weak capital bases. CSOB, in turn, refused to initiate the restructuring of Strojimport and provide credit lines to Banka Bohemia and SST firms. A typical option would be the use of institutional workout mechanisms, in which public actors share some of the risks and create rules for the multiple parties to assets to negotiate iteratively over the restructuring of both operations and financing. Czech transformation policy eliminated any role for extended participation by public actors and any mechanism for joint management of assets, other than voluntary contracts. For instance, bank restructuring was reduced to a one-time, partial recapitalization and debt-removal, leaving banks on their own to deal with troubled firms. Bankruptcy was reduced to a fast track to liquidation, and has now been well documented to be ineffective.[43] Given the tight interdependencies between the banks and industrial firms, the big Czech banks found it too risky to lead bankruptcies or restructuring, and SST firms languished. Indeed, in 1994, four of the five largest de novo banks, including Banka Bohemia, were seized by regulators and closed.

Neither the old social relationships among firms nor the new equity alliances with financial and trade organizations were sufficient to provide credible structures for negotiated management of claims to common assets, be they production plants or import-export ventures. The next best option for a firm is to forego collaboration, vertically integrate needed assets, and, ultimately, resort to financial manipulation. This scenario reached even the most successful SST firm, ZPS.

Between 1992 and 1995, ZPS more than doubled its total sales and exports. The firm penetrated new export markets for final products, such as redesigned horizontal machining centers and multi-spindle lathes, as well as for semi-finished goods, such as steel castings and pallet exchangers.[44] A key factor in ZPS's success was its ability to renew its own local socio-political network and use it to build new channels of financing and export contacts. In contrast to other SST firms, ZPS did not discard civic-social assets (health clinic, power station, apartments, community center) that the communists typically put on the books and sites of firms. Rather, ZPS co-managed and co-financed them with the local government and entrepreneurs. Coupled with the management's active participation in the country's "velvet revolution," these actions afforded ZPS significant social and political capital in the Zlin district, which they converted to socio-economic capital. For instance, ZPS gained financing from employees and local citizens in 1991-92 when other firms had little via a company based credit union and a locally placed bond issue. Also, employee shares and a community voucher fund together held about 20% of equity in ZPS, over which management had de facto control. From this base, ZPS management cultivated a network of local and foreign entrepreneurs, who were former ZPS or big bank employees. This network opened up new export markets to ZPS and helped create a set of allied, medium-sized investment funds and banks that channeled strategic information and financing to ZPS. To sustain the growth and increase the revenue streams from its component plants, the heavily leveraged ZPS had originally planned to gradually spin-off up stream operations and utilize other SST firms for more areas of sub-contracting. Yet, as SST relationships fragmented and firms bordered on default, ZPS found it too risky to engage such a strategy.[45] Instead, ZPS sought to acquire other SST firms by mid 1995. The question, of course, was how would they obtain control of the other firms, given that the big five Czech banks and the dominant investment funds had proven useless as sources of direct financing.

The answer is that a well-placed network can be used for self-dealing and domination as easily as it can be used for collaborative production. And when there are no institutions to help actors extend the time horizons and reformulate their methods of mutual monitoring and project selection through joint-deliberation, the former strategy is optimal. ZPS and its local allies, in turn, used their elaborate network of new small banks and investment funds to channel financing from the banks' depositors and a poorly monitored state insurance company to ZPS, gain strategic control of ZPS shares as well as manipulate share prices of ZPS and other companies. At the same time, it sought to control the SST board and the engineering investment fund mentioned above. With its new finances, manipulation of share prices, and influence over SST's fund, ZPS management orchestrated a series of take-overs of several of the fledgling SST member firms. The idea was that continued refinancing of existing debt and potential income streams as an oligopolist would reduce its leverage over time. This scheme came crashing down in late 1996 when two of their small banks went insolvent and regulators seized the insurance company as its weakness threatened the stability of the financial system.

In many respects, the inability of private contractual and ownership methods to resolve the hold-up and collective action problems are well known already in the work on uncertainty, incomplete markets, and common asset management.[46] But much of this literature also argued that the first steps toward collaboration would often depend on pre-existing social structures and a patterned history of mutual exchange.[47] Clearly, this shift in the literature opens the door for the continuity approaches to transformation that stress the importance of the reproduction of past social capital and certain inter-firm network structures as determinants of collaboration and performance. Yet despite the structural and relational qualities of the SST network and the conscious efforts by members to fortify them, SST firms came to view one another as competitors. Neither the old school ties nor positions on the various boards were sufficient to convince assumed financial and trade allies to divert dwindling resources to the SST firms.

One can begin to make sense of the failure of past social relations and equity ties to mediate the disputes among SST firms if one integrates political and institutional constructs into the definition of social capital and networks. As depicted in Figure 2, the alliances that TST firms had with regional and district administrative councils and bank branches were key sources

of mediation and authority that supported the polycentric network. While the council and branches collaborated with relevant firms to provide resources and coordinate economic activity, they also provided countervailing power vis-à-vis other strong member firms and the directorate of TST. In this view, the councils, for instance, provided political and financial capital to allied firms not only to engage in strategies of forced substitution and autarky, but also to maintain their level of autonomy and influence in bargaining within TST. The Czech agenda of depoliticization altered this equilibrium in three fundamental ways.

First, bent on centralizing power, the central government not only cut off regular communication with firms but also literally and figuratively eliminated traditional external partners of the firms – the local governments. Second, the agenda offered firms only a few private actors with existing resources as new external allies. Third, the agenda offered no framework for public support of extended multi-party negotiations for asset recombination, be it through a workout mechanism or through regional development initiatives.

On the one hand, the limited number of potential allies shifted the authority structure of SST's network. Whereas previously the polycentric structure and quasi-brokerage positions of various members emanated from ties to district and regional bank branches and councils, after 1990, as shown in Figure 2, the new alliances with banks and trade companies were concentrated via the SST directorate. The effectiveness of these new alliances depended in part on a level of cooperation and confluence of interests among SST firms that had existed only when firms had their own bases of resources and political leverage via, notably, the councils. On the other hand, the new external allies alone lacked the political and financial capital to credibly mediate intra-SST disputes and share risk with these firms – and thus help reconstruct the social ties and authority structure of the network. The only institutional means available were voluntary contracts, liquidation, and poorly regulated investment funds. As already mentioned, the combination of uncertainty and interdependencies between banks and industrial made bank led restructuring too risky. Rather, banks and their funds minimized investment in corporate governance and focused on arbitrage activities in the secondary equity markets. In turn, SST relations fragmented and new resources were unavailable for spin-offs or start-ups in the industry.[48]

To a certain degree, one can interpret ZPS actions as generated from its advantageous "brokerage" position and capital, which emerged via ZPS's conscious efforts to rebuild and convert its own local socio-political network into a source of sales and financing. These actions were sufficient for ZPS to restructure itself and begin new lines of potentially lucrative products. Yet, brokerage is a two-way profession and depends still on the integration of supporting public institutions. On the one hand, the broker needs a reasonably stable core network (SST) to put existing assets and information to new uses without taking full responsibility for them. On the other hand, as the core network collapses and total control becomes paramount to the broker's entrepreneurial aspirations, the broker (ZPS) demands ever more resources to consolidate its position (and avoid default). Local public actors could no longer participate, as they lacked resources and a political framework to coordinate actions with other SST localities or the central ministries. Moreover, without institutionalized mechanisms to encourage existing financiers to share the risk in the broker's consolidation, the broker's private allies must mirror the broker's domination strategy to capture any available financial resources. For ZPS's allies this meant a short-term strategy of manipulating the values of their own investment portfolios and for ZPS to gain debt-finance via their own banks and the Czech insurance company. Notice that the brokerage strategy ends in a domination strategy – of both the broker's former core network and its financial channels – when there are no adequate institutions to facilitate extended negotiation and multi-party risk sharing. Ultimately, the incentives lead to systemic failure, when the state can no longer ignore the damage. Creditors seized the banks of the allies and the Czech insurance company, and ZPS was forced to enter a new state administered restructuring agency in 1999.

III. Enabling Restructuring and Institutional Experiments in Poland

The Czech failures suggest that asset recombination between interlinked parties forces two levels of experimentation – with the reorganization of the network and with new roles for public actors, particularly at the regional levels, to assist. First, the reorganization of the network challenges the existing authority structure and its existing terms of cooperation. Restructuring can advance then with institutional mechanisms that facilitate extended multi-party deliberations – deliberations

that may begin about the exploration and selection of new projects but, in turn, become ones on generating new modes of mutual monitoring and asset control. Second, because public actors are integral to existing networks and tend to be vital players in such deliberations elsewhere in the world, network reorganization is intimately linked to the exploration of new roles for public actors. As with differences between "law on the books" and "law in practice," the definition and enforcement of institutional mechanisms is as much about power and resources as it is about the trial-and-error process.[49] In turn, the development of any institutional mechanisms promoting multi-party deliberations will demand not only government initiative but also the delegation of, at least, powers for different public actors to experiment with new roles and help define what a new policy, law, or whole institutional framework may become.

The Polish approach to transformation, thought not always intentionally, has contrasted sharply with the Czech approach on both of these levels of experimentation. The Poles created mechanisms that enabled stakeholders and outsiders as well as public and private actors to negotiate over time the reorganization of assets and the redefinition of property rights. First, rather than focus on rapid mass privatization, the Poles created legal vehicles that tied ownership transformation to the restructuring of assets. Second, central, regional, and local governments played significant roles in initiating, financially supporting, and monitoring the negotiated transformation of property rights and the restructuring of assets – for both large and small firms.

In short, one can explain relative strength in Polish industrial growth and manufacturing SMEs by a set of policies that helped network actors to reorganize their overlapping claims to assets over time. These policies had two key traits. First, while private property rights remained blurred, the government, at all three levels, delegated public authority for asset restructuring to private actors. This authority was linked to a set of rules and incentives to induce monitoring via continuous, multi-party deliberations over experiments with reassignments of asset control and use. Second, the use of government political and financial capital not only helped initiate the reorganizational process but also maintain it, since the capital enabled resources to continue flowing from large, state firms to smaller spin-offs and de novo ones. Together the two traits resemble the main properties of workout vehicles found in advanced industrialized countries:

breathing space for the parties to assets to experiment with reorganization projects and rules that promoted mutual monitoring through iterative, disciplined negotiations.

The rest of the paper examines these different policies in Poland and their impact on the recombination of network assets.

IIIa. Polish Privatization and SMEs

The very political forces and the 1990 law on Privatization of State Enterprises that legalized the veto powers of worker councils and effectively blocked rapid, mass privatization led to an approach that focused less on defining clear private ownership rights and more on delegating use rights and getting assets reorganized. The first part of the approach opened two routes that focused mostly on medium-sized firms, empowered stakeholders and facilitated the transfer of assets to existing network actors. One route, “liquidation” sent firms through a bankruptcy procedure.[50] For instance, the most prominent liquidation route (Article 19) included 1464 firms or over 26% of all and 37% of non-agricultural firms subject to ownership transformations by the end of 1996. [51] Although the details of the data lack clarity, previous research shows that as much as half of these assets of completed projects were partially restructured, kept as going concerns, and sold or leased to stakeholders and outsiders.[52] The downside of these court-based proceedings has been their slowness – for instance, as of December 1996 about only 34% of Art. 19 projects were completed.

The other route, probably the most efficient and dynamic, came through Article 37 of the 1990 Law, and is commonly known as “direct privatization.”[53] This law allowed employee councils to legally dissolve the state firm and then have the assets be sold or leased to a new company, often comprised of insiders.[54] By December of 1996, 1247 firms or over 22% of all and 31% of non-agricultural firms subject to ownership transformation entered direct privatization. Direct privatization accounted for almost 30% of all non-bank privatization revenues.[55] Almost 40% of firms were in manufacturing. By the end of 1996, 97.9% projects in direct privatization were completed, far surpassing the completion rates for “liquidation” and

especially the "indirect privatization" paths of commercializing firms and then selling them case-by-case or via the voucher investment funds (14.9%).

The lease option has accounted for over two-thirds of direct privatization projects and by the end of 1995 accounted for more employees than those in the "indirect" path.[56] This option was effectively a way for stakeholders to create a management-employee buyout (MEBO) through state-subsidized financing. The new company had to have at least 50% of employees of the original firm and make an initial down payment of 20% of book value. In return, it received a below market interest rate and could defer payments for one to two years. Research has shown that MEBOs and firms in direct privatization in general have performed well: the financial, productivity, and output indicators of the firms surveyed tend to be better than national and sectoral averages, and by 1998 only 23 MEBO firms had defaulted on their lease payments.[57] The studies also show that the majority of firms were undertaking organizational, process, and product innovations.

The use of Articles 19 and 37 for ownership transformation, particularly MEBOs, made three critical contributions toward network reorganization. First, as opposed to focussing on delineation of ownership rights, these routes made asset restructuring and the reordering of property simultaneous and gradual. Not only were assets often partially cleaned up and made available for stakeholders – of the old or related firms, but also the leasing arrangements effectively were incentive contracts that tied the option for full ownership to the reorganization and efficient use of assets

Second, these routes set a general tone that multi-party negotiations and consultations were necessary for linking restructuring and ownership change. For instance, Article 37 required that a majority of employees approve the process and, for MEBOs, form the new company. Article 19, though apparently less efficient, effectively avoided zero-sum outcomes by forcing creditors (banks and suppliers) and managers to generate a basic restructuring plan and find a new owner that was willing to also accept the existing workforce. Given often the legacy of tight linkages between firms and plants and the use of social relationships among them to coordinate decisions, this implicitly meant a degree of inter-firm negotiation about such actions.[58]

Moreover, public actors, notably the 49 voivodships (regional administrations) that received responsibility over most firms as their "founders," became central in facilitating dispute resolutions and consultations among firms. As the founder of an enterprise, the voivodship could initiate or block a liquidation petition, was charged with screening and vetting direct privatization projects before they were passed to the central Ministry of Ownership Transformation for final approval, and negotiated with MEOB candidate about certain terms of repayment. As such, the voivodship was negotiating with and mediating between the various stakeholders and competing claimants to assets. Moreover, as an agent of the central government charged with monitoring compliance with the various agreements, it collaborated with other public agencies, firms and banks to pool information and learn more about the activities and problems of firms in the region.[59]

Third, the central and regional governments helping share the risk of restructuring and as such provided breathing space for firms to experiment with restructuring strategies and a way to learn how to effectively monitor the users of subsidies. For instance, Article 19 provided an initial experiment for firms to receive debt relief and banks and voivodships to follow the results. The leasing option was an innovation on SME subsidies, not only due to the use of an incentive contract but also due to the delegation of powers to the voivodships, which were better positioned than central authorities to pool local information and develop ex ante and ex post monitoring capabilities.

IIIb. Polish Privatization and Workouts of Large Firms

Another consequence of the blocking of a Polish form of voucher privatization was a shift in policy toward the largest firms and banks. With case-by-case privatizations and existing bankruptcy procedures taking much time, the government had to become more proactive and address large firm restructuring as a key part of more gradual ownership change. In turn, the government initiated two simultaneous policies: a state-backed workout regime and a strong regulatory framework for both capital markets and a limited use of vouchers. Together, these two sets of policies were based on the three principles just discussed: tying restructuring to ownership transformation, creating government monitored mechanisms to promote extended

deliberations on restructuring among parties to assets, and using public actors to share some of the risk of restructuring. These policies had arguably an important, though often indirect, impact on SME creation and network restructuring: they kept a flow of resources via large firms to SMEs, they bolstered the use of the capital market for IPOs, and they helped interlinked banks, large firms, and SMEs address restructuring collectively.

Facilitating Workouts

Recall that Czech preoccupation for extended government participation in transformation impelled them to delink ownership change from restructuring: firm restructuring would emerge once private ownership and the new bankruptcy law were established and bank restructuring was based on rapid privatization and a one-time, partial recapitalization and debt-relief with no involvement of the concerned firms. In contrast, the Poles sought to tie both ownership change and restructuring as well as bank and firm restructuring. Part of these objectives was met in using from the outset bankruptcy mechanisms as a course of privatization. But these mechanisms were still slow, due to common problems of court-based workouts in East-Central Europe. In turn, the Polish government took the innovative step of creating the Enterprise and Bank Restructuring Program (EBRP) in 1993 – originally thought of as a way to address the growth of bad debts while prepping banks and firms for privatization and initiating debt-equity swaps. It was innovative for three reasons. First, while EBRP aimed to address the growing bad debt crisis and prepping seven of the nine main commercial banks for privatization, it purposefully linked bank and large firm restructuring. Second, in becoming the initiator of this process, the government recognized that not only were market incentives insufficient but also that it was also a key stakeholder in both firms and banks, not least of all due to its responsibilities as lender of last resort and as a creditor to both (via taxes). Third, in linking the restructuring of the two and thus taking charge of establishing and monitoring the criteria thereof, the government was to become an extended participant as a financial partner and conflict mediator to the parties involved.

The design of EBRP was rather simple. The government offered the seven banks (which held about 60% of outstanding enterprise debt) a one-time recapitalization sufficient to deal with classified debts that originated prior to 1992. In return, the banks had to establish workout

departments and had to reach a debt resolution agreement with its debtors by March 1994, to be fully implemented by March 1996. Such an agreement allowed for 5 paths, including demonstration of full debt servicing (about 40% of the 787 total firms), bankruptcy, liquidation, debt sale, and a new regime called "bank conciliation". This last route became the most popular method of dealing with problem firms (23% of firms and 50% of debt) and has been widely judged as a successful, innovative policy that not only improved the financial and operational performance of banks and firms but also provided strong foundation for rejuvenating the governance of relations between financial institutions and firms.[60]

Bank conciliation was a state-backed vehicle, in which the government, banks, and firms exchanged financial assistance for property rights and reorganizational actions. For the purpose of the paper, the policy and the process itself had two critical impacts on network reorganization. First, in linking restructuring of firms to debt relief, bank conciliation enhanced the ability of network actors to recombine mutual claims and SMEs to grow. On the one hand, the restructuring of large firm finances and operations provided a flow of resources and thus breathing space for large and their interconnected smaller firms to experiment with new uses of facilities and assets and new methods of contracting. Moreover, since bank conciliation forced operational restructuring, it provided a framework in which large firms could begin negotiations with suppliers and customers about initiatives in spin-offs, leasing, sub-contracting, and production changes. On the other hand, government intervention not only broke an existing stalemate between banks and firms, similar to that in the Czech Republic, but also provided a vehicle in which banks could learn more about serving clients and the problems manufacturing firms faced. For instance, in his detailed analysis of the heavily industrialized Lodz region, Dornisch (1997, 2000) notes that perhaps the most important outcome of EBRP in general, and bank conciliation in particular, was that the regional bank learned how to tap back into inter-firm networks and use them to create what he calls "project networks" for more efficient ex ante and ex post monitoring of financing new and existing firms. The project networks were vital to the regional bank's successful development of regional equity and venture capital funds.

Second, in using the principles of delegation and deliberation, bank conciliation helped both public and private actors learn how to use negotiated solutions of common asset problems

and learn how to develop their new roles in network restructuring. For instance, bank conciliation was a conscious effort by the government to overcome market inefficiencies and centralized administration. The government first provided financial support to the banks (and to the firms under a separate agreement on unpaid taxes and wages) while delegating restructuring authority to them, mainly to a lead bank. At the same time, it set clear rules of restructuring criteria, termination dates, and negotiating principles which it used to monitor bank and firm compliance. Within this framework of rules, the banks and firms negotiated the terms of restructuring and in some cases (about 10%) debt-equity swaps. During implementation, all three actors had to reveal to one another regularly information on the progress of their actions and thus begin to learn how to monitor one another and devise new roles for themselves.

Regulating Mass Privatization and the Capital Markets

As the Polish government launched EBRP, they focussed their approach to voucher privatization and the use of the capital markets on the ways that the government could strengthen incentives for restructuring and could become a credible risk-sharer and monitor of these incentives. In late 1995, the government initiated the privatization of 512 medium-large sized firms by placing them 15 government created National Investment Funds (NIFs), which would be owned by citizens and managed by top investment banks. Besides the limited scope of the program, three key differences with the Czech program have been attributed to the strengthening incentives by funds to restructure assets (and not simply trade them) and the creation of a vibrant capital market for financing existing and new firms.[61] First, while citizens via vouchers were majority owners of funds, the government created incentive contracts for fund managers that tied their revenues to firm performance and value creation. Second, the Poles took their time in developing a rigorous regulatory regime for securities markets that focused on public disclosure and protection of minority rights. Third, the government temporarily held 25% of equity in each firm.

The combination of controlling stakes by the NIFs and the state and the strong regulatory laws not only blocked the path of Czech type arbitrageurs but also helped build the credibility of a new method of finance during the fragile, nascent period of the implementation of a new institutional regime. In turn, the credibility of both restructuring incentives and the capital market

in general helped network restructuring and SMEs in two ways: restructuring provided a continued flow of resources and via large firms (i.e., purchases, supplies, subcontracting, etc.) to SME development and new firm formation, while capital market credibility facilitated the creation of perhaps the best IPO market in the region and thus a vital direct and indirect source of SME financing.

When one combines EBRP with the privatization policies, one can see that at both the macro- and micro levels, the Polish government was facilitating negotiated solutions to network reorganization and project selection by becoming an interim financial partner to restructuring and utilizing the principles of delegation and deliberation. At the macro-level, in both EBRP and mass privatization, the government was delegating restructuring responsibilities to private actors. Delegation overcame first mover problems by forcing firms and banks to take action and providing a public financial commitment (i.e., recapitalization and NIF contracts) that enhanced the credibility of the action. Notice that delegation is distinct from the private property rights approaches since ownership and creditor rights are conditional; and it is distinct from traditional economic-sociological approaches since it overtly attempts to break the existing pattern of relations. Deliberation occurred directly and indirectly. It was direct in EBRP through the simultaneous creation of performance criteria and rules for iterative, collective review by the parties of one another's actions. It was indirect in the NIF program and the new regulatory regime through the restructuring incentives and through the government monitors regularly reviewing with the firm and NIF managers their performance and compliance. Notice again that deliberation attempts to order common asset governance, and not deny it, as the property rights approaches would like; and it facilitates a process of multi-party negotiation over authority and the reorganization of inter-actor ties, which the traditional network approaches would not view as necessary.

At the micro-level, this process was also present via direct privatization. MEBOs were given limited financial support and delegated the authority over certain assets. At the same time, the lease agreements demanded that ownership transfer would be possible only if asset restructuring was sufficient in paying out the lease. One could argue that the government indirectly instilled a similar process of gradual adjustment of inter-firm ties by inducing the

gradual control change of assets. In sum, the Polish approaches to privatization and debt restructuring did not simply have the government preserve existing networks, as Stark and Bruszt (1998) would argue, but also provided incentives and rules that guided network actors to reorganize the authority structure and operational relations among themselves.

IIIc. Local Government

The importance of the interactive relationship between public actors and network restructuring can be brought into sharper focus when one considers a third fundamental difference between the Czech and Polish approaches to transformation: the role of regional and local governments. Both Polish and Czech reformers were highly concerned about continued control by communist apparatchiks of regional and local councils and maintaining a unitary state. But their methods of dealing with them contrasted sharply. As mentioned earlier, the Czech approach centered on concentrating power into an elite change team within the central government and debilitating local power. Consequently, regional governments were dissolved and reinstated only in 1998, while district level powers diminished and municipalities fragmented. Solidarity had developed a strong grass roots organizational network and believed that strengthening local democracy was vital to negating the legacy of communist centralism. In turn, the Poles not only maintained the 49 regional governments (voivodships) but also strengthened the role and accountability of local governments (gminas).

Consequently, significantly different institutional settings emerged. The CR has fragmented innumerous, small and largely uncoordinated municipalities and weak districts. Poland's municipalities (gminas) are considerably fewer and larger, and are coordinated by both the socio-political ties of Solidarity and entrepreneurial voivodships.[62] Although Czech and Polish municipalities have roughly similar aggregate revenue and expenditure structures, the Polish gminas and voivodships have significantly more autonomy on the setting of tax rates, and the use of funds and organizational resources that allowed them to be relatively pro-active. For instance, whereas the Czechs established (principally at the order of the central government) only 2 Regional Development Agencies (RDAs) in the regions with the highest unemployment, the Pole voivodships and gminas had created 66 RDAs by 1996 throughout the country. While

privatization and economic restructuring rested solely in the hands of the central government in the CR, while voivodships and to some degree gminas were from the beginning given significant responsibilities, particularly in becoming the legal “founders” of many manufacturing firms. Indeed, the Polish gminas have been consistently cited for their improvement in services and their unique ability to create a vibrant municipal bond market. Moreover, recent research in Poland reveals high and strong correlations between the implementation of development policies and the density and diversity of public-private institutions in voivodships, on the one hand, and relatively high rates industrial restructuring, participation in direct privatization (especially via MEBOs), SME creation, and the reception of FDI on the other.[63]

One clearly cannot overstate the impact on restructuring of a particular administrative law or budgetary indicator. Indeed, voivodships have also been criticized in lacking local accountability via direct elections and sufficient financial resources and autonomy to aid economic restructuring.[64] Nonetheless, despite their limitations, voivodships and gminas have proven to play important roles, less as profound managers of the economy, but rather as agents of institutional experimentation to become active participants and forums for emboldening and reshaping the network ties among firms, banks, and one another. This insight is critical when one considers that the Czech counterparts were literally or figuratively eliminated from playing any role in privatization and restructuring. In their separate but equally detailed and extensive research on the role of voivodships in industrial restructuring, Hausner and Dornisch show how voivodships were able to harness their limited, but nonetheless existing, political and organizational capital to revitalize informational, social and economic links among private and public actors.[65]

First, in exploring their legal roles as founders of many state firms and as overseers of regional development, voivodships were most effective when they focused first on becoming an effective monitor of firms in their jurisdictions. To do so, they combined their relative authority and organizational resources with the social, informational, and human resources of regional banks, firms, consultants, gminas and the local offices of the central tax agency. These initial steps toward pooling diverse sources of knowledge and information became first and foremost a resource for economic actors to expand their portfolios of strategies, collaborators and project

screening capabilities. For instance, when EBRP was launched, the regional banks lacked effective monitoring capabilities. In turn, they began to supplement their deficiencies by participating in regular regional council meetings and accessing the voivod data base, particularly on the firms that were in EBRP and had the voivodship as its founder. In return, the banks began to consider the strategic goals of the voivodship, regional labor bureau, and the tax authority regarding the firms directly and indirectly under their control.

Second, this interaction via information sharing allowed participants to begin to learn about one another's capabilities and interests and define some basic areas to of joint action and risk and resource pooling. For instance, the pilot experience in restructuring firms in EBRP, and in some case becoming co-owners of them, led the Lodz Bank and Voivodship to co-manage a closed World Bank investment fund for initially 20 firms. A tie such as this fortified horizontal links among related public and private actors.

Third, it is vital to note that these developments were gradual and often initiatives failed. But it was the continued presence and efforts of the voivodships and gminas as well as the impulse coming from programs like EBRP and direct privatization that allowed the actors to learn from the failure and recombine pieces of the potential inter-organizational networks. Learning came not simply about how to evaluate a particular project but also from how to define a reasonable set of common projects and how to assess one another's actions and contributions. As Dornisch emphasizes in his analysis of the revitalization of Lodz, a voivodship that went from being a rust belt to one of the most vibrant regions of SME development and restructuring, learning about project selection was intimately connected to learning how to monitor one another and share authority over common assets. Just as private and public actors were assessing the prospects of new projects, they were also gaining experience about what were the most effective roles one another could play.

IV. Concluding Remarks

This essay has had two related arguments. First, it appears that new firms arise via a reorganization of existing inter-firm networks. The existing approaches to transformation and

firm creation have difficulties capturing this process. On the one hand, the depoliticization approaches, based on property rights and Kirznerian views of entrepreneurship, collapse in the face of the failures of the Czech policies and the relative success of Polish policies that limited mass privatization and enhanced the roles of central and regional governments. On the other hand, the fragmentation of a potentially dynamic Czech machine tool network and the collapse of Czech investment funds points to weakness in standard economic-sociology approaches that ignore network change.

Second, an *embedded politics* approach may prove more useful in analyzing restructuring and firm creation, at least in East Central Europe. Its core argument is that networks are socio-political entities, the authority structure of which is constructed by economic and public actors under specific political-institutional regimes. Thus, while reforms in public institutions can destabilize industrial networks and inhibit cooperation between firms and banks (and limiting new firm creation), the interlinked experimental processes of asset restructuring and network reorganization depends largely on the formation of new institutional workout mechanisms that facilitate risk-sharing and continuous, disciplined deliberations among the parties to assets. Since public actors are both constituents to networks and often key players in such institutions, identification of workout institutions comes not simply from reference to laws, but rather from focussing on the ways that public actors, particularly at the regional and local levels, are given the legitimacy and resources to engage firms and explore their roles risk-sharers and initiators and monitors of firm and bank negotiations over restructuring strategies and asset control.

Implicit in this argument is that via network reorganization firm creation depends linking monitoring and learning. At one level, inter-linked firms and banks are attempting to learn how construct new formal and informal methods of mutual monitoring and project selection. This is where asset restructuring is tied to network reorganization. At another level, public actors, be they the central agencies or regional governments, are learning how provide financial and organizational support to firms and banks while experimenting with different ways to monitor the latter. In turn, the embedded politics approach argues that public actors are most effective in combining learning and monitoring, for themselves and for economic actors, when public

policies toward transformation are based on the principles of delegation and deliberation, rather than drawing a bright line between the public and the private or simply providing subsidies.

Table 1: Divergence in Privatization

	Czech Republic	**Hungary**	**Poland**
% of GDP in private Hands (1995)	70%	60%	60%
% of Industrial Output in Private Hands (1995)	93%	65%	60%

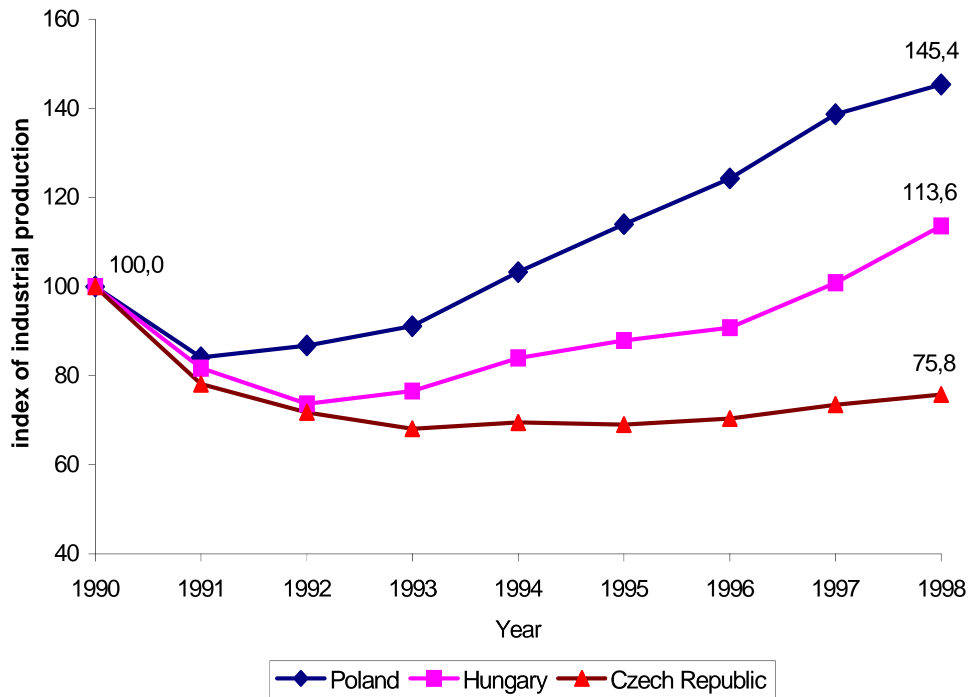
Sources: EBRD (1996), Pohl et al. (1997)

Table 2: Divergence in SME Growth in Manufacturing
Firms with Less than 250 Employees

	Czech Republic (1995)	**Hungary** (1998, 1997)	**Poland** (1997)
Share of Employment (%)	**35%**	**50.2%**	**52.5%**
Share of Sales (%)	**29.5%**	**37%**	**37%**

Sources: Zemplinerova (1998), Polish Foundation for SME Promotion and Development (1999), and Institute for Small Business Development (1999).

FIGURE 1 Industrial Production in the Czech Republic, Hungary, and Poland



Source: OECD (1999) in Spicer et al. (2000)

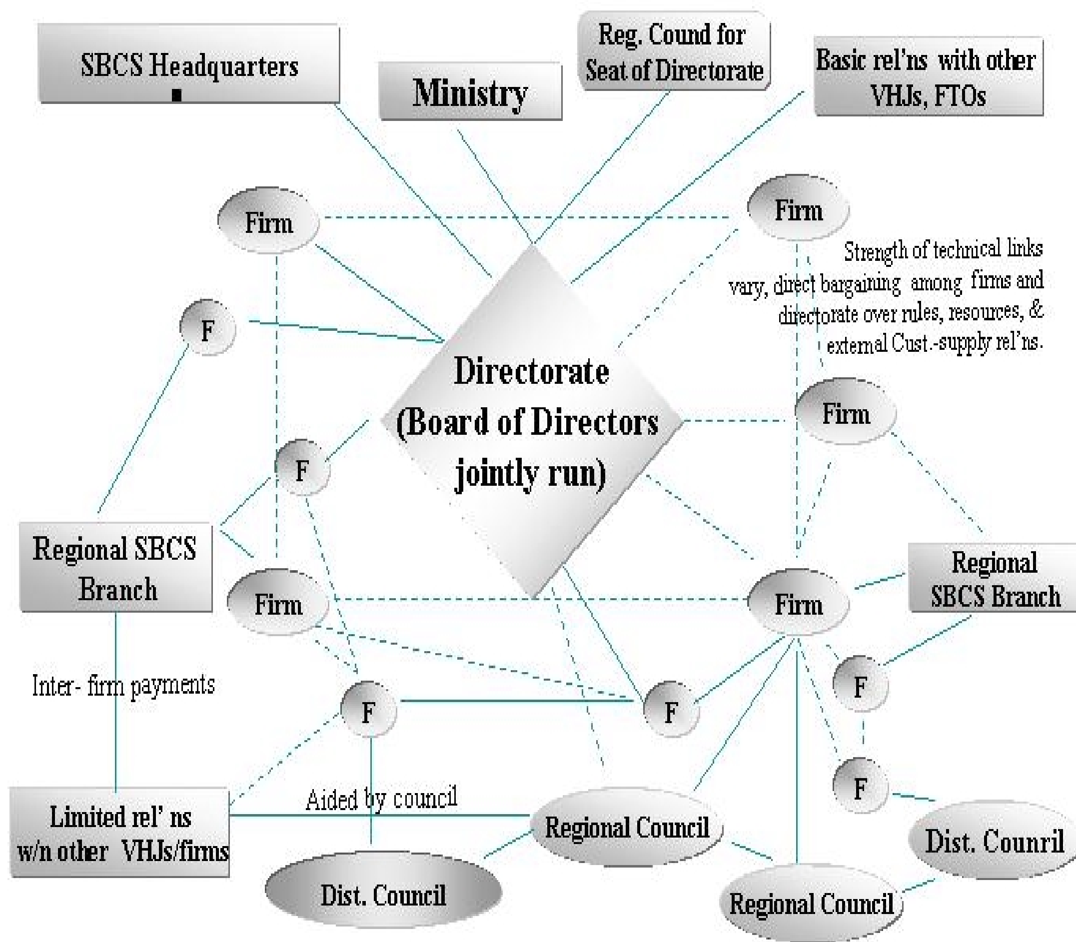
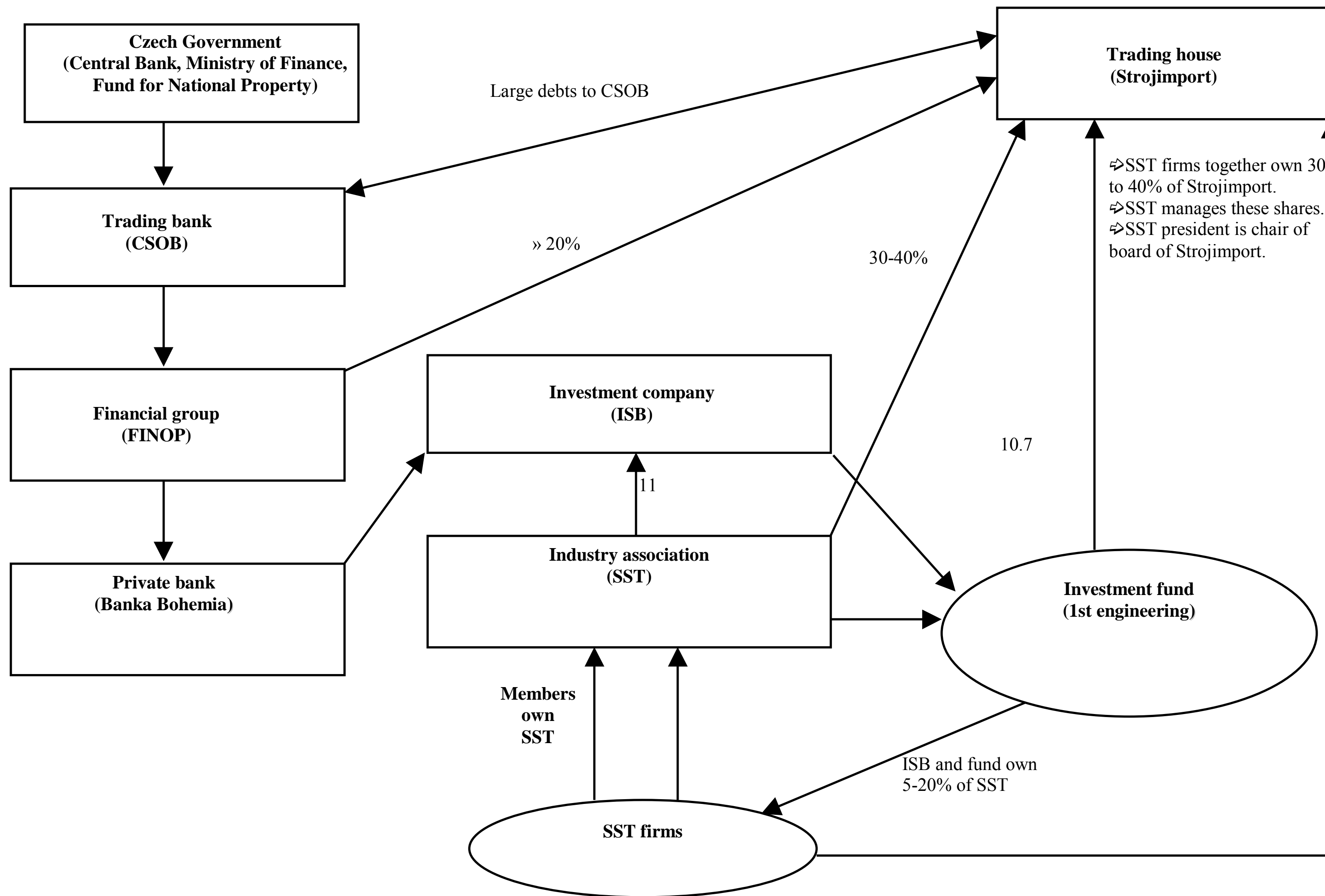


Figure 2: Polycentric Network (eg. TST VHJ)
SBCS Headquarters
Ministry
Reg. Cound for Seat of Directorate
Basic rel'ns with other VHJs, FTOs
Firm
Firm
Strength of technical links vary, direct bargaining among firms and directorate over rules, resources, & external Cust.-supply rel'ns.
F
Directorate (Board of Directors jointly run)
Firm
F
Regional SBCS Branch
Firm
Firm
Regional SBCS Branch
Inter- firm payments
F
F
F
F
Limited rel' ns w/n other VHJs/firms
Aided by council
Regional Council
Dist. Counril
Dist. Council
Regional Council

FIGURE 3 Network Ties in the Czech Machine Tool Industry



Note: Direction of arrow connotes direction of ownership
Percentages connote ownership share.

Adapted from McDermott (1998).

References

Acs, Z.;& Audretsch, D., 1990, *Innovation and small firms*. Cambridge: MIT Press.

_____, 1993, (Eds.), *Small firms and entrepreneurship: An East-West comparison***.** Cambridge: Cambridge University Press.

Acs, Z., D. Audretsch and B. Carlsson, 1991, "Flexible Technology and Firm Size," *Small Busienss Economics*, 3(4): 307-321.

Amsden, A., 1992, "A Theory of Government Intervention in Late Industrialization," in Dietrich Rueschemeyer and Louis Putterman, eds., *State and Market in Development: Synergy or Rivalry?* Boulder: Lynne Reiner.

Amsden, Alice H., Jacek Kochanowicz, and Lance Taylor, 1994, *The Market Meets its Match: Restructuring the Economies of Eastern Europe*. Cambridge: Harvard University Press.

Antal-Mokos, Z. 1998. *Privatisation, politics and economic performance in Hungary*. Cambridge: Cambridge University Press.

Baldersheim, H., M. Illner, A. Offerdal, L. Rose, and P. Swianiewicz, eds., 1996, *Local Democracy And The Processes Of Transformation In East-Central Europe*. Colorado: Westview Press.

Bates, Robert, 1988, "Contra Contractarianism: Some Reflections on the New Institutionalism," *Politics and Society*, 16, 387-401.

Bilsen, V., 1998, "Job Creation, Job Destruction, and Growth of Newly Established, Privatized, and State-Owned Enterprises in Transition Economies: Survey Evidence from Bulgaria, Hungary, and Romania," *Journal Of Comparative Economics,* 26: 429–445.

Blaszczyk, B., 2000, "The Privatization Program and Post-Privatization Ownership Evolution in Poland," unpublished manuscript from the CASE Foundation, Warsaw, Project, "Secondary Privatization: The Evolution of Ownership Structure of Privatized Companies."

Blaszczyk, B. And R. Woodward, eds., 1999, Privatization and Company Restructuring in Poland, Case Reports No. 18, Center for Social and Economic Research, Poland.

Blazek, Jiri, 1993, "Changing Local Budgets in the Czech Republic -- Half Way Over?" Paper presented for the conference, "Regional Organization and Administrative Performance in Central Europe," Prague, September 27-30.

Boycko, M., Shleifer, A., & Vishny, R. 1995. *Privatizing Russia*. Cambridge, MA: MIT Press.

Bratkowski, A., Grosfeld, I., and Rostowski, J., 1999, "Investment and Finance in De Novo Private Firms: Empirical Results from the Czech Republic, Hungary, and Poland," Working Paper No. 236, The William Davidson Institute, The University of Michigan Business School.

Burt, R., 1992, *Structural holes: The Social Structure of Competition*. Cambridge: Harvard University Press.

Camdessus, M. 1995. *Russia's transformation at a turning point*. Address presented at the Conference of the U.S.-Russia Business Council, Washington, DC.

Carlsson, B., 1989, "Small-Scale Industry at a Crossroads: U.S. Machine Tools in a Global Perspective," *Small Busienss Economics*, 1(4): 245-261.

Carlsson, B. and E. Taymaz, 1994, "Flexible Technology and Industrial Structure in the U.S.," *Small Business Economics*, 6(3): 193-210.

Coffee, J. C. 1996. Institutional investors in transitional economies: Lessons from the Czech experience. In R. Frydman, C. W. Gray, & A. Rapaczynski (Eds.), *Corporate governance in Central Europe and Russia*, vol. I: p 111–186. Budapest: Central European University Press.

Coffee, J. 1999, "Privatization and Corporate Governance: The Lessons from Securitites Market Failure," Working Paper No. 158, The Center for Law and Economic Studies, Columbia Law School.

Csaki, G. & Macher, A. 1997. *Ten years of privatization in Hungary*. English-language manuscript.

Cui, Z., 1995, "The Dilemmas of the Soft Budget Constraint: Three Institutions that Challenge the 'Invisible Hand' Paradigm," PhD. Dissertation, Department of Political Science, University of Chicago.

Dabrowski, Janusz M., Michal Federowicz, and Anthony Levitas, 1991, "Polish State Enterprises and the Properties of Performance: Stabilization, Marketization, Privatization," *Politics and Society*, 19(4): 430-437.

Dornisch, David, 1997, "**An Ecology Of Projects: Economic Restructuring And Network Recombination In Post-Socialist Poland," Ph.D. Dissertation, Department of Sociology, Cornell University.**

____, 1999, "Project Networks vs. Networks Of Cooperation: Regional Restructuring And Governance In Post-Socialist Poland," *BISS Public*, 27: 73-103.

____, 2000, "The Social Embeddedness of Polish regional Development: Representative Institutions, Path Dependencies, and Network Formation," mimeo.

Ellerman, D. 1998. *Voucher privatization with investment funds: An institutional analysis*. Working paper No. 1924, Development Economics Unit, World Bank.

European Bank for Reconstruction and Development (EBRD). 1998. *Transition report*: EBRD.

Friedman, D.H., 1988, *The Misunderstood Miracle: Industrial Development and Political Change In Japan*. Ithaca: Cornell University Press.

Frydman, Roman and Andrzej Rapaczynski, 1994*, Privatization in Eastern Europe: Is the State Withering Away?* London: Central Europe University Press.

Gabor, I. R. 1990. "On the immediate prospects for private entrepreneurship and re-embourgeoisement in Hungary," Working paper No. 90.3., Cornell University, Ithaca, NY.

Gilder, G., 1984, *The Spirit Of Enterprise*. New York: Simon and Schuster.

____, 1993, ed., *The Embedded Firm: On the Socioeconomics of Industrial Networks*. London: Routledge.

Grabher, G., & Stark, D. (Eds.). 1997. *Restructuring networks in post-socialism: Legacies, linkages, and localities.* Oxford: Oxford University Press.

Granovetter, M. 1985, "Economic Action And Social Structure: The Problem Of Embeddedness," *American Journal of Sociology*, 91: 481-510.

Gray, C., & Holle, A., 1998a, "Classical Exit Processes in Poland: Court Conciliation, Bankruptcy, and State Enterprise Liquidation," in Balcerowicz, Gray and Hoshi, eds., *Enterprise Exit Processes in Transition Economies*. Budapest: CEU Press.

____, 1998b, "Poland's Bank-led Conciliation Process," in Balcerowicz, Gray and Hoshi, eds., *Enterprise Exit Processes in Transition Economies*. Budapest: CEU Press.

Haggard, S. and R. Kaufman, 1992, "The State in the Initiation and Consolidation of Market-Oriented Reforms," in D. Rueschemeyer and L. Putterman, eds., *State and Market in Development: Synergy or Rivalry?* Boulder: Lynne Reiner.

____, 1995, *The Political Economy of Democratic Transitions*. Princeton: Princeton University Press.

Hayri, A., & McDermott, G. A. 1998. The network properties of corporate governance and industrial restructuring: A post-socialist lesson. *Industrial and Corporate Change*, 1: 153-193.

Hausner, J., Kudlacz, T., and Szlachta, J., 1995*, Regional and Local Factors in the Restructuring of Poland's Economy*. Krakow: Krakow Academy of Economics.

____, 1997, "Restrcuturing in South-Eastern Poland," in G. Grabher, & D. Stark (Eds.), *Restructuring networks in postsocialism: Legacies, linkages, and localities.* Oxford: Oxford University Press.

____, 1998, "Regional Differentiation of Factors Conditioning the Growth of Innovativeness in Poland's Economy," in Domański, ed. *Emerging Spatial and Regional Structures of an Economy in Transition*. Warszawa: Wydawnictwo Naukowe PWN

Herrigel, G. 1996. *Reconceptualizing the sources of German industrial power*. New York: Cambridge University Press.

Hoshi, I, J. Mladek, and A. Sinclair, 1998, "Bankruptcy and Owner-Led Liquidation in the Czech Republic," in Balcerowicz, Gray, and Hoshi, eds., *Enterprise Exit Processes in Transition Economies*. Budapest: CEU Press.

Institute for Small Business Development, 1999, *State of Small and Medium Sized Business in Hungary*. Budapest: Institute for Small Business Development.

Jacoby, W., 2000, *Imitation And Politics: Redesigning Germany*. Ithaca: Cornell University Press.

Jarosz, M., ed., 1996, *Polish Employee-Owned Companies in 1995*. Warsaw: Institute of Political Studies, Polish Academy of Sciences.

____, 1999, *Direct Privatization: Investors, Managers, and Employees*. Warsaw: Institute of Political Studies, Polish Academy of Sciences.

Jezek, Tomas, 1989, "The Assumptions of Symmetry as a Methodological Problem of Comparative Organizational and Society Analysis," Internal Working Papers, Prognosticky ustav, CSAV.

Johnson, S. and G. Loveman, 1995*, Starting Over In Eastern Europe : Entrepreneurship And Economic Renewal*. Boston: Harvard Business School Press.

Johnson, S., J. McMillan, and C. Woodruff, 2000, "Entrepreneurs and the Ordering of Institutional Reform," *Economics of Transition*, 8(1): 1-36.

Johnson, S. and Shleifer, A., 1999, "Coase vs. The Coasians: The Regulation and Development of Securities Markets in Poland and the Czech Republic," Working Paper, Social Science Research Network.

Kale, P, H. Singh, and H. Perlmutter, 2000, "Learning And Protection Of Proprietary Assets In Strategic Alliances: Building Relational Capital," *Strategic Management Journal*, 21: 217-237.

Kirzner, I. 1973. *Competition and entrepreneurship*. Chicago: University of Chicago Press.

_____, 1997, Entrepreneurial Discovery and the Competitive Market Process: An Austrian Approach, *Journal of Economic Literature*, Vol. XXXV, March, pp. 60–85.

Klaus, V. and T. Jezek, 1991, "Social Criticism, False Liberalism, and Recent Changes of Czechoslovakia," *East European Politics and Society*, 5(1): 26-40.

Klaus, V. and D. Triska, 1989, "The Economic Center, Reform and Equilibrium," *Czechoslovak Economic Digest*, 2: 34-56.

Klaus, V., and D. Triska, 1994, "Review Article of Janos Kornai's *The Socialist System:_The Political Economy of Communism*," *Buchs*, Budapest, October.

Kogut, B., 2000, "The Network as Knowledge: Generative Rules and the Emergence of Structure," *Strategic Management Journal*, 21: 405-425.

Kogut, B., & Spicer, A. 1998. *Chains of embedded trust: Institutions and capital market formation in Russia and the Czech Republic*. Unpublished manuscript.

Kogut, B., & Zander, U. 1992. Knowledge of the firm, combinative capabilities, and the replication of technology. *Organization Science*, 3: 383-397.

Kornai, J. 1980. *Economies of shortage*. Amsterdam: North Holland.

____, 1990, *The Road to Economic Freedom*. New York: Norton.

Kotrba, J., 1994, "Czech Privatization: Players and Winners," CERGE-EI Working Paper #58.

Larson, A., 1992, "Network Dyads in Entrepreneurial Settings: A Study of the Governance of Exchange Relationships," *Administrative Science Quarterly*, 37: 76-104.

Levitas, A. 1994. Rethinking reform: Lessons from Polish privatization. In V. Milor (Ed.), *Changing political economies: Privatization in post-communist and reforming communist states*: p 99-114. London: Lynne Rienner.

____, 1999, The Political Economy of Fiscal Decentralization and Local Government Finance Reform in Poland 1989-99, Research Triangle Institute, unpublishe manuscript.

Lieberman, I. 1997. Mass privatization in comparative perspective. In I. Lieberman, S. Nestor, & R. Desai (Eds.), *Between State And Market: Mass Privatization In Transition Economies:* p 1-18. Washington, DC: World Bank.

Lizal, L., M. Singer, and J. Svejnar, 1994, "Manager Interests, Breakups, and Performance of State Enterprises in Transition," CERGE-EI Working Paper # 51.

Locke, R., 1995, *Remaking The Italian Economy: Local Politics And Industrial Change In Contemporary Italy*. Ithaca, NY: Cornell University Press.

Marshall, A., 1923, *Industry And Trade : A Study Of Industrial Technique And Business Organization, And Of Their Influences On The Conditions Of Various Classes And Nations*. London : Macmillan.

McDermott, G. 1997. Renegotiating the ties that bind: The limits of privatization in the Czech Republic. In G. Grabher, & D. Stark (Eds.), *Restructuring networks in postsocialism: Legacies, linkages, and localities.* Oxford: Oxford University Press.

McDermott, G. 1998. *The Communist Aftermath: Industrial Networks And The Politics Of Institution-Building In The Czech Republic*. Doctoral dissertation, MIT, Cambridge, MA.

McDermott, G., 2001, *Embedded Politics: Industrial Networks and the State in Post Communism*. Michigan University Press: Ann Arbor. (Forthcoming).

McDermott, G. and M. Mejstrik, 1992, "The Role of Small Firms in the Industrial Development and Transformation of Czechoslovakia," *Small Business Economics*, 4(3) pp. 179-200.

Moon, C. and R. Prasad, 1994, "Beyond the Development State: Networks, Politics, and Institutions," *Governance: An International Journal of Policy and Administration*, 7(4): 360-386.

Montes-Negret, F. And Papi, L., 1996, "The Polish Experience in Bank and Enterprise Restructuring," Financial Sector Development Department, World Bank, unpublished manuscript.

Moss, D. A., 1996a, *Socializing Security: Progressive-Era Economists and the Origins of American Social Policy.* Cambridge: Harvard University Press.

____, 1996b, "Government, Markets, and Uncertainty: An Historical Approach to Public Risk Management in the United States." Harvard Business School Working paper #97-025, October.

____, 1998, "Limited Liability and the Birth of American Industry: Theory Meets History," Harvard Business School Working Paper #98-079, March.

Murrell, P. 1992. Conservative political philosophy and the strategy of economic development. *East European Politics and Society,* 6: 3-16.

Murrell, P. and M. Olson, 1991, "The Devolution of Centrally Planned Economies," *Journal of Comparative Economics*, 15: 239-265.

Nellis, J. 1998. Time to rethink privatization in transition economies? Discussion paper no. 38, International Finance Corporation,

Nellis, J. 1999. Time to rethink privatization in transition economies?" *Finance and Development*, June: 16-19.

Nelson, R. (Ed.). 1993. *National innovation systems: A comparative analysis*. New York: Oxford University Press.

Nelson, R., & Winter, S. 1982. *An evolutionary theory of the firm*. Cambridge, MA: Belknap Press of Harvard University.

Nohria, N. and R. G. Eccles, eds., 1992, *Networks and Organizations: Structure, Form, and Action*. Boston: Harvard University Press.

North, D. 1990. *Institutions, institutional change and economic performance*. Cambridge: Cambridge University Press.

Nuti, D.M., 1999, "Employee Ownership in Polish Privatizations," in Hare, Batt, and Estrin, eds., *Reconstituting the Market: The Political Economy of Microeconomic Transformation*. Amsterdam: Harwood Academic Publishers.

OECD Economic Surveys, 1996, *The Czech Republic*, Paris: OECD.

Olson, M., 1992, "The Hidden Path to a Successful Economy," in Christopher Clague and Gordon C. Rausser, eds., *The Emergence of Market Economies in Eastern Europe*. Cambridge: Blackwell Publishers.

OECD, 1996, *Transition at the local level : the Czech Republic, Hungary, Poland, and the Slovak Republic.* Paris: OECD.

Organization for Economic Cooperation and Development (OECD). 1998a. *Czech Republic*. Paris: OECD.

Organization for Economic Cooperation and Development (OECD). 1998b. *Economic surveys: Poland 1997-1998*. Paris: OECD.

Organization for Economic Cooperation and Development (OECD). 1999. *Main economic indicators*. CD-ROM, OECD,

Ostrom, Elinor, 1990, *Governing the Commons: The Evolution of Institutions for Collective Action*. New York: Cambridge University Press.

Ostrom, Elinor, 1995, "Self-organization and Social Capital," *Industrial and Corporate Change*, 4(1), pp. 131-159.

Peng, M., & Heath, P. S. 1996. The growth of the firm in planned economies in transition: Institutions, organizations and strategic choice. *Academy of Management Review*, 21: 492-528.

Piore, M., & Sabel, C. 1984. *The Second Industrial Divide*. New York: Basic Books.

Pistor, K., 1999, "The Regulatory Framework for Equity Markets in Transition Economies," Working Paper, Social Science Research Network.

Pistor, K., & Spicer, A. 1997. Investment funds in mass privatization and beyond. In I. Lieberman, S. Nelson, & R. Desai (Eds.), *Between state and market*: Mass privatization in transition economies: Washington, DC: World Bank.

Pohl, G., R. Anderson, S. Claessens, and S. Djankov, 1997, "Privatization and Restructuring in Central and Eastern Europe: Evidence and Policy Options," World Bank Technical Paper No. 368, The World Bank, Washington D.C.

Polish Foundation for Small and Medium Enterprise Promotion and Development, 1999, *Report on the Condition of the Small and Medium-Size Enterprise Sector in Poland for the Years 1997-1998*. Warsaw: PAB-Font.

Powell, W. 1990. Neither market nor hierarchy: Network forms of organization. In L. L. Cummings & B. M. Staw (Eds.), *Research in organizational behavior*, vol. : 295-336. Greenwich, CT: JAT Press.

Powell, W., DiMaggio, P. 1991. Introduction. In W. Powell & P. DiMaggio (Eds.), *The new institutionalism in organizational analysis*: Chicago: University of Chicago Press.

Prokop, Jane, 1995, "Industrial Conglomerates, Risk Spreading, and the Transition in Russia," *Communist Economies & Economic Transformation*, 7(1), pp. 35-50.

____, 1996, *Marketization in Russia's Regions, 1990-1994*, Doctoral Dissertation, Department of Government, Harvard University.

Putnam, Robert, R. Leonardi, and R. Nanetti, 1993, *Making Democracy Work: Civic Traditions in Modern Italy*. Princeton: Princeton University Press.

Pyke F. and W. Sengenberger, 1992, eds., *Industrial Districts and Local Economic Regeneration*. Geneva: Institute for Labour Studies.

Ragin, C. 1987. *The comparative method: Moving beyond qualitative and quantitative strategies*. Berkeley: University of California Press.

Rowley, T., D. Behrens, and D. Krackhardt, 2000, "Redundant Governance Structures: An Analysis of Structural and Relational Embeddedness in the Steel and Semiconductor Industries," *Strategic Management Journal*, 21: 369-386.

Sabel, C., 1992, "Studied Trust: Building New Forms of Co-operation in a Volatile Economy," in Frank Pyke and Werner Sengenberger, eds., *Industrial Districts and Local Economic Regeneration*. Geneva: Institute for Labour Studies.

____, 1993, "Constitutional Ordering in Historical Perspective," in Fritz Scharpf, ed., *Games in Hierarchies and Markets*. Westview Press.

____, 1994, "Learning by Monitoring: The Institutions of Economic Development," in N. Smesler and R. Swedberg, eds., *The Handbook of Economic Sociology*. Princeton: Princeton University Press.

Sabel, C. and J. Zeitlin., 1997, "Stories, Strategies, Structures: Rething Historical Alternatives to Mass Production," in C. Sabel and J. Zeitlin, eds*., Worlds of Possibility: Flexibility and Mass Production in Western Industrialization*. Cambridge: Cambridge University Press.

Sachs, J., 1990, "Eastern Europe's Economies," *Economist*, January 13.

_____, 1993. *Poland's Jump To The Market Economy*. Cambridge, MA: MIT Press.

Saxenian, A. 1994. *Regional Networks: Industrial Adaptation In Silicon Valley And Route 128*. Cambridge, MA: Harvard University Press

Schumpeter, J. 1934. *The Theory Of Economic Development: An Inquiry Into Profits, Capital, Credit, Interest, And The Business Cycle*. Cambridge, MA: Harvard University Press.

Seleny, A., 1993, *The Long Transformation: Hungarian Socialism, 1949-1989*. PhD. Dissertation, Department of Political Science, MIT.

Sengenberger, W., G. Loveman, and M. Piore, 1990, (Eds.), *The Re-Emergence Of Small Enterprises : Industrial Restructuring In Industrialised Countries*. Geneva, Switzerland: International Institute for Labour Studies.

Shleifer, A., & Vishny, R. 1994. Privatization in Russia: First steps. In O. Blanchard, K. Froot, & J. Sachs (Eds.), *The transition in Eastern Europe: Restructuring*, 2: 137-164. Chicago: University of Chicago Press.

Spicer, A., G. McDermott, and B. Kogut, 2000, "Entrepreneurship and Privatization in Central Europe: The Tenuous Balance Between Destruction and Creation*," Academy of Management Review*, Vol. 25, No. 3, pp. 630-649.

Stark, D., 1986, "Rethinking Internal Labor Markets: New Insights form a Comparative Perspective," *Amercian Sociolgical Review*, 51: 492-504.

____, 1989, "Coexisting Organizational Formsin Hungary's Emerging Mixed Economy," in Nee and Stark (eds.), *Remaking the Economic Institutions of Socialism*. Stanford: Stanford University Press.

____, 1996, "Recombinant Property in East European Capitalism," *American Journal of Sociology*, 101:993-1027.

____, 1999, "Ambiguous Assets for Uncertain Environments: Heterarchy in Postsocialist Firms," in Dammagio, Stark, and Westney, eds., *The Future of the Firm: The Social Organization of Business*. Princeton, NJ: Princeton University Press. Forthcoming.

Stark, David, and Laszlo Bruszt, 1991, "Remaking the Political Field in Hungary," *Journal of International Affairs*, 45(1), pp. 201-246.

____, 1998, *Post-Socialist Pathways: Transforming Politics and Property in Eastern Europe*. New York: Cambridge University Press.

Stiglitz, J. 1994. *Whither socialism?* Cambridge, MA: MIT Press.

Stiglitz, J. 1999. *Whither reform? Ten years of the transition*. Keynote address, World Bank Annual Conference on Development Economics, Washington, DC.

Stiglitz, Joseph and Andrew Weiss, 1981, "Credit Rationing in Markets with Incomplete Information," *American Economic Review*, 71, pp. 393-410.

Szelenyi, I., 1988, *Socialist Entrepreneurs*. Cambridge: Polity Press.

Szelenyi, I. 1989. Eastern Europe in an epoch of transition: Toward a socialist mixed economy. In D. Stark & V. Nee (Eds.), *Remaking the economics institutions of socialism*. Stanford, CA: Stanford University Press.

Uzzi, B. 1996. The sources and consequences of embeddedness for the economic performance of organizations: The network effect. *American Sociological Review*, 61: 674-698.

Uzzi, B. 1997. Social structure and competition in interfirm networks: The paradox of embeddedness. *Administrative Science Quarterly*, 42: 35-67.

Van Wijnbergen, S. 1997. On the role of banks in enterprise restructuring: The Polish example. *Journal of Comparative Economics*, 24: 44-64.

Vlacil, J., Hradecka, I., Mazelkova, I., & McDermott, G. 1996. *Politics, skills, and industrial restructuring*. Working paper no. 96:8, Sociologicky ustav, AV CR.

Walder, A. 1994. Corporate organization and local government property rights in China. In V. Milor (Ed.), *Changing political economies: Privatization in post-communist and reforming communist states:* London: Lynne Rienner.

Wittenberg, Jason, 1997, "The 1994 Hungarian Election in Historical Perspective, in G. Toka and Z. Enyedi, eds., *The 1994 Election to the Hungarian National Assembly*. Berlin: Sigma. Forthcoming.

Woodruff, D., 1999, *Money Unmade: Barter and The Fate Of Russian Capitalism*. Ithaca: Cornell University Press.

World Bank Development Report 1996, *From Plan to Market*. New York: Oxford University Press.

World Bank. 1999. *Czech Republic: Capital market review*. Washington, DC: World Bank.

Zemplinerova, 1998, “Malé podniky v ekonomice a jejich financování” (Small firms in the economy and its financing), unpublished manuscript, CERGE-EI, Prague.

Endnotes

I.

[1] For reviews of the debate, see Piore and Sabel (1984), Acs and Audretsch (1990), Sengenberger, Loveman, and Piore (1990), and Pyke and Sengenberger (1992). In general, the debate dates back to the works of Schumpeter (1934) and Marshall (1923).

[2] For the former, see Kirzner (1973, 1997) and Gilder (1984). For the latter, see especially, Piore and Sabel (1984), Powell (1990), Burt (1992), Sengenberger, Loveman, and Piore (1990), Locke (1995), Herrigel (1996), and Saxenian (1994). For an insightful analysis and overview of the network-entrepreneurship link in the organizational theory literature, see Larson (1992).

[3] For an East-West comparison of industrial structures, the role of scientific management, and the potential for SMEs in industrial restructuring, see Acs and Audretsch (1993) and McDermott and Mejstrik (1992). Whereas SMEs accounted for about 1% of industrial employment in communist Czechoslovakia, SMEs comprised about 10% of industrial employment in Hungary and Poland.

[4] See, in particular, Kirzner (1973, 1997), Johnson and Loveman (1995), Boycko, Shleifer, and Vishny (1995), Sachs (1990, 1993), and North (1990) for these views on firm and institutional creation. For a review of these and other similar works on this issue, see Spicer, McDermott, and Kogut (2000).

[5] For general discussions of the relationship between firm creation, innovation, and networks, see the debates between Burt (1992) and Coleman (1990) as well as Granovetter (1985), Larson (1992), Powell (1990), and the special issue of Strategic Management Journal (January 2000). The work of David Stark (see below) is one of the few conscious efforts to incorporate this literature into the East-Europe debate.

[6] See Olson (1992), Murrell and Olson (1991), Boycko et al. (1995), Shleifer and Vishny (1994), Frydman and Rapaczynski (1994), Sachs (1990), Camdessus (1995), and World Bank (1996). Depoliticization is also evident in the works associated with developmental statists. See Amsden (1992), Amsden et. al. (1994), Haggard and Kaufman (1992, 1995), and Moon and Prasad (1994).

[7] See McDermott (1998, 2001) for a discussion of the depoliticization approach as it appears in various schools of thought, including economics, rational choice, and developmental statism.

[8] Discussions on the formation of policy and the conditions in the CSFR and CR and on the optimal conditions for reforms in general can be found in McDermott (2001, Chapter 3), Hayri and McDermott (1998), OECD (1996), World Bank (1996), Moon and Prasad (1994), Haggard and Kaufman (1992, 1995) and Amsden et al. (1994).

[9] Note that regarding policies of privatization in the region, I am only concerned with the so-called large privatization programs, and not those focused on shops and restaurants.

[10] For discussions of the different social, political, and economic conditions and policies in Poland and Hungary see World Bank (1996), Frydman and Rapaczynski (1994), Dabrowski et al. (1992), Levitas (1994), Stark (1992), Stark and Bruszt (1991, 1998), Ekiert and Kubik (1999), Wittenberg (1997, 1999), and Antal-Mokos (1998).

[11] Again, see McDermott (1998, 2001) for an extensive discussion of this view. See also, Boycko, et al., 1995, Schleifer and Vishny (1994), Sachs (1991), Camdessus (1995) and Frydman and Rapaczynski (1994).

[12] The clearest connections are made in Boyco et. al. (1995), Sachs (1991) and Johnson and Loveman (1995).

[13] Kirzner (1997:68).

[14] Jezek (1989), Klaus and Jezek (1991) and Klaus and Triska (1989).

[15] See, for instance, Frydman and Rapaczynski (1994), Boycko et al. (1995), World Bank (1996), Nellis (1999), Camdessus (1995), EBRD (1995).

[16] See, for instance, Boycko et al (1995), Rapaczynski and Frydman (1994), Nellis (1999), and World Bank (1996).

[17] For U-turns by its advocates, see World Bank (1999), Sachs (1999), Johnson and Shleifer (1999), and Nellis (1999). For other critiques, see Coffee (1995, 1999), Spicer (et al. 2000), and McDermott (1997, 2001).

[18] See Johnson and Shleifer (1999) and Coffee (1999).

[19] Although surveys by the EBRD (1995) and OECD (1996) show Czech SMEs having a greater share of employment and GDP, most of the growth in Czech SMEs were in trade, tourism and some services. (Zemplinerova (1995, 1998). These are hardly sources of long-term growth and stability. Moreover, mainstream studies of SMEs focus on the manufacturing sectors. (Acas and Audretsch (1990, 1993)

[20] While some may argue that it is problematic to compare the Czech 1995 SME data with the Polish and Hungarian 1997-98 SME data, I would argue that such a comparison should give a comparative advantage to the Czechs,

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especially for advocates of the depoliticization model. First, 1995 marks the greatest divergence between the CR and Poland and Hungary in terms of private sector shares of GDP and industrial output. Second, 1994-95 was the period of strongest GDP growth for the CR, with the later years, especially 1997-99, seeing negative growth. In turn, both factors would in many ways tend to overstate the growth of SME share relative to other years.

[21] The idea here is that the ability of the Hungarians and Poles to sell off many of their banks in the mid-1990s made them more efficient. There are two problems here. First, not only were these sell-offs relatively late in the 1990s, but also the Czech state had minority positions in the main banks by 1994. Second, analyses, though limited in their sample sizes, show that Czech SMEs and start-ups had greater access to credit than their Polish and Hungarian counterparts. See Bratkowski et. al. (1999) and EBRD (1995).

[22] This argument originates from the work of Janos Kornai (1992).

[23] See in particular Chapters…..

[24] Bilsen (1998) shows that *de novo* firms in Romania and Bulgaria outperform those in Hungary. A key reason for this result is not in spite of but rather because of Hungary's SME sector and market liberalization are at later stages of development. That is, whereas Romanian and Bulgarian firms can reap quick growth benefits by simply entering sectors where there are few firms, Hungary's initial rapid growth in SMEs filling the void in markets already passed, causing the performance Hungarian new firms to depend in many ways on the restructuring of existing state firms and institutional development.

[25] The notable works on this are Gabor (1989, 1990), Szelenyi (1988), Seleny (1991) and Stark (1986, 1989).

[26] See, for instance, Granovetter 1985; Nohria and Eccles 1992; Powell 1990; Uzzi 1996, 1997; Rowley, Behrens, and Krackhardt 2000, Kogut 2000, and Kale, Singh, and Perlmutter (2000). For analysis on the relationship between different types of networks and entrepreneurship, see Larson (1992) and Burt (1992).

[27] Stark 1986, 1996, 1999; Stark and Bruszt 1998; Grabher and Stark 1997.

[28] See World Bank (1999), Coffee (1995), and McDermott (2001, Chapters 3 and 4) for analyses of the collective action problem that the dominant funds and banks face in investing into firms.

[29] See McDermott (2001, Chapter 3).

[30] Bratkowski, Grosfeld, and Rostowski 1999, Johnson, McMillan, and Woodruff 2000, Jarosz 1999.

[31] For work on the former USSR, Poland, GDR, and Hungary, see, for instance, Prokop (1996), Woodruff (1999), Dornisch (1999), Jacoby (2000), Seleny (1993), Szelenyi (1988), and Levitas (1993, 1999). Even within the work of Stark and Bruszt (1998), there are strong suggestions of the interconnection between local political actors and managers (see, for instance, Chapter X).

[32] McDermott, 1997; Hayri and McDermott, 1998; McDermott, 1998, 2001.

[33] See for instance, Saxenian, 1994; Locke, 1995; Piore and Sabel, 1984; Sabel and Zeitlin, 1994; Herrigel, 1996; and Grabher 1993.

[34] For insightful analyses on the development of US institutions for bankruptcy, limited liability, insurance, and lender of last resort, see Cui (1995), Moss(1996a,b, 1998).

[35] The Czech machinery and equipment sector is classified as NACE 29. OKEC-NACE is the Czech classification system that roughly corresponds to SIC. Division 29 includes: (291) manufacture of machinery for the production and use of mechanical power, (292) manufacture of other general purpose machinery, (293) Manufacture of agricultural and forestry machinery, (294) manufacture of machine tools, (295) manufacture of other special purpose machinery, (296) manufacture of weapons and ammunition, (297) manufacture of domestic appliances n.e.c. While most firms discussed below are in NACE 294, some are in 295. As late as 1997, even with the decline of industrial employment and output, these industries and the sector as a whole remained at the heart of Czech manufacturing. For instance, NACE 294 and 295, respectively, accounted for 11% and 29% of sales and X % of employment within NACE 29. NACE 29 as a whole accounted for almost 15% of total manufacturing employment (the largest of the 11 sectors in manufacturing) and about 12% of total manufacturing value-added (second only to food processing). See publications and data by Ministry of Industry and Trade of the Czech Republic, 1998, at http://www.mpo.cz.

[36] For a brief history of the Czech machine tool industry, see McDermott (2001, Ch. 2).

[37] See, for instance, Piore and Sabel (1984), Herrigel (1996), Friedman (1988), Carlsson (1989), Carlsson and Taymaz (1994), Acs, Audretsch and Carlsson (1991), and Acs and Audretsch (1990).

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[38] The following analysis of the machine tool network is based on McDermott (1998, 2001, Chapters 2 and 5). An analysis of other branches that possess tihgtly integrated, hierarchical networks can be found in these publications and in Hayri and McDermott (1998).

[39] See, in particular, Rowley et al. (2000), Kogut (2000), Larson (1992), Uzzi (1996), Locke (1995), Burt (1992, 1998), Kale, Singh, and Perlmutter (2000).

[40] See Larson (1992), Rowley et al. (2000), and Burt (1998) for the ways these apparently opposing traits can be optimal for firms in turbulent conditions and entrepreneurial settings.

[41] The variation in the stake held by SST in Strojimport is due to changes in the structure in the firm and to ongoing negotiations about share price. As the network fragmented (see below), SST firms ultimately returned the shares to the state. Also, given the shareholding regulations and dispersion of ownership in the Czech Republic, the 3-20% equity stakes acquired by ISB enabled SST, on behalf of ISB, to gain a seat on the management or supervisory board of the respective firms.

[42] A similar fate met the vocational training system, which severely hurt the ability of member firms to retain existing craftsmen and train new ones Vlacil et al. (1996) show that the combination of the government policy to make training centers self-financing and the liquidity constraints of machine tool firms led to the virtual collapse of vocational training in the industry.

[43] See Hoshi, Mladek, and Sinclair (1998) and McDermott (1997, 1998, 2001).

[44]For a detailed discussion of ZPS and its strategies with various banks, funds, and the insurance company, see McDermott (1998, 2001, Chapter 5).

[45] The problems of spin-offs were common to other industries as well (Hayri and McDermott, 1998). Indeed, econometric analysis shows that there were relatively few cases of Czech industrial spin-offs, and they performed substantially worse than their former parent firms. (Kotrba, 1994; Lizal, Singer, and Svejnar,1994)

[46] See, for instance, Stiglitz and Weiss (1981), Cui (1995), Ostrom (1990), and Bates (1988).

[47] See especially, Bates (1988), Ostrom, (1995), Putnam et al. (1993). Indeed much of the management literature on networks came from those working on strategic alliances. See Larson (1992), Uzzi (1996), Kale, Singh, Permutter (2000), and Kogut and Zander (1992).

[48] Note that even though there was considerable downsizing in the industry, new start-ups would still be hindered by the depression of the industry. Start-ups would have, for instance, few chances to buy or lease equipment and obtain sales.

[49] See Coffee (1999) for an insightful argument about why the issue of law in practice and regulatory regimes may be the crucial issue for capital market development in East-Central Europe.

[50] I am speaking here mainly of Article 19 of the 1981 Law on State enterprises and to a lesser degree the amended 1934 Bankruptcy Act.

[51] See Blaszczyk and Woodward (1999) and Nuti (1999) for data on privatization. As of December 1990, there were 8441 state enterprise. By December of 1996, 5592 enterprises had entered a track of ownership transformation. By this date 662 of these firms had entered the process of the Bankruptcy act.

[52] See Gray and Holle (1998a) and Blaszczyk (2000). I also confirmed this estimate with the research team at CASE Foundation, Warsaw.

[53] See Jarosz (1999), Nuti (1999), and Blaszczyk and Woodward (1999) for details.

[54] Sales could be sold for cash or as an in-kind contribution to an existing company. Alternatively, the assets could be leased with an option to buy to a company established by at least 50% of the employees of the original firm.

[55] This figure is generated from total non-bank privatization revenues through the direct and indirect paths of privatization. See Jarosz, p. 35, Table 4 (1999).

[56] By the end of 1995, leased firms accounted for over 170 thousand employees, whereas firms in indirect privatization accounted for about 158 thousand employees.

[57] There were two major systematic studies of 200 of these firms (across industries and regions) in 1995 and 1998 (Jarosz, 1996, 1999). One drawback has been the slow rate of investment, largely due to the lack of immediate ownership of the assets.

[58] See Dornisch (1997).

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[59] See Jarosz (1999, Chapters 2, 4, 10), Dornisch (1992, 1999) and Hausner, Kudlacz, and Szlachta (1995, 1997, 1998).

[60] See Van Wijnbergen (1997), Gray and Holle (1998b); Dornisch (1997, 2000); Montes-Negret and Papi (1996). I draw on these works for the following paragraphs as well.

[61] See Coffee (1999); Pistor (1999); and Johnson and Schleifer (1999).

[62] See OECD (1996b), Hausner et al (1995, 1998), Baldersheim, Illner, Offerdal, Rose, and Swianiewicz (1996), Blazek (1993), Levitas (1999). The basic structural differences are stark. For instance, the number of Czech municipalities grew by 50% by 1991 to 6237 with an average size of 1700 inhabitants, while Polish gminas maintained most of there integrity (2466 gminas with average size of 15, 000 inhabitants). While Czech and Polish municipalities have similar, proportional financial data, the Polish gminas were given significantly more autonomy on the use of funds and organizational resources to pursue, i.e., investment, infrastructure, regional development, etc. For analyses of Regional Development Agencies in the region, see Halkier, Danson, and Damborg (1998).

[63] On these issues, see OECD (1996b), Hausner et al. (1995, 1997, 1998), Dornisch (1997, 1999, 2000), and Jarosz (1999).

[64] For instance, voivods are essential an arm of the central government, which appoints the governor, controls its budget, and restricts autonomy in teh use of funds. (See Hausner et al. (1995, 1997) , Levitas (1999), OECD (1996b), and Dornisch (1999, 2000).

[65] For the following discussion, see Hausner et al. (1995, 1997), and Dornsich (1997, 1999).

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