Japanese Journal of Political Science 2 (1) 47–66 Printed in the United Kingdom © Cambridge University Press 2001

Informality and Institutional Inertia: the Case of Japanese Financial Regulation

JENNIFER A. AMYX
Department of Political and Social Change, Research School of Pacific and Asian Studies, Australian National University, Canberra ACT 0200 Australia

ABSTRACT

This article examines the case of institutional inertia in Japanese financial regulation, focusing on the reasons why institutions centered on informal modes of organization and interaction proved particularly 'sticky.' The Japanese case serves as a particularly tough test for theories of institutional adaptation and change because even crisis – a time when the costs of inaction tend to far exceed the benefits – failed to produce timely institutional change. The paper argues that informal, exclusionary and opaque relational ties served as a functional substitute for formal regulation and promoted cooperative government-bank relationships in an earlier period. Yet, when the informal attributes of the system began to impede the sound functioning of the financial system, the very opacity of these ties and the informational dynamics underlying them meant that the Diet and the general public were less than fully aware of the extent of dysfunction present as time went on.

Introduction

In recent years, scholars extending economic analysis to political institutions have paid an increasing amount of attention to informal modes of governance. The traditional neoclassical economic view was that markets – characterized by the prevalence of arms-length trading relations and pricing mechanisms – were the most efficient and preferable forms of organization and interaction. Work by Williamson (1973) and others, however, highlighted the relative merits of alternative non-market forms of organization by shifting attention to the costs that attended completing transactions by one institutional mode rather than another. Proponents of the 'new

An earlier draft of this paper was presented at the 1999 Annual Meeting of the American Political Science Association in Atlanta, Georgia. The paper benefited considerably from conversations with Natasha Hamilton-Hart and Daniel Okimoto. The author is also indebted to Masahiko Aoki, Yves Tiberghien, Tetsuro Toya and Barry Weingast for their valuable comments on earlier related work.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

institutional economics' or 'new economics of organizations' approach built on this work as they sought to show how social and political institutions arise as the efficient solution to economic problems. Adopting a cost–benefit frame of analysis, these scholars highlighted the impact of institutions on transaction and information costs and uncovered elaborate implicit or explicit contracts aligning the incentives of actors in high-performing institutions. Institutions were generated out of the need to solve economic problems, such as asymmetric information, or the need to attain competitive advantage within a heavily regulated business environment. Patterned long-term interactions, such as those promoted by informal networks, made reputation serve as a potential enforcement mechanism, supplanting formal rules, supporting commitments, and enhancing cooperation. When informal institutions performed well, they were depicted as operating in 'self-enforcing equilibrium'.

These studies have enlightened our understanding of the factors behind institutional genesis but have been less helpful in explaining the process of institutional change or lack thereof. Implicit in the neo-utilitarian approach is the assumption that institutions are highly adaptable. Inefficient institutions will be weeded out by the marketplace – that is, sub-optimal arrangements will be short-lived because actors profit when more efficient ones are developed.[1] Yet, political scientists have long noted the 'stickiness' of institutions – that is, their failure to change in strict accordance with the level of their utility or dysfunction. Institutional frameworks often linger on long after their inefficient attributes overshadow any efficiency-enhancing aspects. Institutional change is therefore rarely a direct reflection of changes in cost–benefit calculations of relevant actors.

This paper focuses on the case of institutional inertia in Japanese financial regulation. Through an examination of the Japanese case, it attempts to shed light on the reasons why institutions centered on informal modes of organization and interaction may prove particularly 'sticky'. The Japanese case is particularly intriguing because the reversal of economic fortunes upon a virtually constant institutional environment has been so dramatic. After decades of financial system stability, the bursting of a speculative asset bubble in April 1991 devastated the nation's financial sector, leaving banks with massive amounts of non-performing assets. Nearly five decades without a bank failure were interrupted when Hyogo Bank – a regional lender – collapsed in 1995. Full-blown financial crisis hit in 1997, following the collapse of the nation's tenth largest bank and fourth largest securities firm. Prior to an injection of public funds in 1999, the amount of non-performing loans in the Japanese banking sector was estimated at nearly a trillion US dollars and over half of the nation's banks were thought to be technically insolvent. Yet, the same formal structures, informal relational ties, and coordination procedures that were present in the 1950s persisted through 1998. If we adopt a cost–benefit approach to institutional change, how do we explain the failure to shift in Japan from a system of informal

[1] See Granovetter (1992: 234) for a critique of this line of thinking.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

relations-based regulation – long viewed as having efficiency-enhancing characteristics – to a system of formal arms-length rules-based regulation when the former institutional form was clearly dysfunctional?

The Japanese case serves as a particularly tough test for theories of institutional adaptation and change because even crisis – a time when the costs of inaction tend to far exceed the benefits – failed to produce timely institutional change. While some cautioned in earlier periods against assuming that institutional arrangements were optimal simply because their existence correlated with desirable outcomes (Patrick, 1994: 358), there has been little attempt to explain why institutional adaptation or change was not forthcoming once the costs of this institutional framework clearly outweighed the benefits.[2]

This paper argues that the Japanese system of financial regulation that revolved around informal relational ties was particularly effective for achieving rapid economic growth and development. Various 'pieces' of the system – that is, the structure of the Ministry of Finance (MOF), the MOF's relational ties, and its informal coordination mechanisms – fit together with bank governance structures into a coherent functional whole from the mid 1950s to the early 1970s. At their genesis, many of the institutional components and coordination mechanisms possessed efficiency-enhancing attributes. Informal, exclusionary, and opaque relational ties served as a functional substitute for formal regulation and promoted cooperative government–bank relationships. These ties were well suited to the reduction of transaction costs central to development – a process that focused on the mobilization of scarce capital resources into productive investments and prioritized stability over competition. Liberalization and limited deregulation occurred upon a backdrop of capital supply in excess of demand and raised competitive exigencies, however. When capital flowed in and out of Japan and corporations were given the exit option, the informal attributes of the system came to matter in a negative way. The same informal modes of monitoring and coordination between the MOF and banks were incompatible with the different power dynamics required of prudential regulation. These highly dense relational networks had advanced earlier low-level policy changes *within* the developmental paradigm but by their very nature could not survive the transition to a new paradigm requiring clear demarcation between public and private. And, the very opacity of these ties and the information exchanged within them meant that the Diet and the general public were less than fully aware of the extent of dysfunction present as time went on. In this way, the informational

[2] 'A system of economic transactions in which relationships are important has both efficiencies and inefficiencies. Japanese seem to have maximized the efficiencies while limiting the inefficiencies'. Patrick (1994: 365). Patrick notes that the investment of resources into what become relationship-specific sunken costs may promote inertia but asserts that efficiencies override the costs because the competitive market serves as a sanction: when relationships become persistently less efficient over time compared to the alternative, they eventually wither away (Patrick, 1994: 365–6).

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

dynamics underlying these informal institutions led the path dependent nature of the problem to be very large.

The paper makes its argument through an analysis of the structural relations between institutions and actors underlying the relative efficacy of financial regulation in Japan at various points across the post-war period. Three time periods are examined: (1) the high-growth period (mid 1950s–early 1970s), when the state had a clear developmental agenda; (2) the period of initial deregulation and liberalization, which led into the speculative bubble (mid 1970s–1990); and (3) the post-bubble period when regulatory breakdown became most stark (1991–8). The incentives produced by the institutions and informal modes of linkage and coordination are traced through each of the three time periods. Within each section, attention is drawn to the degree of fit between system requirements and the embedded institutional framework of financial governance.

The informal nature of financial regulation in Japan

Until June 1998, the regulation of private sector finance in Japan was entrusted to the Ministry of Finance, an agency simultaneously overseeing the fiscal policy areas of budget making and taxation. Regulatory outputs in Japanese finance reflected bargaining among actors within the context of institutionalized but informal network associations. The Ministry of Finance (MOF) sat at the intersection of these relational networks and a distinctive characteristic of the Japanese system of financial governance was the MOF's overwhelming reliance on these informal ties to achieve policy goals.[3] The ministry's relationships with elected politicians and private sector financial institutions, in particular, affected the MOF's capacity to adapt policies to meet changing needs. Let us examine these two relationships briefly.

While the Diet must approve financial legislation, the structure of the nation's electoral system and paucity of legislative staff long gave politicians incentives to focus their political resources in times of financial system stability on more locally based niches of the economy, such as agriculture, small and medium enterprises, and construction. Financial regulation therefore relied historically on very few pieces of formal legislation. The MOF was entrusted with a high degree of discretion in filling in the details of broad and vaguely worded laws and did this through cabinet ordinances, ministerial regulations, and administrative notices. Instruction of private sector actors through written notifications or informal verbal instructions – a practice known as 'administrative guidance' – was the hallmark of sector regulation.

The All Japan Banking Federation served as one conduit for MOF instruction to banks and represented the industry as a whole on particular issues. Yet, the highly compartmentalized nature of the sector meant significant divergence in interests across the membership and facilitated the development of more particularistic

[3] Although informal ties and coordination mechanisms characterize many different sectors in the Japanese political economy, the financial sector is distinct even within Japan for the density and pervasiveness of these modes of linkage and action.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

relations between the MOF and *individual* financial institutions.[4] Two relations proved particularly key: (1) daily face-to-face contact between employees designated as 'MOF-handlers' (*MOF-tan*) in each financial institution and officials in the MOF's banking and securities bureaus; and (2) the assumption of posts in some private sector financial institutions by retired MOF officials (a practice known as *amakudari* or 'descent from heaven').[5]

The MOF-tan position was initially an unofficial position within banks, created to counter the perceived disadvantages of a system of annual revolving chairmanship of the Federation of Bankers' Associations.[6] The chairman served as the official conduit through which the MOF transmitted administrative guidance, but those banks not holding the chairmanship in a particular year worried about the biased dissemination of pertinent information and unequal representation before the MOF. Such concerns stemmed not only from distrust but also from a lack of confidence in the competence of particular chairmen.[7] Ministry officials likewise harbored doubts about the effectiveness and competence of the rotating federation chairmanship for disseminating critical information in a predictable, constant, and neutral manner to the industry, and therefore were receptive to the development of such particularistic relations (Author interviews with MOF officials, 1998).[8] By the early 1960s, virtually every bank had designated particular employees as 'MOF-tan'. Each was charged with ensuring that his bank was not disadvantaged in the timely receipt of important information from the MOF or in the transmission of information to the MOF.[9] Although MOF-tan visited the ministry daily, most important communication and relationship building with MOF officials took place in after-hours dining, drinking, and golfing together, paid for by the banks.[10] Shared expectations concerning

[4] In addition to a firewall in place between the banking and securities industries, the Japanese banking sector was separated into long-term, ordinary, and trust banking. Further, until 1998, only a single foreign exchange bank (Bank of Tokyo) was permitted. Within the ordinary banking sector, banks were further divided according to size and scope of activity into city or large commercial banks, regional banks and second-tier regional banks. Crossing from one type of banking business into another was strictly prohibited.

[5] Japan's amakudari practice is distinct in a comparative perspective because a bureaucrat's posting after leaving the ministry is not decided by him or herself but by the ministry and its alumni network. Not every bank hires MOF officials. For more on the amakudari phenomenon in the financial sector, see Amyx (1998); Calder (1989); Johnson (1974); and Schaede (1995).

[6] The rotating chairmanship concept arose after the Second World War as part of the movement to democratize the organization of finance.

[7] Mitsubishi Bank had served as the voice of the sector throughout the prewar period and SCAP purges left many young individuals in top posts.

[8] Of course, MOF officials also received free meals and drinks from this arrangement.

[9] Satake (1998: 81) cites 1962 as the year in which the MOF-tan position truly became institutionalized.

[10] All financial institutions maintained hefty expense accounts for such wining and dining of ministry officials. Detailed records of these transactions were maintained as well, since such wining and dining was treated as a tax-deductible expense. MOF officials lacked expense accounts that could be drawn on to cover costs incurred in interaction with private sector actors.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

acceptable limits of such interaction evolved, however (Author interviews with MOF officials and bankers, 1998). MOF officials met with the MOF-tan from each bank, in order, and saw to it that expenses incurred did not vary widely from bank to bank (Author interviews with former MOF Banking Bureau officials, 1998).

The amakudari practice evolved out of the desire by private sector banks for expertise and assistance in negotiating the regulatory landscape, as well as a desire for stronger relations with the MOF. Effectively, the amakudari practice moved a large proportion of labor costs from the public to private sector. The salaries of Japan's public servants were well below those offered for comparable education and training in the private sector, meaning that Japanese bureaucrats were essentially engaged in an incomplete contract. By arranging lucrative positions for ministry officials in the private sector following their tenure in the ministry, the government completed this contract (Aoki, 1988). Furthermore, the amakudari practice complemented the pyramidal promotion structure in the ministry. Individuals who failed to be promoted are placed in positions outside the MOF, but the financial remuneration and status of these private sector positions increased with one's final ranking in the ministry. Thus, each bureaucrat was given an incentive to strive for the top (Aoki, 1988).

The high-growth period (1950s–early 1970s)

Japanese banking policies from the 1950s through the early 1970s revolved around the national objective of long-term economic growth and prioritized the maintenance of stability. Banks mediated nearly all financial flows, funneling high rates of household savings to the corporate sector. Japanese financial markets were heavily regulated and insulated from international financial markets, with free flows of capital into or out of Japan virtually prohibited. Furthermore, low fixed interest rates and credit-rationing policies helped to stimulate investment in targeted industries and supported the export-led growth of this period. Because bank profits flowed primarily from interest rate spreads on loans, export-oriented companies felt little pressure to increase earnings above a level necessary for payment of the interest on loan contracts, and such companies were therefore able to adopt more long-term strategies focusing on expansion of market share.

By refraining from vocal articulation of policy positions on particular financial regulations, the LDP kept debate over private sector financial issues largely out of the Diet and enabled the MOF to focus on growth-oriented rather than redistribution-oriented policies (Mabuchi, 1997: 159). Doing so further provided the opposition with little opportunity to challenge the government's low interest rate ceiling on bank deposits or unfavorable terms of consumer credit – policies that supported the country's economic growth in this period (Mabuchi, 1997: 159).

While the banking sector was heavily regulated in this period, few resources were allocated within the MOF to formal regulatory oversight.[11] Instead, most resources

[11] Evidence for this assertion is found on many different levels including promotion patterns

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

flowed to the areas of budget making and taxation that were more central to the ministry's domestic power base. A low ratio of bank inspectors to banks meant that on-site inspections were conducted only once every two to three years. Inspections focused not on prudential regulation but on ensuring bank compliance with detailed administrative rules, and the inspection itself was not connected directly to bank *supervision*.[12] An unspoken norm concerning advance notification of inspection dates emerged in this period out of mutual recognition by bank and MOF officials of the cost benefits this practice would have (Author interviews with MOF and bank officials). Unannounced inspections disrupted bank business. Further, completion of appropriate documents by bank employees involved a week to ten days of working around the clock – time that MOF officials were made to wait if they did not notify a bank in advance (Yamawaki, 1998: 155).[13] Discreetly obtaining the inspection dates thus became *MOF-tan*'s main duty.

A so-called 'convoy approach' underlay the government's regulation of private sector finance. This approach ensured that no financial sector actor was left behind and that no actor moved forward so fast as to endanger the viability of others. The principle had its origins in an overarching desire for stability, as the nation focused its energy on industrial growth and economic reconstruction. Through the implicit MOF guarantee that no bank would fail, individual depositors were encouraged to entrust their savings with banks, which then could direct the funds into investments benefiting the economy as a whole. Preemption of bank failure also meant stability in the labor market, as it preserved the jobs both of bank employees and those employees of companies whose viability might be endangered if the bank were to go under and their credit lines cut. Notably, the convoy approach also complemented the personnel practice of amakudari. Any bank that failed would be one less potential depository for officials retiring from the ministry.[14]

Components of the convoy approach included strict entry and exit restrictions, segmentation of the banking sector according to specialized business areas, and price

within the ministry, overtime pay rates, numbers of personnel allocated to bureaus, and the allotment of monetary resources to bureaus within the ministry. Individuals on the ministry's elite promotion track might spend one year at most as the head of the Financial Inspections Division before being posted elsewhere.

[12] The main concern of prudential regulation is the solvency of banks (Dewatripont and Tirole, 1994), but MOF officials did not concern themselves with the relationship between equity, debt, and asset riskiness. Rather, MOF inspectors assessed bank assets and left bank auditors to determine amounts to be set aside for loan-loss reserves and write-offs. In other words, the MOF focused on administration (*gyosei*) but not supervision (*kantoku*) (Author interviews with MOF officials and bankers, 1998–9).

[13] Had regulatory authorities carried out more frequent and/or unannounced on-site inspections, banks would also have found it necessary to establish a special office within the bank to deal with such audits (Interviews with MOF officials).

[14] MOF officials always had a wider selection of reemployment options than officials from other ministries but amakudari positions in the banking sector were the most prized because salaries and retirement payments in this sector were the most lucrative. Considerable clout also accompanied such postings.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

controls. The pillar of the convoy approach, however, was a form of solvency support called the 'rescue merger' or *kyusai gappei*. If a particular financial institution showed signs of insolvency and was therefore in danger of falling behind the 'convoy', the MOF arranged a merger behind the scenes with a stronger institution to preclude formal failure. Cooperation by a stronger institution in this era enabled a bank to expand its network of branch offices, something strictly regulated by the MOF but one of the only ways a bank could increase its deposit base and thereby increase competitiveness. The opportunity to circumvent regulatory barriers for profit growth thus served as an effective incentive to cooperate in this period.

Daily communication and contact with banks through the MOF-tan facilitated this whole merger process. In this period, MOF officials also became cognizant of solvency problems at particular banks not through discovery of such problems in the course of formal inspections but by the troubled bank coming forward with problems and seeking the MOF's assistance. MOF officials then often condoned 'interim measures' by ailing institutions as merger arrangements were being orchestrated. These might include minimizing the disclosure of non-performing assets or liquidating portions of their stock portfolios to show profit. In condoning such measures, the ministry avoided potential instability in the system.

With the MOF's implicit guarantee of banks in place, however, any bank entering financially troubled waters faced real moral hazard. Stockholders and management alike have virtually nothing to lose in seeking out high-risk high-return investment opportunities when banks face large losses and stockholder equity nears zero or becomes negative. In such cases, an active strategy of 'second-round risk-taking' becomes entirely rational (Scott and Weingast, 1992: 5). Through quietly arranged mergers of troubled banks with stronger ones, however, the ministry lowered incentives for second round risk-taking through early recapitalization and thereby helped decrease the chance that a bail out would be necessary.[15]

The need to resort to a MOF-orchestrated rescue merger was infrequent in the period of overall growth in the economy, since ailing institutions were the exception rather than the rule. Within this context, private actors played the more prominent role in monitoring loan portfolios. They did so through a so-called 'main bank' system wherein corporations designated one bank from which they procured the largest portion of funds and through which they obtained all financial services.[16] In return for stable credit lines, a corporate borrower 'requested' of its employees that they maintain accounts at the designated main bank for the direct deposit of their salaries, thus providing the bank both with a large source of cheap funds and a high volume of retail business (Scher, 1997: 88–9). The main bank reciprocated through its willingness to alleviate financial difficulties and provide insurance against interest rate risks through buffering fluctuations over time

[15] I thank Barry Weingast for illuminating this point.

[16] Large commercial main banks typically supplied 15–20 per cent of total funding for keiretsu members during the high-growth period (Calder, 1993: 142).

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

The main bank also served as a major stockholder of its corporate loan clients, while requiring these clients to hold bank shares as well.[17] Partial ownership through the holding of shares enabled the main bank to participate in the client's corporate governance and address emerging problems before they became large. Shareholder meetings were not the forums for regular monitoring, however. Scarcity of capital in this period gave main banks the leverage they needed to monitor daily operations. Each main bank had a team of employees assigned to visit daily the premises and major points of operation of large client firms, interact with the financial officers of the corporation, and collect receipts and other pertinent information (Scher, 1997: 104). If problems were detected, the main bank could intercede and demand that a continued lending relationship be predicated on changed management.[18] Restructuring under the main bank's support then enabled companies to alleviate market concern over their financial condition.

A main bank also lent funds to customers for whom it did not serve as a main bank, so the possibility of insufficient oversight by other so-called main banks over their clients was very real. Shirking was mitigated, however, by commonly held expectations that the main bank of a particular borrower would assume the position of junior claimant, bearing a disproportionate burden of any costs associated with that borrower's liquidation (Sheard, 1994b).[19] These shared expectations surrounding the *ex post* handling of claims helped to make the system self-enforcing.[20]

The main bank system was thus a structure of converging interests wherein all banks had incentives to monitor prudently to cut overall monitoring costs. Repeated interaction among players and interlocking incentives reduced transaction costs significantly. A demand for investment funds in excess of capital supply and an

[17] With the dissolution of the zaibatsu (literally, 'financial cliques') under the Anti-Monopoly Law of 1947 also came the abolition of family cross-shareholding practices through holding companies and the mass release of stocks. The ratio of individual shareholders increased dramatically. Without legal measures to defend themselves from hostile takeovers, companies resorted to informal measures by requesting that other companies within their own industrial grouping or *keiretsu* engage in friendly or stable cross shareholding.

[18] The main bank typically required a new management rationalization plan to be drawn up by the corporate client in such cases. Often times, as part of such plans, a main bank official would serve as one of the company's new vice presidents and a number of incumbent vice presidents would be demoted to a position such as senior managing director (Scher, 1997). Aoki (1994) refers to this type of *ex post* intervention as 'contingent governance'.

[19] This willingness of main banks to bear a disproportionate burden of costs in the case of a loan client's financial hardship was arguably facilitated by the provision of seats on the board for bank officials by their major corporate clients. Not only did this offer the potential for greater bank oversight of loan clients, it also assisted banks in finding destinations for those officials skipped over in promotions as they proceeded up the organizational pyramid. According to a 1956 survey, for example, eight large Japanese banks provided 311 directors and executives to large corporations. Yanaga (1968), 56, citing the Ekonomisuto survey of 31 March 1956 in Zentaro Wada (1959) *Nihon Dokusen Shihon no Shotai* (Introduction of Japan's Monopolizing Capital), 109.

[20] The Bank of Japan reinforced this norm, if needed, by placing pressure on the main bank to assume this role.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

insulated financial sector mitigated competitive pressures. Furthermore, the need to monitor only a single financial instrument – commercial loans – kept all bank monitoring costs minimal during this period.[21]

In summary, the informal ties between the MOF and banks, among banks, and between banks and their loan clients contained positive efficiency-enhancing aspects in this high-growth period. The MOF's primary role was as coordinator rather than monitor. When troubles arose, the ministry arranged mergers, utilizing its informal ties with banks. Prudential bank regulation – that is, the monitoring of bank solvency by government authorities – was virtually absent. Nonetheless, the main bank system worked to align bank interests in such a way that fostered responsible lending.

Phased liberalization and the speculative asset bubble (1971–1989)

Critical elements supporting the sound functioning of the financial system in the high-growth period came apart in the 1970s and 1980s in the aftermath of major exogenous shifts in the regulatory environment. The most prominent of these were the shift from a fixed to floating exchange rate system and the shift in industrial structure effected by the oil shocks. The self-enforcing nature of the Japanese main banking system gradually collapsed, as the capital needs of corporations changed, monitoring costs for banks increased, and banks shifted their customer bases.

Deregulation and internationalization gave companies more latitude in their portfolio selections, but brought as well greater risk that companies would enter into new technology or product investments with which they lacked experience. Not only were the costs of monitoring all of these activities higher, the returns were no longer as great for the main banks, for they no longer had a monopoly on provision of financial services for many of their clients. Main banks were therefore no longer adequately compensated for monitoring as they had been in the former insulated environment.

A shift in the customer base for main banks further contributed to the system's breakdown. From the second half of the 1970s, large manufacturing firms lowered their reliance on external funds, leading to a decline in bank borrowing by these firms as a proportion of external funds. In response, banks expanded lending to small and medium-sized enterprises (SMEs). Main bank relationships, however, had always operated differently for smaller firms. Particularly for those firms not listed on the Tokyo Stock Exchange, the costs of obtaining information were high in proportion to profits gained through lending relationships. For this reason, banks substituted collateral – typically in the form of real estate – for monitoring. Thus, in contrast to the high-growth period, large amounts of funds now flowed from large commercial banks to relatively unmonitored clients.

In addition to being undercompensated for monitoring in this period, main

[21] Furthermore, deposit and lending rate regulations prevented banks from raising the price of credit to a level that would alone compensate for the risk of monitoring breakdown.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

banks also simply lacked the ability or training to make prudent lending decisions in a changed environment of surplus capital. Under the rescue merger system, banks never had to bear the full cost of management failures and therefore never developed a protocol for risk management. The huge sums of bank financing of non-banks and the construction and real estate industries reflected this unfamiliarity with risk calculation in lending decisions.

As the informal monitoring mechanisms broke down, the need arose for the MOF to initiate prudential regulation. The MOF failed to introduce prudential regulation in response to the changing opportunity structures, however. Departure from the established system of informal relationally based regulation posed difficulties now that the pattern of institutionalized network relationships had taken hold. Resource flows within the ministry – disproportionately favoring fiscal policy bureaus – were also entrenched by this time. And, the Nakasone administration's administrative reform measures, which placed limits on the number of civil servants hired and on agency budgets, precluded any increase in monitoring resources without a shift in intraministerial patterns of resource allocation.[22]

After the MOF bowed to US pressure to liberalize the interest rates on loans and deposits, the lending and borrowing spread narrowed; yet, many Japanese banks – lacking experience with determining interest rates based on risk calculations – ignored this development in the pursuit of profits. Banks were being told that liberalization would lead to greater profit opportunities and the asset inflation period seemed to present such opportunities. Without adjusting interest rates according to risk and lacking the experience and expertise in risk assessment decisions, however, much money flowed into unsound bubble investments.

The main bank teams once monitoring large client firms on a daily basis had also been transformed by the early 1980s into sales teams trying to persuade firms to borrow despite lack of need (Scher, 1997). Because the implicit guarantee against failure remained in the wake of liberalizing policies, banks did not entertain the possibility of their own bankruptcy. Rising real estate and stock prices increased the value of collateral, encouraging even more expansive lending. From 1986 to 1989, the Tokyo stock market increased sharply, with stock prices in 1989 alone rising by approximately 30 per cent.

[22] Not only did the administrative reform movement preempt increases in monitoring resources, it also cut into existent resources. In 1984, the MOF division responsible for financial institution regulation at the local level, the Finance Division (*zaimubu*), was dissolved and employees from this division moved to the Finance Office (*zaimu jimusho*), where staff totals were also cut (Somucho Nenji Hokoksho [Management and Coordination Agency Annual Report], 1986). As a result, local finance bureaus – which played an important role in the supervision of banks at the local levels – were left with fewer resources at this time of heightened monitoring needs. This was an important development because disposal of bad loans by large banks after the bursting of the bubble would be impeded severely by the simultaneous heavy exposure of smaller financial institutions to the same delinquent borrowers. Although the MOF held the purse strings of the nation, the Budget Bureau's balanced budget principle was aligned with the Management and Coordination Agency's desire to keep a tight rein on government expansion.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

Notably, the function of the *MOF-tan* relations altered significantly with the MOF's failure to obtain passage of stricter disclosure requirements and other more forward-looking measures to be incorporated into the 1981 Banking Reforms, due to lobbying of LDP Diet members by the banks.[23] This rare failure was a major blow to organizational prestige and was attributed within the ministry to insufficient communication with banks leading to miscalculation concerning the types of compromises that would be necessary with these actors (Author interview with former MOF official, 1999). Hereafter, ministry officials viewed relations with the MOF-tan increasingly as a means for obtaining information *from* private sector banking and securities institutions to help determine the mutually acceptable degree, timing, and direction of regulatory changes. With the rising complexity of finance itself and the emergence of new financial instruments, MOF officials also became increasingly reliant in the 1980s on the MOF-tan as sources for technical information. MOF-tan from various financial institutions engaged in a fierce battle to be relied on as the main information source for MOF officials, for the supply of information naturally carried with it leverage.[24]

The MOF's capacity to utilize informal coordination mechanisms as before also altered in this period. The spectrum of competition had expanded, and retail branches no longer provided the same degree of benefits to those cooperating in a MOF-facilitated merger. New and more direct financial incentives for cooperation thus became necessary. The 1986 Deposit Insurance Law amendment, enabled the DIC (established in 1971) to provide financial assistance to institutions rescuing an ailing bank through a merger and was an explicit recognition that liberalization and the internationalization that accompanied it would raise the possibility of some Japanese banks facing difficulties. With the asset inflation of the bubble economy that followed the 1986 revision, however, the asset base of all banks – weak or strong – expanded significantly. The use of deposit insurance was thereby circumscribed in this period, as banks on shaky ground were able to postpone coming to terms with their fiscal difficulties.

In summary, the mode of informal relations-based regulation no longer matched system requirements in this period. By the late 1980s, the foundation for a banking system crisis was firmly in place, as both formal and informal monitoring mechanisms had faltered severely and prudential bank regulation – that is, the

[23] See Rosenbluth (1989) for an account of this event. Rosenbluth cites this development as an example of bureaucrats turning to politicians when the ministry proves unable to reconcile competing interests but does not note the salience of this development to the MOF's relations with private sector financial institutions thereafter.

[24] The nature of the MOF-tan's work required late nights. While some evenings were spent wining and dining ministry officials, most evenings meant staying late in case a MOF official phoned with questions. Each MOF-tan worked to be the one the MOF officials would feel most comfortable calling to ask information. If a MOF-tan was not by the phone when a call came in, the MOF official would undoubtedly call the next MOF-tan on his list and use that individual as an information source regularly thereafter.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

monitoring of bank solvency – remained absent. Yet, the MOF's relational networks increased in density with each decade and continued to play a central role in financial governance.

In the wake of the bubble

The collapse of the speculative asset bubble in 1990–1 imploded the nation's financial sector and left Japanese banks sitting on huge amounts of non-performing loans. Japanese banks held large amounts of shares and the value of these shares factored into capital ratios. Thus, when the stock market plunged, bank capital ratios were also severely affected. Furthermore, a plunge in land prices meant that nearly all of the collateral held by banks had dropped significantly in value.

The standard procedure of resolving problems of financially troubled banks through government-arranged mergers had been effective given heavy industry regulation, a limited number of ailing banks, and a favorable economic climate. In the post-bubble period, however, none of these three conditions held. Financial deregulation lowered incentives for private sector cooperation in such mergers and DIC funds were utilized for the first time in 1991 to aid in a rescue merger. Non-performing loan problems were also no longer restricted to particular banks but extended across the entire sector, and the economic downturn meant greater uncertainty about the implications of undertaking problem loans from another institution. Because of these changes, the MOF's use of the rescue merger began to drag the relatively stronger banks down with the weakest ones. Furthermore, the merger procedure created even larger institutions with severe problems that were then more difficult to permit to fail. A universal institution funded with public funds was necessary to resolve problems of the magnitude now present. Yet, solvency problems continued to be dealt with on an *ad hoc* basis, relying on informal relational ties and the cooperation of industry actors in rescues arranged behind the scenes by the MOF.

Why did the MOF not put forward a plan for the creation of a universal infrastructure to deal with ailing banks? The informal ties with banks, politicians, and other agencies gave MOF officials disincentives to close down the weakest banks and recapitalize the rest. The massive recapitalization necessarily accompanying more aggressive measures would have meant a very unpopular use of tax money. Although the voting public knew little of the true magnitude of the non-performing loan problem in this period, they did know that salaries of bankers were higher than for employees in any other industry. And, bankers were being blamed throughout the press at this time for their many excesses during the bubble period, which had culminated in numerous financial scandals. The speculative bubble left many Japanese bitter over housing prices that had risen to astronomical levels, preventing much of the population from renting – much less buying – anywhere close to their place of employment. Those who already had assets going into the bubble grew extremely rich, but those who had none to begin with became separated more and

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

more from the chance of ever having any. Although asset prices had fallen significantly from their peak in 1992–5, they were still far from pre-bubble levels. Importantly, the LDP also experienced more electoral vulnerability at this time than it had since any period following its initial party formation. After losing control of the Upper House in 1989, the passage of bills other than those related to the budget or foreign affairs was no longer assured.[25] In 1993, the LDP lost its 38 year grip on power.

Bad loans were the underlying cause of the first post-war bank failure in August 1995, when the MOF deemed Hyogo Bank, a regional bank, incapable of returning to financial health on its own. Although a calmly managed failure, international market players began losing confidence in the MOF's capacity to continue to carry out orderly bank closings. In the aftermath of the Hyogo Bank failure, Moody's Investors Service announced that it would use new ratings evaluation criteria that did not take into consideration possible assistance from the government or other companies – as exemplified by the rescue mergers. This criterion essentially discounted the method of solvency support used up to this point by the MOF, and Japanese banks did not fare well in the new rating system.[26] In this same month, an International Monetary Fund (IMF) report criticized the Japanese government's less than aggressive measures to encourage the disposal of bad loans held by Japanese banks.

Also in 1995, the Japan premium – a surcharge on capital procurement in overseas markets by Japanese banks – became a major factor, with many Western banks charging Japanese banks 60 to 80 basis points over the London inter-bank offered rate (LIBOR).[27] In September of the same year, a bond-trading scandal at Daiwa Bank's New York office compounded concerns about Japan's banking system and the informal ties between the MOF and Japanese banks. One result was that the price Japanese banks had to pay for capital on the Eurodollar market rose further to 1 per cent over LIBOR. With the emergence of the Japan premium, national aggrandizement of the Japanese banking sector in the minds of international actors translated into profit losses for individual Japanese banks engaged in international operations. These banks faced difficulty meeting Bank of International Settlements (BIS) capital ratio requirements because, as capital was used to write off bad loans, these banks had to raise more capital and the Japan premium raised the costs of doing so.

Although a 1996 revision of the Deposit Insurance Law approved the use of public funds to support the operations of a Resolution and Collection Bank and a Housing Loan Administration, the institutions targeted for rescue in this case were failing credit unions. MOF officials continued to assure the public that major bank

[25] Bills could be rejected in the Upper House – even if passed in the Lower – and needed a Lower House two-thirds majority to override the Upper House veto. The LDP, however, did not have a two-thirds majority in the Lower House.
[26] Japanese banks received average ratings of D.
[27] Western banks were charged a maximum of 30 basis points at this time.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

failures were not on the horizon and that additional public funding would be unnecessary for bailing out banks. The ministry also tried to alleviate concerns by implementing a five-year period of exception, during which all deposits would be guaranteed. Yet, the DIC remained insufficiently funded to carry through with such a commitment, despite a seven-fold rise in DIC premium rates.

Importantly, MOF officials attempted a shift to prudential regulation from 1996. In this year, the Diet passed legislation to introduce a new system of asset assessment intended to address bank problems *before* banks reached the point of insolvency. The procedure was referred to as the 'Prompt Corrective Action' (PCA) measures (*Soki Zeisei Sochi*). These reforms, included in a package of bills surrounding the Jusen housing and loan bail-out, prescribed write-off and loan-loss reserve guidelines based on banks' self-assessed capital ratios. In doing so, the measures narrowed bank discretion in this area.

The introduction of the PCA measures reflected a change in the framing of the non-performing loan problem within the MOF to a problem centered on banks rather than their borrowers. Upon a backdrop of a well-performing economy, it had seemed prudent to leave banks to their own discretion in determining loan loss ratios. And, any suggestions that the MOF should prescribe levels had previously met with resistance and cries that such bureaucratic meddling ran counter to the government's deregulation agenda. The use of tax money, however, had reordered the ministry's organizational priorities. Now the ministry was the target of unprecedented levels of criticism and voices in the Diet were calling for the 'dismantling' of the MOF. The ministry's need to maintain organizational viability overshadowed any desires to maintain amiable relations with banks. Yet, only MOF officials could make the shift from coordinating regulatory outcomes through entrenched synergistic ties to supervising banks through more detached prudential regulation once a framework to deal with failing financial institutions was in place. Without such an infrastructure in place, arms-length enforcement of the PCA measures would lead to the collapse of numerous banks and undoubtedly spark financial system instability. The establishment of a scheme for dealing calmly and systematically with ailing financial institutions would require public funds, however. And, another request for public funds could only bring greater political wrath on the ministry. Thus, MOF officials continued to rely on informal ties and carry out supervision in such a way as to avoid financial institution failures. In this way, the institutional framework of financial regulation remained intact.

The PCA measures did not take full effect until April 1998 but their legislation marked a turning point in the relationship between banks and the MOF. In the aftermath of the passage of the PCA legislation, many Japanese banks started reaching outside their traditional relational networks to employ foreign financial institutions to tie up non-performing assets in derivatives transactions. In doing so, they sought to mask their problems and preempt orders to carry out PCA measures. Ironically, in doing so, these banks hid the true state of affairs from the MOF but disclosed their

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

problems to market players. Foreign institutions that tied up non-performing loans in derivatives transactions on behalf of Japanese banks allegedly leaked information concerning the real magnitude of the non-performing problem to the market (Author interview with Financial Supervisory Agency official, 1999). This, in turn, contributed to a further downward slide in the value of many Japanese bank stocks. The reputation of banks such as the Long Term Credit Bank and Nippon Credit Bank – later nationalized – thereby declined, leading institutional investors and cross shareholders to abstain from investment and to gradually sell shares in the market. As a result, individual investors and speculators comprised the majority of shareholders by the time that share prices began to plunge in the wake of major bank failures in 1997. This type of information leakage further hampered the MOF's attempts to arrange mergers behind the scenes *before* disclosing bank problems (and their resolution) to the public. By 1997, the market had gained an information advantage over the MOF in many respects.

Meanwhile, international market forces were becoming increasingly salient for Japanese domestic financial outcomes. Although the world had been aware that the magnitude of bad debt problems in the Japanese banking sector was large, the rippling out of the Asian financial crisis led international investors to act on that information and target those countries with banks weighed down by non-performing loans to Southeast Asia. Following speculative attacks on South Korea, investors therefore turned to Japan.[28] Foreigners were net buyers of Japanese stocks from February – July 1997, but became net sellers in August 1997 (Sakakibara, August 1999). This selling increased through September, October, and November. The Nikkei average on the Tokyo Stock Exchange – over 20,000 in June 1997 – plunged to below 16,500 by late October. Upon this backdrop of rapidly declining stock values, the MOF's efforts to arrange rescue mergers broke down further.

In November 1997, Sanyo Securities Co., Hokkaido Takushoku Bank (referred to as 'Takugin') – the tenth largest commercial bank – and Yamaichi Securities Co. – the fourth largest securities firm – collapsed, spurring real financial panic within Japan. Takugin's failure followed the break-down of not just one merger attempt, but a string of unsuccessful efforts by the MOF to wed it to another, healthier bank. MOF support was essential for any prospect of success because Takugin's proposed merger partner – Hokkaido Bank – already suffered from disclosed problem loans greater than 12 per cent of its entire loan portfolio and the business of the two banks overlapped considerably. As Takugin held nearly 1 trillion yen in bad loans, a merger could not succeed without funds from the Bank of Japan. Merger plans were postponed indefinitely, however, when Hokkaido Bank's concerns over the exact amount of loans held by Takugin were not allayed. MOF support was no longer a

[28] Ironically, the amount of loans by Japanese banks to Southeast Asia paled in comparison to the amount of domestic bad debt held by Japanese banks.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

sufficient condition for success. As was feared, the magnitude of bad loans discovered at the bank upon its collapse was of a much larger magnitude than disclosed earlier.

By late November, the Japan premium reached 1 per cent. Many international banks also reduced their credit lines to Japanese banks. The government's inability to engineer the rescue merger of Takugin increased the banking sector's collective exposure to risk and highlighted the limited capacity of informal coordination mechanisms to resolve banking problems.

With the breakdown in these informal institutions of solvency support, credible funding of the DIC suddenly mattered to depositors. In February 1998, legislation passed in the Diet revised the Deposit Insurance Law and provided 30 trillion yen in public funds to stabilize financial institutions. The amendment also extended the scope of the Resolution and Collection Bank (RCB) activities to permit it to take over failed banks as well. This measure thereby facilitated depositor protection for cases in which the MOF was unable to persuade another bank to take over the business of a failed financial institution.

A lack of confidence in Japanese finance and the institutions of financial governance, however, continued to rise. This was exacerbated by arrests from January–March 1998 of MOF and BOJ officials on suspicions of taking bribes. The informal MOF-tan relations that seemingly decreased transaction costs in an earlier period raised costs in this period, as the practice came under scrutiny by both international and domestic actors who had not been privy to the tacit rules underlying these relationships.[29]

The breaking down of the long-standing firewalls between different types of financial institutions was pushed ahead as well, so as to increase both the incentives for merger and number of potential merger partners. For example, trust banks taking over the operations of failed city or regional banks were given preferential treatment under new laws permitting entry into different areas of banking. In return for taking over failing institutions, trust banks not only received public funds but also gained retail banking branches which they had been prohibited from establishing in the past.

Insolvency perils of the long-term credit banks, such as Nippon Credit Bank (NCB) and the Long Term Credit Bank (LTCB), were more difficult to resolve, however. Not only was the scale of these banks' operations huge, but the five-year financial debenture which had served as their primary profit-making source was being phased out as part of the so-called 'big bang' financial reforms. Thus, entry into long-term credit banking by other banks presented no prospect for long-term gains. Potential merger partners emerged for both banks but each backed out in the end, largely because the banks failed to dispel market suspicions that they held bad loans in amounts far exceeding reported amounts. Prior to the Takugin failure, MOF support would have allayed such suspicions. With the failure of Takugin, the MOF's 'insurance regime' was no longer credible.

[29] Some of these 'rules' were already being violated, however, even by insider standards.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

The system of information management carried out by the MOF and the banks and supported by the informal institutions of financial governance continued to break down thereafter, as more and more information concerning the state of individual financial institutions and the financial sector as a whole leaked out. Institutional change would not come about until October 1998, however. Until the summer of 1998, LDP officials made the mistake of believing that, even if financial problems were as bad as the market and international actors claimed they were, that the standard operating procedures utilized by the MOF continued to be adequate and better than anything that might replace them. With the LDP's poor showing in the July Upper House elections, however, the party lost its ability to dominate the legislative process. Opposition party actors as well as backbenchers from within the LDP at last provided a demand for information coming from outside the relational networks. Gathering evidence from foreign financial institutions and former employees of Japanese banks, they argued that the standard modes of problem resolution could not continue to function adequately, given the enormity of the problem (Author interview with opposition party officials, 1999). And, they proved successful in gaining passage of an Opposition-led bill that effectively restructured the institutions of financial governance. In this way, the emergence of both the supply of and demand for policy relevant information was key to overriding the information asymmetry promoted by the opaque relational ties and to bringing about institutional change. While Japan's financial sector problems remain, developments since October 1998 suggest a dissolution of the informal ties linking the MOF with banks and a long overdue shift to formal rules-based prudential regulation in Japanese finance.

Conclusion

This paper has argued that the cooperative synergies between public and private that evolved in the Japanese system of financial regulation had efficiency enhancing effects in the first post-war decades when the domestic financial sector was highly regulated and insulated from outside international pressures. Yet, when the need came for the MOF to play the role of monitor and enforcer rather than coordinator and promoter, these relational ties proved inimical to the very requirements of the new endeavor. The mutually supportive attributes of the informal institutions linking the MOF, banks, and the ruling party became mutually subversive to the sound functioning of the financial sector in the end.

Under the rubric of this main argument, the paper made two sub-points. First, the informal institutions through which coordination between the MOF and banks took place proved inimical to the internationalization of Japanese financial markets. Effective functioning of these institutions was premised on a limited number of participants, each privy to the 'rules of the game'. Commitment mechanisms such as long-term cross shareholding – mechanisms that had supported the success of Japan's financial sector in the past – were also exclusionary relationships. With the

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

internationalization of Japanese finance, particularistic institutions such as the MOF-tan and amakudari could not simply be modified – they had to be eliminated and the institutional status quo remade. A continuation of the same kind of past state involvement was simply incompatible with a heightened prudential regulatory role of the state brought on by internationalization.[30]

Second, portrayal of the informal but institutionalized relations between the government and banks as mere collusion misses much of the picture. These were not relations wholly monopolized by the banks or by MOF officials, but rather a means of pooling interests, solving asymmetric information problems, and establishing a predictable environment through constant communication. In that these relational ties often effectively lowered short-tem transaction costs, they possessed efficiency aspects. Yet, status quo interests were also embedded in these institutionalized relationships. And, the opacity of the informal ties between the MOF and the banks permitted a degree of information management that would have been impossible in a more formal rules-based regulatory system. Furthermore, this opacity exacerbated a loss in confidence once the limits of the MOF's capacity came to light. It was in these ways that informal relational ties connecting the MOF to banks contributed to breakdown.

The shift from a system in which the state's primary role is as promoter of development to one in which its primary role is as regulator required a shift in all of the parts of the system. Prudential regulation requires a different kind of power relationship and clearer demarcation between the government and private sector. Thus, it required not just a shift in goals and priorities but a shift in the very nature of the institutions structuring actor interaction.

References

Amyx, Jennifer (1998), 'Banking Policy Breakdown and the Declining Institutional Effectiveness of Japan's Ministry of Finance: Unintended Consequences of Network Relations', Ph.D. Dissertation, Stanford University.

Aoki, Masahiko (1996), 'Unintended Fit: Organizational Evolution and Government Design of Institutions in Japan', in Masahiko Aoki, Hyung-Ki Kim, and Masahiro Okuno-Fujiwara (eds.), *The Role of Government in East Asian Economic Development: Comparative Institutional Analysis*, New York: Oxford University Press, pp. 232–53.

Aoki, Masahiko (1988), *Information, Incentives and Bargaining in the Japanese Economy*, Cambridge: Cambridge University Press.

Aoki, Masahiko (1994), 'Monitoring Characteristics of the Main Bank System: An Analytical and Developmental View', in Masahiko Aoki and Hugh Patrick (eds.), *The Japanese Main Bank System: Its Relevance for Developing and Transforming Economies*, Oxford: Oxford University Press, pp. 109–41.

Aoki, Masahiko (forthcoming), *Towards Comparative Institutional Analysis*, Cambridge, MA: MIT Press.

Aoki, Masahiko and Patrick, Hugh (eds.) (1994), *The Japanese Main Bank System: Its Relevance for Developing and Transforming Economies*, New York: Oxford University Press.

[30] It is important to note that prudential regulation of the kind we see most recently implemented in Japan was lacking in most advanced industrial countries until the 1980s or early 1990s.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press

Author interviews with Diet representatives, Ministry of Finance officials, former Ministry of Finance officials, Economic Planning Agency officials, Financial Supervisory Agency officials and bankers, 1996–1999.

Calder, Kent (July 1989), 'Elites in an Equalizing Role: Ex-Bureaucrats as Coordinators and Intermediaries in the Japanese Government-Business Relationship', *Comparative Politics*, 379–403.

Dewatripont, Mathias and Jean Tirole (1994), *The Prudential Regulation of Banks*, Cambridge, MA: MIT Press.

Granovetter, Mark (1992), 'The Sociological and Economic Approaches to Labor Market Analysis: A Social Structural View', in Mark Granoveter and Richard Swedberg (eds.), *The Sociology of Economic Life*, SF: Westview Press.

Johnson, Chalmers (1982), *MITI and the Japanese Miracle*, Stanford, CA: Stanford University Press.

Johnson, Chalmers (1974), 'The Reemployment of Retired Government Bureaucrats in Japanese Big Business', *Asian Survey*, 14 (November): 953–65.

Mabuchi, Masaru (1997), 'Financing the Japanese Industries', in Michio Muramatsu and Frieder Naschold (eds.), *State and Administration in Japan and Germany: A Comparative Perspective on Continuity and Change*, New York: Walter De Gruyter.

North, Douglass C. (1990), *Institutions, Institutional Change and Economic Performance*, New York: Cambridge University Press.

Patrick, Hugh (1994), 'The Relevance of Japanese Finance and Main Bank System', in Masahiko Aoki and Hugh Patrick (eds.), *The Japanese Main Bank System: Its Relevance for Developing and Transforming Economies*, New York: Oxford University Press.

Rosenbluth, Frances (1989), *Financial Politics in Contemporary Japan*, Ithaca: Cornell University Press.

Sakakibara, Eisuke (1999), 'The Information War in the Market', *The Daily Yomiuri On-Line*, 5 August.

Satake, Goroku (1998), *Taiken-teki Kanryo-ron (The Bureaucracy Experienced)*, Tokyo: Yuhikaku.

Schaede, Ulrike (1995), 'The 'Old Boy'Network and Government-Business Relationships in Japan', *Journal of Japanese Studies*, 21(2): 293–317.

Scher, Mark (1997), *Japanese Interfirm Networks and their Main Banks*, New York: St. Martin's Press.

Scott, Kenneth and Barry Weingast (1992), 'Banking Reform: Economic Propellants, Political Impediments', Stanford, CA: Hoover Institution.

Sheard, Paul (1994b), 'Main Banks and the Governance of Financial Distress', in Masahiko Aoki and Hugh Patrick (eds.), *The Japanese Main Bank System: Its Relevancy for Developing and Transforming Economies*, Oxford: Oxford University Press, pp. 188–230.

Somucho Nenji Hokokusho (1986) 'Management and Coordination Agency Annual Report', Tokyo: Management and Coordination Agency.

Yamawaki, Takeshi (1998), *Nihon Ginko no Shinjitsu* (The Truth of the Bank of Japan), Tokyo; Diayamonda-sha.

Yanaga, Chitoshi (1968), *Big Business in Japanese Politics*, New Haven: Yale University Press.

https://doi.org/10.1017/S1468109901000135 Published online by Cambridge University Press