

# Multinational Enterprises and Global Capital Markets

# 6

This chapter highlights important developments in the financial environment of contemporary MNEs. Two interrelated themes run throughout. The first concerns global integration, which is reshaping multinational finance and thereby complicating the task of national economic management. Domestic market openness, the development of offshore money markets, international capital movements associated with large macroeconomic imbalances, exchange rate volatility, technological change, and financial innovation are all working to erode the long-standing structures of national finance. Such policy instruments as capital controls, constraints on the establishment of nationwide banking networks, and limitations on ownership linkages between financial and industrial firms have thus come under enormous pressure.

The activities of MNEs both contribute to this pressure and represent adaptations to the resulting structural changes. Policymakers seeking either to secure the economic benefits associated with MNEs or to address their social and political consequences must therefore take into account the existence of increasingly global capital markets. In such an environment, the effects of various policies directed at the performance of MNEs are now more difficult to anticipate, and the possibility of unintended consequences is greater.

The inherent tension between the multinational logic of firms and the national logic of governments is nothing new. As the second theme of this chapter brings out, however, the tension may not have uniform effects across all industrial nations. The pace and extent of structural change differ at the national level, and enduring asymmetries can skew both business competitive-

ness and the social impact of global financial integration. National differences in the degree of financial openness and transparency remain. They can stem from subtle regulatory barriers or disparities in tax and accounting systems; they can also reflect the extent to which relatively concentrated national financial networks influence the allocation of capital. Thus, the chapter emphasizes the transitional condition of international capital markets and the need for further comparative research along both national and sectoral lines.

Following a summary of chapter findings, the supporting analysis examines the changing financial structures confronting MNEs. The international rules of the immediate post-war system were clearly aimed at encouraging the free flow of goods and services, and therefore the free flow of short-term trade finance. (Box 6-A provides relevant historical background.) They were not, however, intended to encourage the unrestrained flow of all forms of capital. Countries remained free to control both speculative short-term flows and foreign direct investment (FDI). In order to preserve that right, they explicitly built safeguards into the rules of the Bretton Woods system.

Over time, and especially as a result of U.S. pressure, a movement to promote a new norm of international capital mobility gathered steam. The financial policies of the major industrial countries at the broadest level eventually converged around that norm, a convergence linked throughout the post-war period with the policy underpinnings of expanded direct investment flows and the associated principle of reciprocal national treatment.

It is now evident that, since the end of World War II, a set of explicit and implicit rules impeding the free flow of capital across borders has been replaced by a still-evolving set of rules permitting and even encouraging that flow.

Many reasons for the shift toward increasingly global financial markets have been suggested. The most prominent include:

1. the pressures for regulatory convergence generated by the expanding activities of MNEs themselves and of financial intermediaries (banks, securities companies, insurance companies, etc.);
2. perceived needs to supplement national savings pools with external resources, especially in light of persistent trade and fiscal imbalances;
3. imperatives to accommodate technological change; and
4. shifts in political preferences at the national level.

These changes have opened national financial markets to one another and created a partly overlapping set of international financial markets. Rapidly expanding volumes of capital now flow through those markets, as figure 6-1 indicates.

The nature and extent of these capital flows are altering the framework within which multinationals make their strategic investment decisions. Financing issues must be addressed in a context that presumes exchange rate volatility and international capital mobility. This dynamic financial context adds a further dimension of complexity, as well as new, if risky, opportunities.

Similarly, the tension between the logic of global financial integration and the continued responsibility of national governments for national economic performance is becoming increasingly apparent. The contrasting expectations placed on MNEs exemplify that tension. On the one hand, their performance is increasingly measured relative to other multinationals; they must therefore take full advantage of any new opportunities presented by a changing international environment. On the other hand, governments look to them to provide stable, high value-added jobs, technological innovation, and other benefits. Moreover, nations compete with one another to attract these firms and benefits.

Against the backdrop of burgeoning international capital movements, governments have been trying to coordinate rules in order to harness

### Box 6-A—international Capital Mobility in Retrospect

The new regime of international capital mobility represents a distinct change in the normative order developed in the aftermath of World War II.<sup>1</sup> During the discussions leading up to the 1944 Bretton Woods Conference, one of the sticking points between the principal negotiators, the United States and Great Britain, involved the issue of official controls on short-term capital movements in a pegged exchange rate system. Although the chief British spokesman, John Maynard Keynes, had moved away from his own 1933 view that finance was not one of those “things which should by their nature be international,” he continued to believe strongly in the right of the individual state to impose capital controls as and when it alone perceived the need to arise.<sup>2</sup> The U.S. position, articulated most forcefully by Harry Dexter White, approached the matter differently. Although willing to concede that “disequilibrating” capital flows were both conceivable and undesirable, White envisaged a **monetary order that would actively discourage all types of financial restrictions that “hamper trade and the international flow of productive capital.”** (The word “productive” here was carefully chosen; it was generally understood to distinguish such flows from “speculative” flows.)

The U.S. position obviously reflected the expectation that as the major creditor of the post-war order, the United States stood to benefit from as liberal an environment for international investment as it was possible to create. By the same token, however, the Americans were also intent on ensuring that access to the financial resources of the new international monetary institution they wanted to establish would be limited. In the face of undesired capital outflows, the Americans preferred that the country experiencing the problem adjust its exchange rate and/or the domestic policies responsible. They therefore contemplated a central regulatory role for the future International Monetary Fund (IMF).

In 1944, the final Bretton Woods compromise **affirmed the priority of adjustment in the event of sustained capital outflows but left the option of controls** to the discretion of individual states, provided only that such controls were not intended to restrict trade.<sup>4</sup> In the subsequent experience of the IMF, the difficulty of making clear

<sup>1</sup> This box draws on John B. Goodman and Louis W. Pauly, “The New Politics of international Capital Mobility,” *International Business and Trade Law Papers*, No. 29, University of Toronto Faculty of Law, 1990; for further background, see Eric Helleiner, *The Emergence of Global Finance: States and the Globalization of Financial Markets* (Ithaca, NY: Cornell University Press, forthcoming).

<sup>2</sup> J.M. Keynes, “National Self-Sufficiency,” *Yale Review*, vol. 21, No. 4, 1938, quoted in Charles Kindleberger, *International Capital Movements* (Cambridge, England: Cambridge University Press, 1987), p. 86. For his later view, see the relevant section of his 1942 “Proposals for an International Clearing Union,” reproduced in J. Keith Horsefield, ed., *The International Monetary Fund, 1945-1965*, vol. 3 (Washington, DC: International Monetary Fund, 1969), p. 13.

<sup>3</sup> Keynes, *ibid.*, footnote 2, p. 86. The view that all capital controls should be discouraged later became even more prominent in the U.S. position, a development students of the subject have attributed to the resurgent influence of the New York financial community after the war ended. See Marcello de Cecco, “Origins of the Postwar Payments System,” *Cambridge Journal of Economics*, vol. 3, 1979, pp. 49-61. As noted below, however, that influence evidently was not strong enough during the 1960s to prevent the U.S. Government from experimenting with capital controls when the need arose.

<sup>4</sup> See Article VI, sections 1 and 3 of the Articles of Agreement of the International Monetary Fund. For his part, Keynes interpreted this compromise as follows: “Not merely as a feature of the transition, but as a permanent arrangement the plan accords to every member Government the explicit right to control all capital movements. What used to be heresy is now endorsed as orthodox . . . It follows that our right to control the domestic capital market is scoured on firmer foundations than ever before, and is formally accepted as a proper part of agreed international arrangements,” as quoted in Joseph Gold, *International Capital Movements Under the Law of the International Monetary Fund*, Pamphlet Series, No. 21 (Washington, DC: International Monetary Fund), p. 11.

(continued on next page)

### Box 6-A-International Capital Mobility in Retrospect-Continued

distinctions between illegitimate exchange restrictions and legitimate capital controls soon became apparent. Among the leading industrial states, however, tensions related to such difficulties began to ebb after the restoration of currency convertibility in 1958.

The new prominence of the capital mobility objective received explicit expression in 1961 in the founding documents of the industrial countries' Organization for Economic Cooperation and Development (OECD). In particular, on December 12, 1961, the Council of the OECD **adopted the Code of Liberalization of Capital Movements**, in which the member states agreed to "progressively abolish between one another" restrictions on movements of capital "to the extent necessary for effective economic cooperation."<sup>6</sup> Although the Code represented the most explicit international statement of intent regarding the discouragement of capital controls since Bretton Woods, it left significant room for member states to make exceptions for certain types of capital transfers and to take any actions considered necessary for the "maintenance of public order or... the protection of essential security interests."<sup>7</sup> In the event of severe balance of payments problems, the Code permitted a member state to derogate temporarily from its liberalization obligations.<sup>8</sup>

For the signatory states, **in short, the OECD Code extended and clarified the fundamental normative consensus of Bretton Woods.** But it did not change the essential rules governing international finance. Freer capital movements across borders were to be encouraged in the context of a liberal international economy. But states retained the right to impede that movement whenever conditions warranted. During the decade following the formation of the OECD, the importance states attached to that right would become evident in their actions.

Despite the OECD Code, in the wake of persistent current account imbalances experienced throughout the 1980s and early 1970s, virtually all leading industrial states resorted to various types of controls on short-term capital movements.<sup>9</sup> Even the United States embarked on a series of experiments designed to control disequilibrating outflows and defend the pegged exchange rate system designed at Bretton Woods.<sup>10</sup> Similar

<sup>5</sup> To take one example, note that leads and lags in current payments can effectively create "capital flows" that may or may not be equilibrating for a country's overall external balance.

<sup>6</sup> Organization for Economic Cooperation and Development, *Code Of Liberalization of Capital Movements*, Paris: OECD, October 1961, Article 1. Also see OECD, *Introduction to the OECD Codes of Liberalization* (Paris: OECD, 1967). Furthermore, the signatories agreed to "endeavor to extend the measures of liberalization to all members of the International Monetary Fund."

<sup>7</sup> Organization for Economic Cooperation and Development, *Code of Liberalization Of Capital Movements*, *ibid.*, Art. 3.

<sup>8</sup> *Ibid.*, Art. 7.

<sup>9</sup> The current account of a nation's balance of payments records such items as receipts for exports and expenditures on imports. An excess of the former over the latter translates into a current account surplus; an excess of the latter over the former creates a current account deficit. An enduring deficit often implies that the exchange rate is overvalued. If the holders of financial assets expect a devaluation, their attempts to exchange those assets for assets denominated in a currency expected to be revalued upward can compound the pressure on the exchange rate. In certain cases, such capital flows may force unnecessary or excessive exchange rate changes. They may push the rate away from its otherwise "natural" equilibrium. In theory, floating exchange rates might be expected to ameliorate this problem. In practice, unrestricted capital flows, including purely speculative flows, can lead to an exchange rate that continually "overshoots" or "undershoots" the equilibrium level that would bring the current account into balance.

<sup>10</sup> Under the terms of the Bretton Woods Agreement, signatory states agreed to declare a "par value" for their currencies in terms of gold. The U.S. dollar, which turned out to be the key price in the system, was set at 1/35 of an ounce of gold. The par value was to be defended when it came under pressure, but scope was retained for changing it in exceptional circumstances. Exchange rates were therefore neither fixed nor floating, but "pegged." On the U.S. resort to controls, see John Conybeare, *U.S. Foreign Economic Policy and the International Capital Markets: The Case of Capital Export Controls, 1963-74* (New York, NY: Garland, 1988).

controls were put in place by other states in deficit, while various nations in surplus adopted measures to ward off unwelcome inflows. The story of the eventual collapse of the exchange rate system is well-known and not in need of recapitulation here.<sup>11</sup> It is, however, important to note that as the system was collapsing, multilateral discussions on the future regulation of capital movements continued.

In 1972, in an atmosphere of crisis, an intergovernmental forum on international monetary reform was established. Labeled the Committee of Twenty of the IMF Board of Governors, its real work was undertaken by a staff drawn from the finance ministries and central banks of the leading monetary powers. Since capital mobility was a key issue of the day, the staff assigned an analytical project to a group of technical experts, who were essentially asked to examine the problem of speculative capital flows. Despite difficulties encountered in specifying the extent of the problem, their final report conceded that disequilibrating flows could continue to disrupt even a more flexible exchange rate arrangement. It concluded, however, that although capital controls could not be forsworn, they should not become permanent features of a reformed system because of their potential negative impact on trade and investment flows.<sup>12</sup> In this connection, the group also recommended that governments craft a new code of conduct for the use of capital controls and that the code be monitored by an international agency, such as the IMF. In the end, this recommendation was not pursued. For this and other reasons the final report of the Committee of Twenty failed to lay the groundwork for a new "Bretton Woods" agreement.<sup>13</sup>

Since the end of global monetary reform negotiations in the 1970s, myriad strategic and tactical decisions taken by states and businesses created ever deepening channels between the world's financial markets. Those channels, including lightly regulated offshore financial markets known collectively as "Eurocurrency markets," facilitated a burgeoning expansion in the scale of short-term international capital flows. Among the most significant decisions taken to facilitate these flows were those that abolished conventional national controls.

<sup>11</sup> See Benjamin J. Cohen, *Organizing the World's Money* (New York, NY: Basic, 1977); Jonathan David Aronson, *Money and Power: Banks and the International Monetary System* (Beverly Hills, CA: Sage Publication, 1977); Fred L. Block, *The Origins of International Economic Disorder* (Berkeley, CA: University of California Press, 1977); and John S. Odell, *U.S. International Monetary Policy* (Princeton, NJ: Princeton University Press, 1982).

<sup>12</sup> Gold, *International Capital Movements*, pp. 37-40. For relevant technical background, see Sir Alec Cairncross, *Control of Long-Term International Capital Movements* (Washington, DC: The Brookings Institution, 1973). (Despite the title, short-term capital movements are also treated.) Also see Alexandre Lamfalussy, "Changing Attitudes Towards Capital Movements," in Frances Cairncross (ed.), *Changing Perceptions of Economic Policy: Essays in Honor of the 70th Birthday of Sir Alec Cairncross*, (New York, NY: Methuen, 1981).

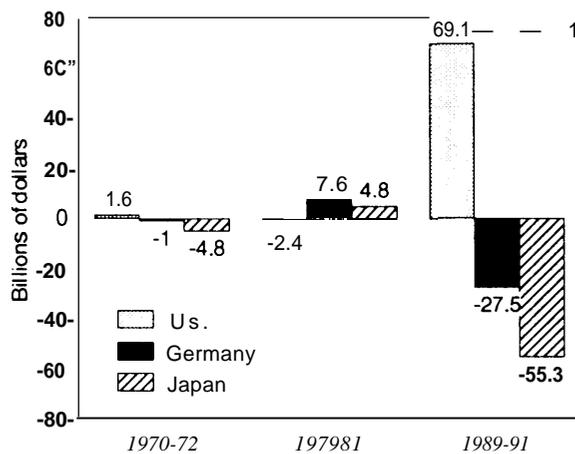
<sup>13</sup> For the Committee's conclusions on the issue of capital controls, which essentially recapitulated the original Bretton Woods principles, see "Final Report and Outline of Reform of the Committee of Twenty" (June 14, 1974), reprinted in Margaret Garritsen de Vries, ed., *The International Monetary Fund, 1972-1978* (Washington, DC: International Monetary Fund, 1985), vol. 3, p. 170, paragraphs 15 and 17. On the ultimate failure of the reform effort, see John Williamson, *The Failure of World Monetary Reform, 1971-1974* (New York, NY: New York University Press, 1977). Note the rehearsal of essentially the same issue in a recent study on international capital movements commissioned by the Ministers and Governors of the Group of Ten in the wake of the September 1992 crisis in the European Monetary System. See *IMF Survey*, May 17, 1993, p. 148.

the efficiencies promised by freer flows of capital and to stabilize the markets through which those flows take place. To some extent, this involves trying to come to grips with the broader implications of differences that remain in the underlying structures of major markets.

Recent research suggests that some MNEs, particularly those based in Japan and Germany,

may still benefit from regulatory, accounting, and fiscal asymmetries and from privileged relationships with national financial institutions. Although the trend toward globe-spanning markets has been underway for some time, the legacy of traditional financial structures persists to varying degrees. U.S. MNEs, for example, must contend with a system that insists on complete transpar-

**Figure 6-I-Capital Account Balances of the U.S., Germany, and Japan in Selected Periods**



NOTES: These aggregate statistics include short as well as long-term capital. A negative sign indicates a capital outflow. Data are in nominal dollars.

SOURCE: International Monetary Fund (IMF), *International Financial Statistics Yearbook, 1992* (Washington, DC: International Monetary Fund, 1992).

ency, consistent earnings, and an **arms-length relationship between management and owners—a system conventionally depicted as consumer-oriented. German and Japanese MNEs, conversely, still ought to benefit from less transparent, producer-oriented systems that either provide more stable, longer term, and more patient sources of capital or that endow corporate managers with longer investment planning horizons.**

**The interplay between forces promoting greater financial openness and residual market asymmetries is reshaping the environment within which multinational managers make their decisions on future investments. In terms of both scale and complexity, financing issues have assumed greater prominence in corporate strategic planning. To the extent that managers are adapting their firms to this new financial environment, their decisions complicate the task of crafting effective new rules to govern the international economy. The evolution of MNE strategies also raises new challenges for governments attempting to preserve traditional social values. Nations thus find themselves in a narrow corner. On the one hand, they seek the**

jobs, investment, new technology, and skills that financially adaptable MNEs can provide. On the other hand, they must craft rules that strike a new balance between competitive efficiency, fairness, and enduring social priorities in a political framework still fundamentally centered on the nation.

## CHAPTER FINDINGS

1. The major capital markets within which MNEs make their financing decisions developed in different national policy contexts. Financial regulatory and supervisory policies still have the most direct influence on underlying market structures. But a much broader range of policies influence those structures, as well as the amount, cost, and availability of the capital channeled through them. These include monetary and exchange rate policies, overall fiscal policies, corporate tax rules and depreciation schedules, antitrust policies, and accounting standards. Such policies effectively constitute the rules of the financial game within national capital markets.
2. The structure, depth, and operations of national capital markets can provide important advantages to MNEs. In the early post-war period, American capital markets provided U.S. firms with high volumes of relatively low-cost capital. For some companies, this helped fuel expansion overseas and, eventually, development into MNEs. Today, the much different financial market arrangements of other countries may be well-adapted to provide capital advantages to their own firms.
3. From the end of World War II until the 1970s, the structures of national capital markets, and the rules defining them, differed markedly across advanced industrial countries. The U.S. market, for example, was geographically decentralized, distinguished clearly between commercial banks and securities companies, and discouraged banks from owning shares in nonfinancial corporations. The Japanese sys-

tern was more centralized and state-directed, albeit with an American-inspired separation of commercial banks and investment banks. In the German system, principal banks were distinguished by their universal character and their ability to own nonfinancial firms.

4. Certain factors enabled structural differences between the most important national capital markets to be maintained in the early post-war years. Implicit or explicit access rules, for example, limited the participation of foreign banks and securities companies in domestic markets. Capital flows between those markets were, in retrospect, relatively manageable. Indeed, in view of the priority assigned to stable exchange rates, all governments considered control and influence of capital flows not only acceptable but necessary at various times. MNEs could accommodate themselves to different capital control regimes, although with attendant losses in efficiency.
5. Since the early 1970s, structural differences across national capital markets have eroded, although they have not disappeared. Capital controls are being dismantled across the advanced industrial world and beyond. The forces behind this development include pressures associated with variable exchange rates, changing perceptions of the appropriate balance between risk-taking and market stability, and heightened competition between governments for the jobs, prestige, and other benefits expected to flow from a more developed financial services industry. Thus, the financial planning environment for MNEs has changed.
6. The expanding activities of MNEs themselves significantly compromised the capacity of governments to maintain capital controls. Leads and lags in invoicing and payments, transfer pricing practices, access to funding sources in a range of markets, and the ability to shift some operations to different regulatory jurisdictions—all helped undercut the efficacy of controls.
7. During the 1980s, national markets for long and short-term capital became more deeply integrated as an overlapping set of international markets grew spectacularly. The general deregulatory logic of this movement implied a trend toward convergence in both financial market structures and the capital costs facing MNEs, but the pace and ultimate extent of such convergence remained problematic and contentious.
8. Despite the logic of convergence, differences persist in the structures through which capital is raised and allocated in the major industrial countries. At the very least, the legacy of past differences endures. In the 1990s, individual investors and borrowers still view the U.S. system of capital investment as comparatively decentralized, fluid, short-term-oriented, and efficient. By contrast, Japan and Germany still appear more centralized, oriented toward longer time horizons for investors, characterized by closer links between nonfinancial firms and financial intermediaries, and adapted to provide potentially higher social returns.
9. Global financial trends since the 1970s have had mixed consequences for MNEs. On the one hand, the opening of markets and the development of new techniques has greatly expanded their financing options. On the other hand, financial uncertainties have increased partly because of fluctuating exchange rates and shifting interest rate differentials (figures 6-2, 6-3, and 6-4) and partly because the overall financial environment is more open and complex. In effect, a relatively clear set of nationally based rules of the financial game has not yet been replaced by an equally clear set of new multilateral rules.
10. For an increasing number of firms, multinationalization represents a strategic response to the rapidly changing financial environment. Diversified operations in a number of jurisdictions allow firms to take advantage of remaining regulatory, tax, and other differences and to hedge some of the risks associ-

Figure 6-2-Deutsche Mark–U.S. Dollar Monthly Average Exchange Rates, 1970-1988



SOURCE: IMF data as cited in Paul Volcker and Toyoo Gyohten, *Changing Fortunes: The World's Money and the Threat to America's Leadership* (New York, NY: Times Books, 1992), pp. 370-371.

ated with increased financial uncertainty. At least in theory, locating managerial, production, and support facilities in the market of final sales can mitigate the effects of excessive swings in financial variables. Many such facilities represent the diversification of an overall financial portfolio from the point of view of the MNE's home office (see chapter 2).

11. The continuing evolution of global capital markets and the broadening embrace of adaptive strategies by MNEs pose new challenges for national governments. Those challenges arise from the fact that many firms, and citizens generally, hold those governments accountable for ensuring economic growth, shielding particular sectors or particular groups of workers from excessive or unfair competition, and otherwise defending important social values.

## GOVERNMENT POLICIES AND FINANCIAL MARKETS

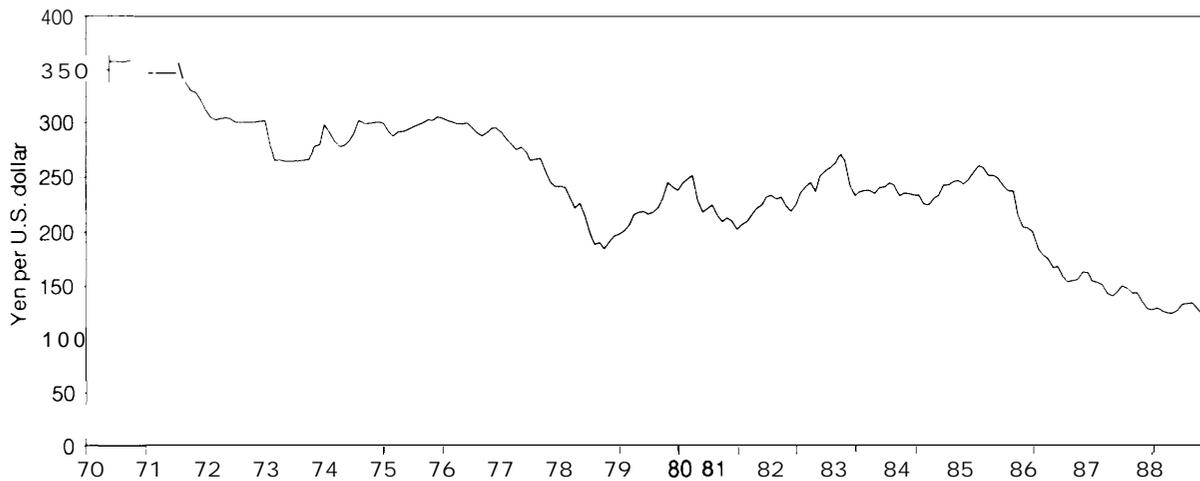
Modern financial markets did not spring up spontaneously. Critical to their existence are public policies that constitute the rules within

which they operate. All countries subject these markets to a high degree of specific regulation. Because of their centrality in the overall economy, moreover, they have been heavily influenced by broader official policies and practices. Table 6-1 illustrates some of the most important of these policies.

Governments specify, enforce, and adjudicate the fundamental property rights of market participants. Directly or indirectly, they license intermediaries (banks, brokers, etc.). They may insure savers against loss, or protect investors. Through regulatory, supervisory, tax, and other financially related policies, they establish the rules for savers, investors, and intermediaries. Those rules are influenced by distinctive cultural, legal, and political traditions and have therefore differed from nation to nation. Such differences can create difficulties for MNEs, but they can also provide significant opportunities.

In the decades following World War II, the rules governing national markets for both short-term finance and long-term capital differed markedly across advanced industrial countries. The United States, for example, prohibited commercial banks from underwriting corporate bond or stock issues or owning shares in industrial enter-

Figure 6-3—Japanese Yen-U.S. Dollar Monthly Average Exchange Rates, 1970-1988



SOURCE: IMF data as cited in Volcker and Gyohten, *Changing Fortunes*, pp. 370-371.

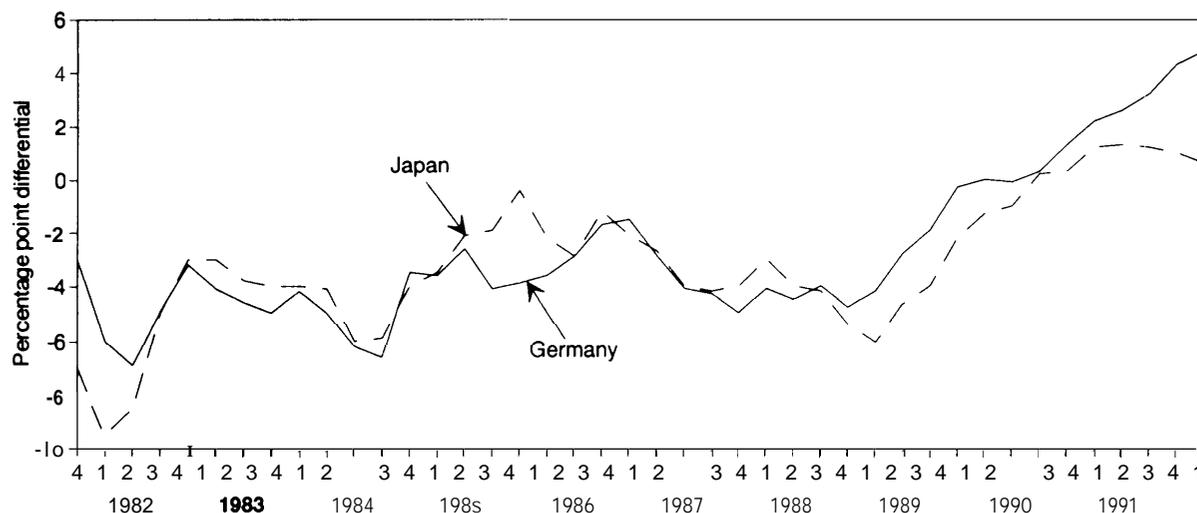
prises; the banking market **was also** segmented along State lines. Reflecting this geographic and functional segmentation, as well as the size, scope, and mainly domestic orientation of the overall economy, the U.S. stock and bond markets were decentralized but deep. The British capital market shared some of these characteristics, but, the banking system was less segmented and more outward-oriented. The French market was more centralized and state-directed; the role of banks was especially prominent and the government used them to steer industrial development. The Japanese system had marked similarities to the French system, although the links between government and banks were more indirect, with a U.S.-style separation of commercial banks and investment banks in place after the war. The German system was also characterized by relatively underdeveloped stock and bond markets and by a prominent role for banks, but the principal banks were distinguished by their universal character (that is, they were permitted to engage in a wide range of commercial and investment banking activities).

In the period just after World War II, national financial markets were deliberately insulated by the architects of the new international monetary

system. Faced with the possibility of extending the principles of global liberalism **from the arena of trade to the arena of finance, most countries recoiled.** At the Bretton Woods Conference in 1944, the United States, **Great Britain, and others** finally **agreed that countries** should be obliged **over time** only to abolish **restrictions on financial flows directly related to trade.** They accepted **no obligation to open their national financial markets to foreign participation, to liberalize longer term capital inflows or outflows, or to avoid using national financial policies in pursuit of larger political or economic aims.**

**The reluctance of governments to match trade liberalization with financial liberalization is understandable. Capital is inherently quite mobile, but labor is not. If a national population is subjected to bracing international competition through trade flows, countervailing financial flows might be necessary to cushion the effects, both economic and political. Especially under a system designed to minimize movements in exchange rates, governments needed to facilitate necessary adjustments to international payments imbalances. The ability to direct national savings toward national investments ap-**

Figure &amp;4-interest Rate Differentials in Japan and Germany vis-a-vis the U.S., Quarterly 1982-1991



NOTES: Interest rates are calculated on an end-of-quarter basis and are graphed according to how many percentage points they varied from the U.S. interest rate at the time.

SOURCE: Adapted from the Bank for International Settlements, *62nd Annual Report* (Basle, Switzerland: 61S, 1992), p. 144.

peared to be the necessary concomitant to a liberal trading system with fixed exchange rates.

#### FINANCIAL MARKETS AND MNEs

Firms develop multinational strategies in response to their operating environments; financial markets comprise an important part of that environmental National differences in regulations and tax policies, for example, can translate into differences in the availability and cost of capital across borders. By expanding operations across national borders, a firm can advance its strategic goals. It can often more readily generate capital internally (for example, by broadening the sources of earnings) or externally (through increased access to national or international capital markets). Moreover, if one of a company's inherent advantages is derived from the availability of bountiful amounts of low-cost capital, expanding

into foreign markets where rivals lack such an advantage needs little rationalization.

The fundamental issue related to contemporary developments in financial markets can be captured by the term "financial uncertainty." Conceptually, this is nothing new. Businesses have always had to deal with an unpredictable external environment. But the level of financial uncertainty has been increasing since the 1970s, and has become highly problematic. Extreme interest rate volatility, unstable and highly unpredictable exchange rate movements, and the rapid pace of innovation in financial instruments—these and other developments have made routine planning more difficult and added a new dimension of complexity to long-term investment decisions.

In order to justify a large-scale productive investment, MNEs must minimize financial uncertainty. The development of various risk man-

<sup>1</sup> The research assistance of Anthony Perl is gratefully acknowledged. For relevant background, see U.S. Congress, Office of Technology Assessment, *Competing Economies: America, Europe, and the Pacific Rim*, OTA-ITE-498 (Washington DC: U.S. Government Printing Office, October 1991); "Financing Long-Term Investments," chapter 3 of U.S. Congress, Office of Technology Assessment, *Making Things Better: Competing in Manufacturing*, OTA-ITE-443 (Washington DC: U.S. Government printing Office, March 1990); and, *International Competition in Services*, OTA-ITE-328 (Washington, DC: U.S. Government Printing Office, July 1987).

Table 6-I-Selected Policies Influencing Financial Market Structures

General	Specific
<i>National</i>	
Monetary policy	Licensing rules
Exchange rate arrangements	Supervisory practices/rules
Tax policies (including, depreciation rules)	Disclosure rules
Capital controls	Functional restrictions (investment/commercial banking, insurance, etc.)
Trade policies	Geographic restrictions
Foreign direct investment rules	Ownership restrictions (bank/industry, industry/bank etc.)
Industrial/technology policies	Payments system practices
	Price controls (interest rate ceilings, etc.)
	Competition policies
	Market access policies (right of establishment, national treatment, reciprocity)
	Accounting standards (often non-governmental)
<i>International</i>	
Exchange rate regime	Central bank agreements on supervisory practices, capital adequacy, etc.
Economic policy coordination efforts (G-7, EC, etc.)	Securities/banking markets regulatory coordination (EC single market program, NAFTA services rules, OECD capital and GATT services negotiations, IOSCO work programs)
Tax treaties	
OECD capital and investment instruments	

SOURCE: Office of Technology Assessment, 1993.

agement techniques and tools has become a growth field both for MNE managers and financial intermediaries. But hedging techniques are costly and fail to eliminate all financial uncertainties. Indeed, they may create new ones.

No one fully understands the risks inherent in contemporary global financial markets. Paul Volcker, former chairman of the Federal Reserve Board and no radical critic, saw fit to conclude a recent book with the following observation:

The economic case for an open economic order rests, after all, largely on the idea that the world will be better off if international trade and investment follow patterns of comparative advantage. . . . But it is hard to see how business can effectively calculate where lasting comparative advantage lies when relative costs and prices among countries are subject to exchange rate

swings of 25 to 50 percent or more. There is no sure or costless way of hedging against all uncertainties; the only sure beneficiaries are those reaming the trading desks and inventing the myriad of new devices to reduce the risks-or to facilitate speculation . . . . But these risks and costs seem to be driving more of the industrial investment of operating businesses in developed countries toward producing for local or regional markets. In other words, the decisions in the real world are often defensive and are designed to escape exchange rate uncertainties and protectionist pressures rather than to maximize efficiency. That inevitably leads to diluting some of the important benefits of open markets, which is maintaining tough competition among the world's dominant producers.<sup>2</sup>

Although MNE managers may hope for the day when excessive exchange rate and other financial

<sup>2</sup> Paul Volcker and Toyoo Gyohten, *Changing Fortunes: The World's Money and the Threat to American Leadership* (New York, NY: Times Books, 1992), p. 293. Also see C. Randall Henning, *International Monetary Policymaking in the United States, Germany, and Japan* (Washington, DC: Institute for International Economics, forthcoming).

pressures subside, few expect it soon. U.S. firms with significant revenues generated overseas, for example, must be concerned about potential losses caused by an unanticipated fall in the value of the dollar. If they have significant physical or financial assets overseas, they are also concerned about valuation changes that can translate into net losses on consolidated balance sheets. In addition, they must take into account the possibility that they or their foreign rivals may gain an edge through the relative depreciation of national currencies.<sup>3</sup>

Intermediaries have responded with a dizzying array of new products. Most involve some variation on the future sale or purchase of financial assets or liabilities, options to engage in such transactions, or the swapping of future cash flows with another party.<sup>4</sup> All such techniques, of course, carry a cost that must be borne by the firm or its customers, and few allow firms to cover longer term uncertainties at an acceptable cost. Excessive caution with respect to longer term investment can still be the consequence. Moreover, the financial volatility associated with those uncertainties can encourage firms to initiate risky financial transactions extraneous to their core business in pursuit of speculative gains. But it is the prospect of longer term losses that can incline firms toward excessive caution in their long-term investment planning. While firms have been learning to deal with the more immediate consequences of financial volatility, there remains the possibility that such volatility can exert a deleterious influence on the long-term investments that create the jobs, incomes, and substantive innovations of the future.

Beyond financial engineering, MNEs can consider a range of strategic options for dealing with excessive financial uncertainties. They can try,

for example, to limit their financial exposure through deliberate strategies of global diversification. By spreading plant, equipment, supply networks, and costly personnel to their final markets, MNEs can attempt to hedge their cash flows and their balance sheets. Longer term productive investments may still be discouraged by the expectation of future monetary and financial turbulence, but the prospect of competitive losses associated with such turbulence can be reduced by embedding such natural hedges into the firm's structure. The actual impact of financial volatility may therefore vary by industrial sector.

Governments accountable for developments within national economies and national capital markets, of course, might view the consequences of financially driven strategic decisions by MNEs differently. The kinds of market imperfections that contribute to exchange rate volatility and financial uncertainty might be the result of deliberate policies; the cross-border arbitrage activities of MNEs might appear as unwelcome threats to the integrity of those policies.<sup>5</sup> Conversely, if a government presides over broad and deep national capital markets and sees it as important to maximize the resulting benefits for its own citizens, the multinationalization of firms obviously threatens to transfer at least some of those benefits abroad.

Critics of MNEs have long held that this transfer of national capital advantages is exactly what U.S. firms accomplished in the decades that followed World War II. In effect, they contend that those companies combined relatively cheap U.S. capital and technology with cheap labor in production facilities abroad. It arguably followed, from such a view, that such activities eroded both the relative capital advantage of the United States and the relative international competitiveness of

<sup>3</sup> See Judy Lewent and A. John Kearney, "Identifying and Hedging Currency Risk at Merck," *Journal of Applied Corporate Finance*, vol. 2, No. 4, winter 1990, p. 20.

<sup>4</sup> For a recent analysis, see Group of Thirty, *Derivatives: Practices and Principles* (Washington, DC:1993)

<sup>5</sup> Arbitrage involves undertaking simultaneous and opposite transactions in separate markets in the hope that profits will result from temporary price differentials.

**firms that stayed home. Implicit in** such a view, however, is the assumption that the returns to the nation from the activities of MNEs—for example, through dividend flows not adequately compensate for this erosion.

Whether the ultimate returns on multinational activity are in fact adequate from a national point of view is a matter of perception and political judgment. The advocates of multinational enterprises have typically argued that the transfer of U.S. capital advantages abroad promised to rebound to the benefit of the United States. At the possible cost of shifting some jobs abroad, it promoted the development of a more open world economy, increased options for American consumers and investors, and ultimately addressed traditional U.S. security concerns. However, questions have arisen concerning the extent to which such benefits are contingent on the assumptions that the policies of leading countries are all converging toward liberal norms and that firms competing in global markets are not playing by different rules.

Such differences in rules can arise from structural distinctions in the markets through which domestic and multinational firms raise their capital. For most of the twentieth century, those markets have been recognizably national in their fundamental structures. Although such distinctions are eroding, partly through the normal operations of MNEs, they have not yet disappeared.

## FINANCIAL MARKET STRUCTURES: A PRIMER

With words like “flow,” “liquidity,” “deepening,” and “spillover” rampant in the vocabulary of bankers and economists, it is no coincidence that hydraulic analogies frequently enter discussions of international finance. National financial markets have often been depicted as reservoirs for national savings and investment;

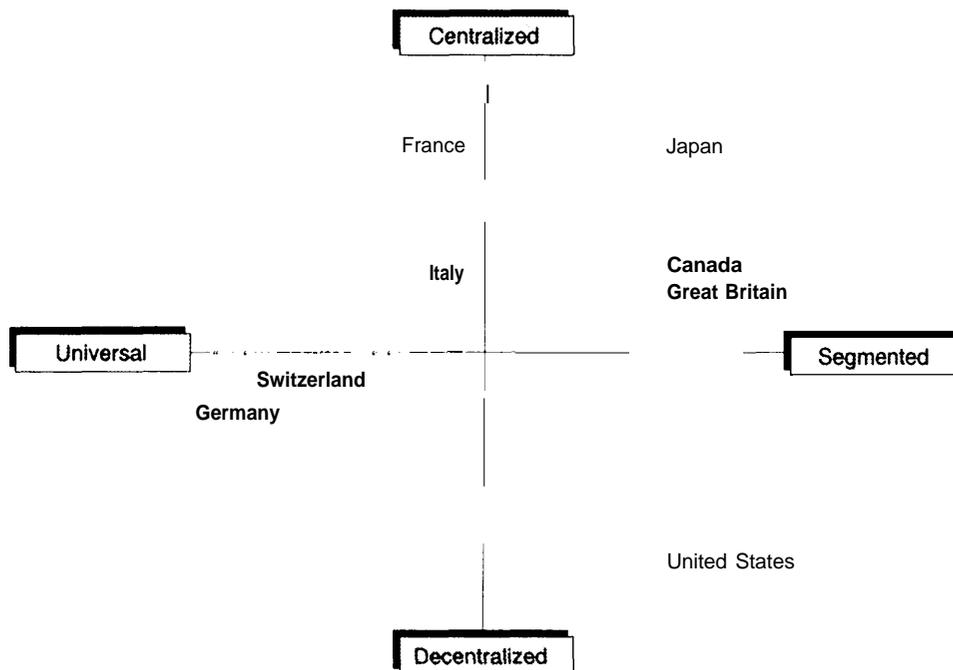
international markets and cross-border sales and purchases of financial assets and liabilities (financial intermediation) as canals linking those reservoirs; national financial controls as darns designed to stop flows into those canals; and broader national policies as locks constructed to regulate flows both within national reservoirs and into cross-national canals.<sup>6</sup> The contents of national reservoirs may be described as more or less fluid; the faster changes in one part of the reservoir cause accommodating changes elsewhere in the same reservoir, the more fluid are those contents and the more unified is that reservoir. The more fluid are the contents of neighboring reservoirs, and the more open the canals between them, the faster will changes in the level of one reservoir move to another. Similarly, as long as closure is the rule, turbulence in one reservoir matters little to those depending on other reservoirs. But when the reservoirs are open, turbulence can spread quickly.

In the early years of the post-World War II era only one national reservoir was reasonably full, that of the United States. Moreover, both in the United States and elsewhere, the contents of national reservoirs were quite viscous. Interest rate controls, geographic restrictions on the operations of intermediaries, and fictional barriers—for example, between the operations of commercial and investment banks—all increased viscosity. In addition, by deliberate policy design, the darns between national reservoirs were formidable; they could be replaced by canals only slowly, and the locks in those canals were carefully regulated.

Figure 6-5 gives a rough idea of the resulting structural differences in the most important national banking markets during much of the post-World War II period. The key differences highlighted are the degree to which a relatively few banks (as opposed to securities companies and other types of intermediaries) were allowed to

<sup>6</sup> Here and elsewhere, the chapter was inspired by Ralph Bryant's *International Financial Intermediation* (Washington, DC: Brookings Institution, 1987).

Figure 6-5-A Typology of Post-World War II Banking Market Structures



SOURCE: Office of Technology Assessment, 1993.

dominate the national financial system, and the degree to which direct linkages were permitted between commercial banking (essentially, taking deposits and making loans) and investment banking (among other things, underwriting the issuance of stocks and bonds).<sup>7</sup>

Today, the picture is much different. Inside the national reservoirs of advanced industrial countries, fluidity has been greatly increased by the deregulation of interest rates and the breakdown of barriers between financial intermediaries. Especially since the late 1970s, dams have been dismantled at a rapid pace, canals have been widened considerably, and locks have progressively been left open. Highly regulated banks have been losing customers, especially MNEs, to stock, bond, and commercial paper markets. In

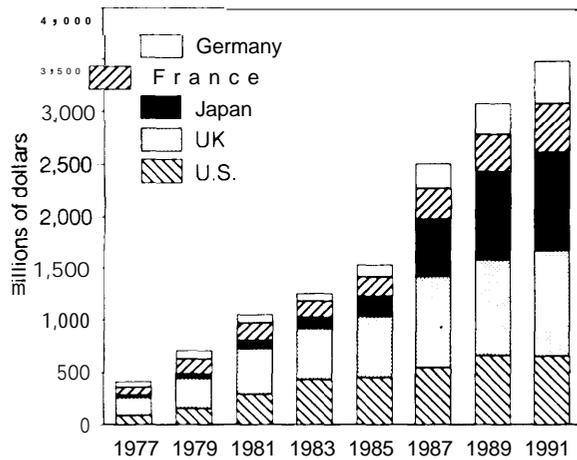
some cases, nonfinancial MNEs have even become their competitors. In response, banks have sought riskier customers in their domestic markets and pushed aggressively for a loosening of traditional regulatory constraints. As geographic and functional limits have eroded, there has been a gradual movement across most banking markets toward more universal-type banking structures. Most dramatically, banks have also expanded their involvement in international markets (see figures 6-6 and 6-7).

Although it would be stretching the facts to depict the dismantling of dams and the opening of canals as having created a truly global reservoir, a disturbance in one reservoir can generate crashing waves in another.<sup>8</sup> In fact, since the 1970s the turbulence associated with persistent

<sup>7</sup> Universal banks are able to engage in both sorts of activities; in addition, they may be able to buy and hold for their own accounts the securities issued by industrial firms.

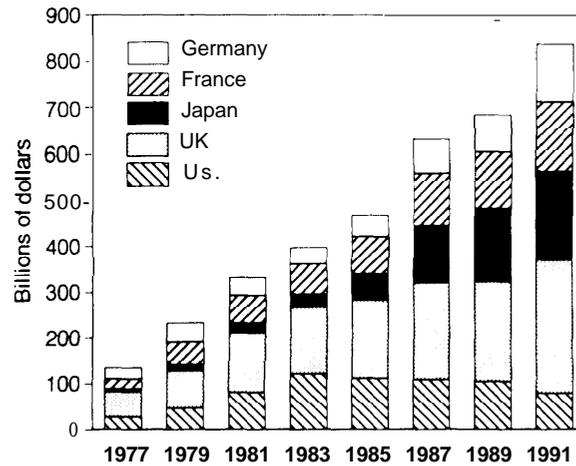
<sup>8</sup> For an accessible survey of developments and a summary treatment of relevant economic literature on the subject, see "Survey of the World Economy," *The Economist*, Sept. 19, 1992, pp. 5-48.

**Figure 6-6—Deposit Banks' Foreign Assets by Residence of Bank, 1977-1991**



SOURCE: IMF, *International Financial Statistics Yearbook*, 1992, p. 61.

**Figure 6-7—Cross-Border Bank Credit to Non-Banks by Residence of Lending Bank, 1977-1991**



SOURCE: IMF, *International Financial Statistics Yearbook*, 1992, p. 67.

macroeconomic imbalances and various specific events (the failure of the Herstatt Bank in Germany, the collapse of Continental Illinois Bank, the October 1987 Wall Street panic, and the BCCI case) has often combined with this new openness to engender financial crises that demand coordinated international responses.

This is precisely what some policymakers feared after World War II, leading them to construct a post-war monetary system that left countries free to retain and strengthen the dams and locks of the war years. But perceptions soon changed and governments effectively began encouraging the vast expansion of international capital movements through their fiscal, monetary, trade, and financial regulatory policies. They were also pulled along, either by the actions of

other governments<sup>9</sup> or by the activities of MNEs and financial intermediaries. The outcome has been the adoption of policies aimed at capital decontrol and the integration of financial markets.

### CAPITAL DECONTROL AND FINANCIAL INTEGRATION

Capital controls were a response to the political sensitivities associated with international capital movements (see box 6-A). During the early decades of the Bretton Woods system, all advanced industrial states resorted to them at one time or another and all approached their eventual liberalization cautiously.<sup>10</sup> They included a broad range of explicit restrictions, special taxes, or tacit arrangements designed to discourage certain kinds

<sup>9</sup>For instance, in the 1980s the United States targeted Japanese financial liberalization as a key to resolving trade disputes.

<sup>10</sup>Much debate surrounds the reasons for this caution and the potential consequences of its apparent abandonment. Harkening back, explicitly or implicitly, to such seminal books as Karl Polanyi's *The Great Transformation* (Boston, MA: Beacon Press, 1957), much of that debate concerns the resurgent chimera of the "self-regulating market" and, ultimately, the changing dimensions, effects, and implications of interdependence in the financial sector. Relevant works include: Susan Strange, *Casino Capitalism* (Oxford: Basil Blackwell, 1986); Robert Cox, *Power, Production, and World Order* (New York, NY: Columbia University Press, 1987); Robert Gilpin, *The Political Economy of International Relations* (Princeton, NJ: Princeton University Press, 1987); James Hawley, *Dollars and Borders* (Armonk, NY: M.P. Sharpe, 1987); Charles Kindleberger, *International Capital Movements* (Cambridge, England: Cambridge University Press, 1987); Jeffrey Frieden, "Invested Interests: The Politics of National Economic Policies in a World of Global Finance," *International Organization* vol. 45, No. 4, autumn 1991, pp. 425-51; and Michael C. Webb, "International Economic Structures, Government Interests, and International Coordination of Macroeconomic Adjustment Policies," *International Organization* vol. 45, No. 3, summer 1991, pp. 309-342.

of financial transfers between residents and non-residents.<sup>11</sup> In an era of pegged exchange rates, most maintained such controls either to achieve balance-of-payments goals or to create the space needed for the pursuit of autonomous national economic policies.

Capital flows are critical to the balance of payments since, together with developments in the current account they determine the volume of reserves available for defending a pegged exchange rate or influencing a flexible rate.<sup>12</sup> Free capital flows can also frustrate monetary policy. A government conducting a more restrictive policy compared to the rest of the world may therefore decide to impose controls on capital inflows or to lift them on outflows; a government conducting a relatively expansionary policy may decide to impose controls on outflows or to lift them on inflows. All of the measures adopted in such a context directly affected MNEs and financial intermediaries. They also encouraged those firms to pursue evasive strategies in response.

Since the late 1970s, governments in the advanced industrial world have moved decisively to facilitate international capital mobility. More countries moved to abolish capital controls and dismantle associated bureaucratic machinery. To be sure, capital flows continue to encounter

frictions at national borders.<sup>13</sup> Still, it is clear that state policies that formerly accommodated the possibility of controls on short-term capital movements have lately converged in the opposite direction. Such policies suggest a fundamental break with the practices through which the central rules of the Bretton Woods system were adapted and implemented.

Capital decontrol forms part of a complex and interacting set of public policies adopted across the advanced industrial world since the 1970s, the end-result of which has been to encourage a freer flow of capital across borders. Through transfer pricing practices, leads and lags in managing their accounts receivable and accounts payable, and participation in offshore currency markets, MNEs played an important role in that dismantling process. In addition, the domestic financial deregulation that swept throughout the world during the 1980s reduced the viscosity of financial flows.

Britain initiated this trend in the late 1970s. Adoption of a variety of liberalization measures followed in subsequent years in the United States, France, Germany, Japan, and other industrial countries.<sup>14</sup> Governments thus sought to address some of the more acute difficulties that had come to be associated with controls.<sup>15</sup>

Domestic deregulation complemented, and was partly driven by, the deepening that occurred in

<sup>11</sup> See Organization for Economic Cooperation and Development, *Controls on International Capital Movements* (Paris: OECD, 1982).

<sup>12</sup> This discussion draws on John B. Goodman and Louis W. Pauly, "The Obsolescence of Capital Controls? Economic Management in an Age of Global Markets," *World Politics*, vol. 46, No. 1, October 1993.

<sup>13</sup> See Ralph Bryant, *Money and Monetary Policy in Interdependent Nations* (Washington, DC: Brookings Institution, 1980). Also relevant are Martin Feldstein and Charles Horioka, "Domestic Savings and International Capital Flows," *Economic Journal* vol. 90, June 1980, pp. 314-38; Martin Feldstein, "Domestic Savings and International Capital Movements in the Long Run and the Short Run," *European Economic Review* vol. 21, 1983, pp. 129-153; Tamim Bayoumi, "Savings-Investment Correlations: Immobile Capital, Government Policy, or Endogenous Behavior," *IMF Working Papers*, WP/89/66, Aug. 22, 1989; International Monetary Fund Staff, "Determinants and Systemic Consequences of International Capital Flows," *IMF Occasional Paper Series*, vol. 77, March 1991; Martin Feldstein and Philippe Bacchetta, "National Saving and International Investment," in B. Douglas Bernheim and John B. Shoven (eds.), *National Saving and Economic Performance* (Chicago, IL: University of Chicago Press, 1991), pp. 201-220; and Jeffrey Frankel, "International Capital Mobility: A Review," *Papers and Proceedings of the Annual Meeting of the American Economic Association*, 1991.

<sup>14</sup> Such measures included the abolition of controls on interest rates, the relaxation of exchange controls, permission for intermediaries to introduce new instruments (e.g., barcertificates of deposit, money market funds), the relaxation of barriers to the participation of foreign institutions in national banking and securities markets, and the dismantling of cartels that traditionally managed local stock and bond markets.

<sup>15</sup> Examples included movement of funds (and the best corporate customers) out of banks and into less-regulated securities markets, the crowding out of private investment by rising governmental financing needs, the inefficient allocation of available financing, and the need to compete with other countries for the jobs and investment promised by a burgeoning financial services industry.

Table 6-2—International Financial Transactions, 1978-1990 (In billions of dollars)

	1978	1980	1982	1984	1986	1988	1989	1990	1991
<b>International bank lending</b>									
(net stocks) . . . . .	530	810	1,020	1,285	1,790	2,380	2,640	3,350	3,610
<b>International bond financing</b>									
(net stocks) . . . . .	NA	NA	NA	390	700	1,085	1,252	1,473	1,651
<b>New international bond issues</b>									
(net flows) . . . . .		29	28	58	90	163	144	166	122
<b>Euro-commercial paper</b>									
outstanding . . . . .	NA	NA	NA	14	53	59	70	80	

NOTE: NA indicates that data was not available.

SOURCE: Bank for International Settlements, *Annual Reports*, various issues; International Monetary Fund, *International Capital Markets: Developments, prospects, and Policy Issues* (Washington, DC: International Monetary Fund, 1992).

the cross-national Euro-currency markets. Capital decontrol, financial deregulation, and the expansion of international financial markets worked together to widen and deepen the canals that link national financial reservoirs. More concretely, this translated into a remarkable expansion of cross-border bank lending, a growing movement of corporate bond issuers into new offshore markets, and the development of new commercial paper markets wherein MNEs, in particular, could raise funds from investors without going through banking intermediaries. Table 6-2 charts these trends in international financial transactions.

Although such data obscure the fact that the capital flowing through these markets is far from uniform—for example, obligations denominated in U.S. dollars have historically dominated most market segments—the overall picture is of a startling rise in the volume of cross-border financial transactions. A recent survey by *The Economist* puts the numbers into perspective.<sup>16</sup> In the early 1980s, the ratio between the cross-border lending of banks and the aggregate gross domestic product (GDP) of Organization for Economic Cooperation and Development (OECD) countries was 4 percent; 10 years later it stood at 44 percent. Partly reflecting a rising fiscal deficit and a search for new financing sources, the proportion of U.S. Government bonds held by

foreigners rose from 7 percent in 1970 to 17 percent in 1988. (For Germany, comparable figures were 5 percent in 1970 and 34 percent in 1988.) Between 1980 and 1990, the annual volume of cross-border transactions in stocks ballooned from \$120 billion to \$1.4 trillion, a compound growth rate of 28 percent a year. Table 6-3 provides an indication of the expanding foreign participation in national stock and bond markets.

The rate of expansion in other financial markets has also been dramatic. Daily turnover on foreign exchange markets in the mid-1980s was estimated at just over \$300 billion; in the early 1990s it is estimated at over \$900 billion. As table 6-4 shows, during the same period cross-border markets for various types of financial derivatives mushroomed in both absolute and relative terms as MNEs, other investors, and financial intermediaries sought ways to hedge their financial risks or to profit from financial volatility.

This growth in international financial transactions has occurred while governments have been seeking a new balance in their financial policies. While aiming to maximize the efficiency gains promised by open, competitive markets, they must also attempt to minimize the potential costs associated with increased market instability. In contemporary financial markets, the interests,

<sup>16</sup>“Survey of the World Economy,” op. cit., footnote 8, p. 9.

**Table 6-3-Cross-Border Transactions In the Stock and Bond Markets of Selected Countries, 1970-1990**  
(as a percentage of GDP)

	1970	1975	1980	1985	1990
United States .....	3	4	9	36	93
Japan .....	NA	2	7	61	119
(West) Germany .....	3	5	8	34	58
France .....	NA	NA	8	21	53
Italy .....	NA	1	1	4	27
United Kingdom .....	NA	NA	NA	368	690
Canada .....	6	3	10	27	64

NOTE: NA indicates that data was not available.

SOURCE: Bank for International Settlements, *62nd Annual Report* (Basle, Switzerland: BIS, 1992), p. 193.

operations, and inherent structures of MNEs are at the center of this balancing effort. By linking national markets, they effectively embody the conditions of financial interdependence currently confronting all governments. In such a context, governments face incentives both to cooperate and to compete with other governments in structuring and overseeing the markets within which MNEs operate.

In principle, mechanisms for advancing their competitive impulses are relatively straightforward; governments can regulate or deregulate, tax or subsidize, open or close the markets they oversee. As those markets become more deeply integrated, however, mechanisms for cooperation, unavoidably intergovernmental in character, become more difficult to create, just as the risks they must address become more complex. As financial markets expanded during the 1970s and 1980s and greater numbers of corporations and financial intermediaries embarked on multinational strategies, a disjunction became increasingly evident between the global logic of financial integration and the continuing reality of decentralized political authority over financial markets. In 1974, for example, the failure of Herstatt Bank in Germany and the Franklin National Bank in the United States sent regulators around the world scrambling for ways to insulate

their national markets from the potential fallout in the worst case or to stabilize their interdependent markets in the best case. The dilemma became even more acute with the onset of the developing country debt crisis that followed Mexico's near default in August 1982.

In the absence of clear international governing arrangements, regulators have been concerned about the widening of potentially dangerous regulatory gaps that can distort competitive conditions to the detriment of national or global welfare. Internationally linked financial markets and the continued responsibility of national political authorities for both market stability and macroeconomic management have highlighted a need for more coordinated prudential oversight in the financial sector.<sup>17</sup>

The results of intergovernmental efforts in the financial regulatory arena have thus far been uneven. Some successes have been achieved in promoting the norm of capital mobility, encouraging higher and more common capital requirements for international banks, and enhancing the safety of cross-border payments-clearing systems. More difficult have been efforts to coordinate the treatment of other kinds of banking risks, regulations governing securities firms and markets, tax policies influencing financial flows, and approaches to managing the systemic risks poten-

<sup>17</sup> See Franklin R. Edwards and Hugh T. Patrick (da.), *Regulating International Financial Markets: Issues and Policies* (Dordrecht: Kluwer Academic Publishers, 1992); Joan Spero, "Guiding Global Finance," *Foreign Policy*, No. 73, winter 1988/89, pp. 114-34; and Ethan Kapstein, *Governing the Global Economy: International Finance and the State* (Cambridge, MA: Harvard University Press, forthcoming).

Table 6-4—Selected Financial Derivative Markets, 1986-1991 (In billions of dollars)

Instruments	1986	1987	1988	1989	1990	1991
Interest rate options . . . . .	516	<b>609</b>	1,174	1,588	2,054	3,231
Currency options and futures . . . . .	49	74	60	66	72	77
Stock index options and futures . . . . .	18	41	66	108	158	210
Interest rate swaps . . . . .	400	683	<b>1,010</b>	<b>1,503</b>	<b>2,312</b>	<b>2,750</b>
<b>Currency and interest/currency swaps . . . . .</b>	<b>100</b>	<b>184</b>	<b>320</b>	<b>449</b>	<b>578</b>	<b>700</b>
Other . . . . .	NA	NA	NA	<b>450</b>	<b>561</b>	<b>630</b>
<b>Total . . . . .</b>	<b>1,083</b>	<b>1,591</b>	<b>2,630</b>	<b>4,164</b>	<b>5,735</b>	<b>6,900</b>
<b>Ratio of total to OECD GDP . . . . .</b>	<b>0.10</b>	<b>0.13</b>	<b>0.19</b>	<b>0.29</b>	<b>0.35</b>	<b>0.40</b>

NOTE: NA indicates a non-applicable category during these years.

SOURCE: Bank for international Settlements, 62nd *Annual Report*, p. 192.

tially created by new financial products.<sup>18</sup> Complicating such coordination efforts is the possibility that MNEs and intermediaries will seek to avoid the higher costs that can be entailed. If all leading states are not included in the coordination process, business activity might drift to those not included. Similarly, if less tightly regulated or less heavily taxed markets exist within smaller jurisdictions (e.g., Luxembourg, Cayman Islands, Netherlands Antilles, Channel Islands), opportunities for circumvention can remain.

Global financial markets are thus evolving in a context defined, on the one hand, by increased openness and innovation and, on the other hand, by the efforts of governments and central banks to find new ways to ensure overall market stability and safety. Together with the effects of fluctuating exchange rates, this context confronts MNEs with both incentives and opportunities to engage in hedging strategies.

The MNE structure itself provides the surest and most enduring mechanism both for coping with financial uncertainties and for taking advantage of new financial opportunities. Having operations in an expanding number of jurisdictions can offset various financial risks. Firms may also establish multicurrency credit lines, issue bonds and equity shares in offshore markets, decentralize the funding operations of foreign

subsidiaries, and bypass traditional financial intermediaries. Firms can accomplish this by issuing their own securities in a broadening range of foreign markets. As figure 6-8 suggests, this has reduced the direct financing role of banks across the industrial world, although there remain striking differences among particular national cases, a matter examined below. In very practical terms, the pursuit of such activities furthers the process of global financial integration.

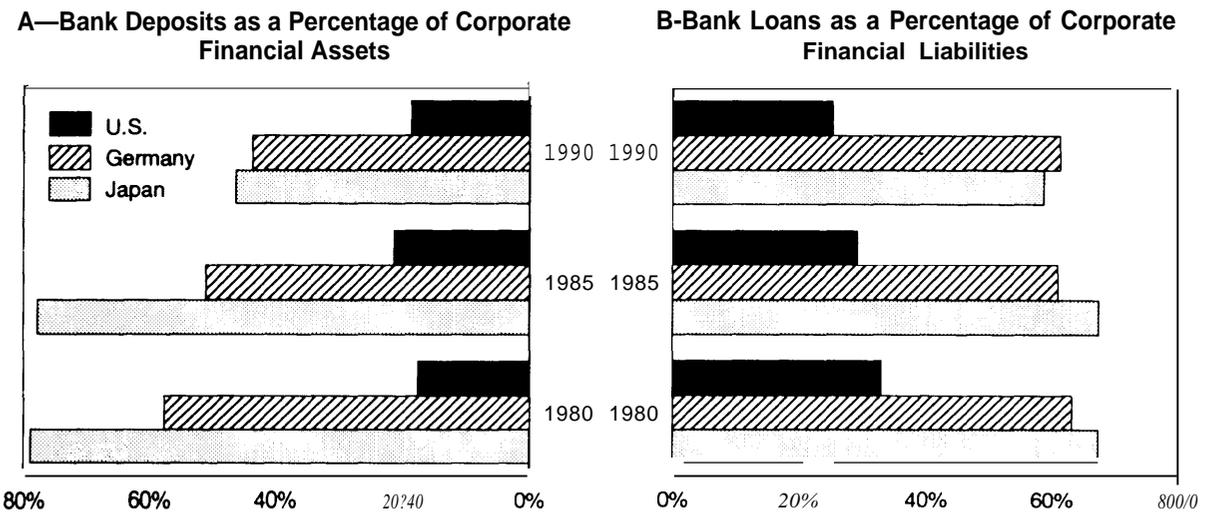
## FINANCIAL INTEGRATION AND NATIONAL STRUCTURES

While various indicators and the experience of MNE managers attest to the broadening trend toward financial market integration, significant room for debate remains on the question of how far that trend has actually progressed across specific markets and sectors. Economists typically measure integration in terms of the convergence of prices. France and Germany, they would argue, may be said to have an integrated capital market when the effective cost of capital for investments of equivalent risk is the same in Brest as in **Stuttgart**.

In fact, intense theoretical and empirical debate surrounds the issue of how far financial integra-

<sup>18</sup> See International Monetary Fund, *International Capital Markets: Developments, Prospects, and Policy Issues* (Washington, DC: IMF, September 1992), pp. 10-24.

Figure 6-8—indicators of the Relative importance of Banks in the Financing of Corporations in the U.S., Germany, and Japan



SOURCE: IMF, *International Capital Markets: Developments, Prospects, and Policy Issues* (Washington, DC: International Monetary Fund, 1992), p. 3.

tion measured in such terms has progressed.<sup>19</sup> On one side of the debate are those who argue that differences in national capital costs are more apparent than real. Measurement problems account for much of any obvious difference, they contend, and the erosion of national barriers to capital mobility should eventually close any residual gaps. On the other side are those who argue that systematic differences remain in the effective capital costs facing, for example, similarly situated U. S., Japanese, and German corporations. Despite difficult definitional standards, proponents of this position often conclude that at the heart of the matter are enduring differences in the time-horizons of the ultimate providers of capital to such corporations.

Beyond the theoretical debates of economists, analysts have tried to gather data on the percep-

tions of corporate executives concerning comparative capital costs and investment time horizons. One recent study surveyed senior officials in 15 capital-intensive U.S. firms under significant competitive pressure from Japanese rivals. Views about the availability or importance of low-cost capital to the Japanese were deeply divided. Executives perceiving themselves to be slightly ahead of their rivals minimized the importance of capital cost differences, while those behind emphasized the issue. Across the board, however, came the view that their Japanese competitors behaved ‘as if’ they had lower capital costs. The authors of the study concluded: “Once leadership is lost in a particular market, the firm that is able to behave as if it has a lower cost of capital—whether or not it actually does—has an obvious advantage. It will be willing to invest at a more

<sup>19</sup> See U.S. Congress, Office of Technology Assessment, *Making Things Better: Competing in Manufacturing*, Op. cit., footnote 1, chapter 3. For a comprehensive and timely review of the analytical literature on the issue, see W. Carl Kester and Timothy A. Luehrman, “Cross-Country Differences in the Cost of Capital: A Survey and Evaluation of Recent Empirical Studies,” Michael Porter et al., *Capital Choices* (Boston, MA: Harvard Business School Press, forthcoming).

rapid clip than its competitors.’<sup>20</sup> But what factors can contribute to the perception of firms that they can behave as if they had lower capital costs than their rivals? One of the most prominent hypotheses relates to fundamental financial structures rooted in national traditions of corporate and market governance.<sup>21</sup> At that level, the widely hailed phenomenon of financial market integration takes on a different look.

A recent study for the private-sector Council on Competitiveness points out that the wellsprings of productive investment are complex and variable.<sup>22</sup> Beyond project-specific circumstances, national macroeconomic factors clearly exert a strong influence. Also influential are nationally distinctive mechanisms for allocating capital. These mechanisms may be seen as having two interactive dimensions, one external to the business and one internal. The external dimension refers to the structure of the major capital market within which the enterprise operates, usually its ‘home’ market. The internal dimension refers to the ownership structures, management practices, and behavioral norms embedded in the firm itself. Capital for specific projects is effectively raised from either or both sources. In an aggregate sense, such systematic differences exist in the capital allocation mechanisms available to U. S., Japanese, and German firms that two distinct types may be drawn. The study characterizes the U.S. mechanism as a “fluid capital” system centered around transient owners and the need for corporate managers to maximize narrowly defined

investment returns (e.g., stock prices). Conversely, the Japanese and German systems are labeled ‘dedicated capital,’ with their centers of gravity being permanent owners and managers driven by the goal of corporate perpetuity. Figure 6-9 depicts the interactive variables at work in these two systems, while table 6-5 sketches broad distinctions in ownership patterns.

Viewed as ideal types, each of these two systems of capital allocation has its own strengths. In theory, the U.S. system more quickly allocates resources and captures emerging opportunities. It also provides higher returns to individual investors and produces fairer, more transparent financial markets. The German and Japanese systems, conversely, tend to boost productivity in existing businesses, promote internal diversification into closely related fields, and promise what one analyst terms “higher social returns.”<sup>23</sup> Arguments concerning the negative consequences of both systems abound, but the most common accusation is that the U.S. system can encourage firms to underinvest in their core businesses and leave shareholders with few instruments for disciplining corporate managers, while the German and Japanese systems can tend toward overinvestment and inefficiencies that make it difficult to redeploy resources into emerging Sectors.<sup>24</sup>

Both systems are under some pressure from the trend toward more open and interpenetrated national markets. For this reason, many economists expect the value of the respective benefits

<sup>20</sup> Joseph Morone and Albert Paulson, “Cost of Capital: The Managerial Perspective” *California Management Review*, vol. 33, No. 4, summer 1991, pp. 9-32. Also see James Poterba and Lawrence H. Summers, “Time Horizons of American Firms: New Evidence from a Survey of CEOs,” Porter et al., *Ibid.*

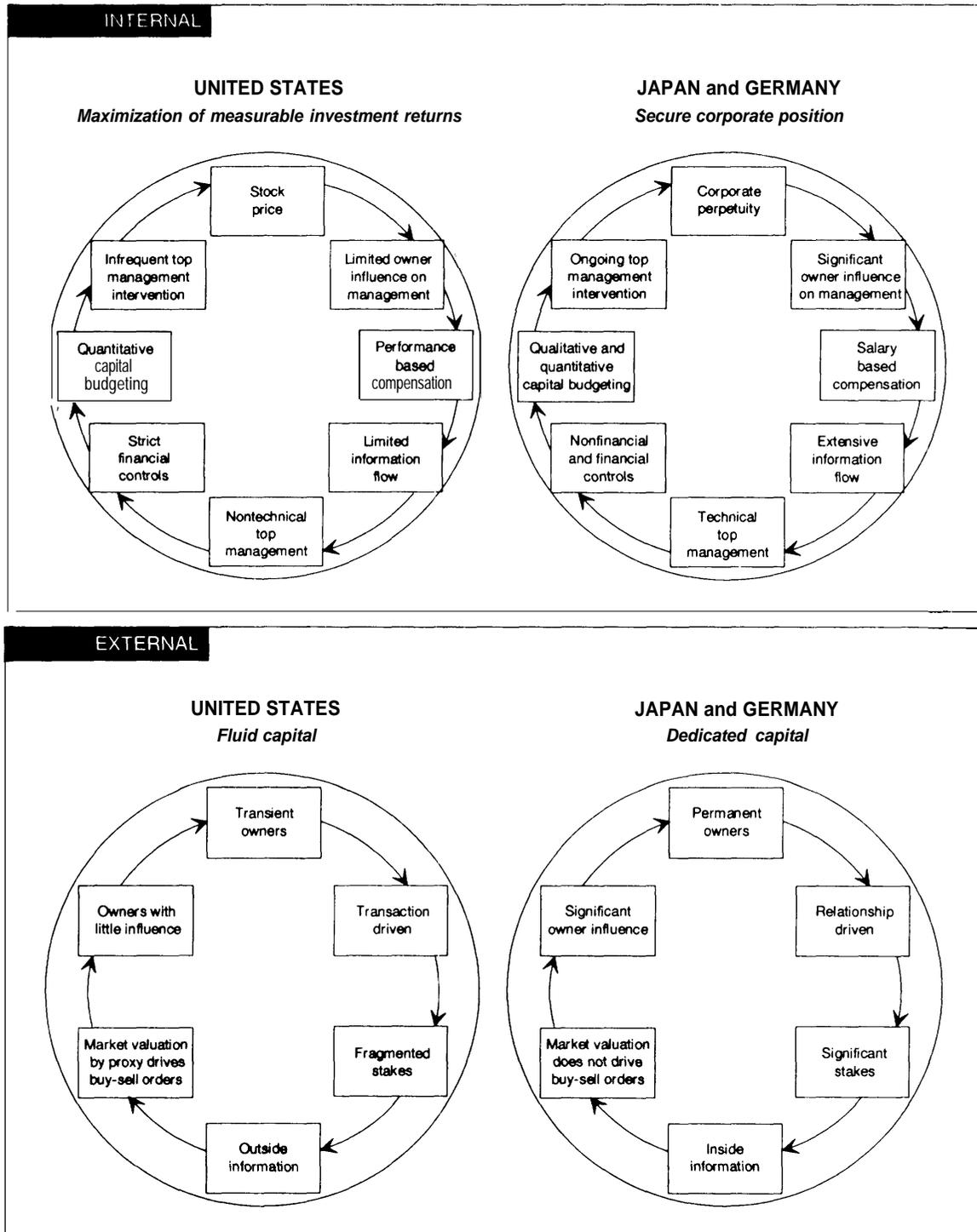
<sup>21</sup> See, for example, John Zysman, *Governments, Markets and Growth: Financial Systems and the Politics of Industrial Change* (Ithaca, NY: Cornell University Press, 1983); Michael Bonus et al., *The Highest Stakes: The Economic Foundations of the New Security System* (New York, NY: Oxford University Press, 1992); and Allen B. Frankel and John D. Montgomery, “Financial Structure: An International Perspective,” *Brookings Papers on Economic Activity*, vol. 1, 1991, pp. 257-310.

<sup>22</sup> Michael Porter et al., *Capital Choices, Changing the Way America Invests in Industry*, a report presented to the Council on Competitiveness and co-sponsored by the Harvard Business School, June 1992.

<sup>23</sup> *Ibid.*

<sup>24</sup> *Ibid.*, p. 13. Also see Alfred Chandler, “Competitive Performance of U.S. Industrial Enterprises: A Historical Perspective,” Porter et al., *op. cit.*, footnote 19.

Figure 6-9-External and Internal Capital Allocation Mechanisms



SOURCE: Adapted from Michael Porter et al., *Capital Choices*, A Report to the Council on Competitiveness and co-sponsored by the Harvard Business School, Juno 1992, pp. 9-10.

they provide to firms to be equilibrated eventually. For MNE managers, however, ‘eventually’ can seem a long time. Even though figure 6-8 indicates a broad shift away from banks in the field of corporate finance, it is noteworthy how bank-centered the Japanese and German systems remain.<sup>25</sup> It also bears underlining that the extent of actual regulatory change varies across countries, a variance that can have protectionist effects.<sup>26</sup>

During periods of heightened financial uncertainty, as well as when facing very long-term and large-scale investment decisions, an MNE belonging to a relatively less open, bank-centered network may have a distinct and lasting advantage over MNEs more dependent on decentralized and open capital markets. To the extent that the bank at the center of such a network becomes fully engaged in dynamic international financial markets, the associated MNE may have the best of both worlds: access to leading-edge financial innovation and information as well as credible assurance of fall-back capital resources for both emergencies and new opportunities.<sup>27</sup>

**MNEs AND MULTILATERAL COOPERATION**

Multinational enterprises are inherently adaptable. As long as they can establish themselves in different national jurisdictions, they are capable of adapting to any feasible international capital regime. When capital controls and rigid regulatory structures were in place, they had little difficulty funding their operations in separated national markets or in incipient offshore markets.

**Table 6-S-Estimated Comparative Pattern of Ownership and Agency Relationships in U.S., Japanese, and German Industry (In percent)**

	Us.	Japan	Germany
Individuals . . . . .	30-35	20	4
Institutional owners . . . . .	2	40	27
Institutional agents . . . . .	55-60	6	3
Corporations . . . . .	2-7	30	41
Government . . . . .	Negligible	Negligible	6
Foreign investors . . . . .	6	4	19

SOURCE: Michael Porter et al., *Capital Chokes, A Report to the Council on Competitiveness* and co-sponsored by the Harvard Business School, June 1992, p. 42.

But when capital decontrol became the norm, their financial options expanded and their dependence on banks generally declined, albeit to different degrees. Because of this enhanced flexibility, and despite the increased risks involved, MNEs appear to prefer an open international financial system.

Nevertheless, MNEs cannot themselves ensure the stability of open financial markets. For this, they must rely on governments and central banks. Beyond financial oversight functions, they also seek more specific governmental assurances (e.g., in support of large-scale investment in leading-edge high technologies) and, often, indirect assistance in underwriting health care, pension, and other costs.

The costs of such governmental services must be borne by someone. Fully open capital markets and the availability of multinational options potentially work to ensure that the most mobile, creditworthy, and externally oriented firms, sec-

<sup>25</sup>Michael L. Gerlach has recently presented extensive evidence on this score for the Japanese case. See *misalliance Capitalism: The Social Organization of Japanese Business* (Berkeley, CA: University of California Press, 1992); and “Twilight of the Keiretsu? A Critical Assessment,” *Journal of Japanese Studies*, vol. 18, No. 1, winter 1992, pp. 79-118. Also see Louis Pauly, *Regulatory Politics In Japan: The Case of Foreign Banking* (Ithaca, NY: Cornell East Asian Series, No. 45, 1987).

<sup>26</sup>The U.S. Trade Representative’s Office recently challenged Japan on just such grounds. See Office of the United States Trade Representative, *1993 Trade Estimate Report on Foreign Trade Barriers* (Washington, DC: U.S. Government Printing Office, 1993), pp. 158-160.

<sup>27</sup>See Alfred Steinherr and Christian Huvencers, “On the Performance of Differently Regulated Financial Institutions: Some Empirical Evidence,” *CEPS (Centre for European Policy Studies) Research Report, No. 12*, December 1992. Universal banking structures, the authors conclude, may provide better support for the long-term investment strategies of the nonfinancial sector than the segmented structures characteristic of the United States and the United Kingdom.

tors, and factors of production avoid their full impact. In other words, taxes imposed directly or indirectly on national firms to help pay for new social programs now have more direct effects on the international competitiveness of those firms; they can also more readily prompt them to pursue multinational strategies. In the absence of countervailing action, this suggests that the least mobile firms, sectors, and factors will bear most of the burdens created when governments respond to pressures for expanded business and social guarantees.

If consequent political tensions provided an impetus to efforts aimed at reversing the trend toward capital decontrol, unilateral would hold little promise of success. The erosion of national political influence implied by the greater openness of contemporary financial markets and by the jurisdiction-spanning activities of MNEs and financial intermediaries now makes it necessary to address such tensions above the national level. This is the logic that has driven policy planning within the European Community and that has lately pushed central bankers to collaborate more intensively in other settings.

To the extent that global financial developments have distinctive and asymmetrical conse-

quences for individual nations, the implications go beyond issues of financial regulation and firm competitiveness. If modern democracy may still be said to rest on a social contract between government and the governed, the twin and related forces of global financial integration and multinational corporate expansion undermine many of the traditional ways in which that contract has been satisfied. They make much more problematic, for example, the effective targeting of subsidies, and they diminish the capacity of governments to control the pace and direction of adjustment to economic change. In short, while they can both open new avenues for enhancing economic growth and innovation, they make it difficult to direct financial resources drawn from a national base toward the solution of national problems. Given the costs and uncertain benefits of attempting to reverse the trend toward global financial integration, and mindful of the enhanced ability of firms to circumvent such an effort, the political dilemmas that result from its potentially uneven impact imply the need to craft new bargains at the multilateral level.