

**DISCUSSION DRAFT
FOR REVIEW AND COMMENT**

**Elements of Institutional Design in
Financial Services Legislation**

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Elements of Institutional Design in Financial Services Legislation

The federal government has enacted laws to authorize many different types of agencies and instrumentalities to serve as financial intermediaries. The federal experience with these institutions is robust and filled with lessons about the strengths, limitations and lifecycles of various institutional forms. In today's efficient financial markets, institutions must be well designed if they are to thrive and carry out their issues of institutional design are important to assure that the public purposes without creating undue risk to taxpayers.

This paper provides an overview of some of the distinctions in organization among financial institutions, with special focus upon government-sponsored enterprises (GSEs), in an effort to isolate and analyze the consequences of particular forms of organization and governance for the ability of a financial institution to serve its mission. The paper does this by presenting a typology of institutional forms and then exploring the advantages and disadvantages of each type of institution.¹

This paper is organized into five parts. Section I introduces a broad range of ownership and governance structures and presents advantages and disadvantages of each. The range includes two basic types, federal agencies and federal instrumentalities, plus some hybrid variations.

Federal agencies are organizations that are owned and controlled by government. By contrast, federal instrumentalities are organizations outside of the federal government that serve public purposes under law. Often they are completely private, in both governance and ownership, and operate under special charters that direct their activities to serving specified functions and public purposes. These organizations include investor-owned as well as cooperative institutions.

Section II explores more closely the legal attributes of federal instrumentalities, with special attention to the consequences of instrumentality status for private financial institutions, such as commercial banks, thrift institutions and government sponsored enterprises, that serve public purposes. While the law applicable to federal agencies has been well developed in the literature, the legal framework of government instrumentalities has been neglected as a coherent body of law.

Section III of the paper presents four criteria by which to assess the desirability of alternative ownership and governance structures: the institutional strength provided by the organizational option, flexibility to respond to evolving markets and circumstances, accountability to public purposes, and life cycle. Alternative structures are assessed according to the criteria.

Section IV takes a closer look at two case studies that illustrate a basic contrast in ownership and governance options for federal instrumentalities. The Federal Home Loan Bank System and Fannie Mae (the Federal National Mortgage Association) both are government sponsored enterprises that serve the U.S. secondary mortgage market. They are quite different in their operations today, and a good part of that difference relates to the contrast in ownership and governance between a cooperative structure and investor-ownership.

Finally, Section V closes by suggesting some concluding lessons. Perhaps the most important of these is that government instrumentalities need to be designed with an eye to the implications of their organization and governance structures for the lifecycle of the institution. In today's fast-moving financial markets, poorly designed financial institutions may not thrive. In many cases, today's financial markets may be so dynamic as to make it advisable to support particular activities through simple direct subsidies, rather than attempting to design special purpose institutions to serve the same ends.

I. Agencies and Instrumentalities: The Range of Organizational Forms

Institutions that serve public purposes in the credit markets of the United States range across a wide variety of forms, from organizations that are owned and controlled by government through those that are completely private in ownership and control. Figure 1, below, provides an overview of a range of alternatives with respect to ownership and control of financial organizations that serve public purposes in the United States.

One caveat is warranted: lawmakers can and do depart from the ideal organizational forms preferred by public policy specialists. Thus, policymakers may seek to create organizations that serve public purposes with private sector efficiency; often, however, the results confirm the fears of the specialists, by creating organizations that serve largely private purposes, but with public sector efficiency. Careful judgments are required before trying to draft legislation on the basis of a mix of organizational forms.² For each hybrid public-private form, it is likely that cleaner organizational lines could serve the same public mission more effectively.

Three of the organizations described below, the government agency known as Ginnie Mae and the government-sponsored enterprises known as (1) the Federal Home Loan Bank System, and (2) Fannie Mae, trace their origins to the 1930's when they were chartered to help overcome the major market failures that occurred in the

Figure 1

**Alternative Approaches to Ownership and Control
of Organizations That serve Public Purposes Prescribed by Law**

	Government Control (Federal Agencies or Hybrid Forms)	Member/User Control (Federal Instrumentalities)	Investor (Shareholder) Control (Federal Instrumentalities)
Government Ownership	Government Agencies (e.g. Ginnie Mae)	N/A	Hybrid (e.g. Federal Asset Disposition Assn., 1985-89)
Cooperative Ownership	Hybrid (e.g. Federal Reserve System; Freddie Mac 1971-85)	Pure Cooperative (e.g. Federal Home Loan Banks; Credit Unions; National Coop Bank)	N/A
Investor Ownership	Hybrid (e.g. Freddie Mac 1985-89)	Some User Representation on Boards of Fannie Mae, Freddie Mac, Sallie Mae	Fannie Mae and Freddie Mac, Investor-Owned Banks and Savings and Loan Associations

Great Depression. Afterwards, the organizations continued to serve important public purposes in overcoming imperfections in the residential mortgage market that resulted largely from legal restrictions upon portfolio lenders.

Those legal restrictions helped to create significant financial disparities between largely developed areas, where investment funds were available, and less developed regions, where mortgage money was scarce and therefore expensive. The Federal Home Loan Banks and Fannie Mae were able to sell their obligations in the areas where the investment money was available and relatively inexpensive; they used the money to provide mortgage funds in areas of scarcity. During the period when the United States imposed ceilings upon interest rates that banks and thrifts could pay to depositors, the government sponsored enterprises helped to provide funds to institutions that suffered from disintermediation, i.e., a strong outflow of depositors' money.

In addition to the interest rate ceilings, major underlying market imperfections related to legal barriers that restricted commercial banks and thrift institutions to serving limited geographic areas. Because Fannie Mae and the Federal Home Loan Banks were able to serve the entire United States under more favorable charters, they were able to overcome these market imperfections without requiring a special subsidy or government appropriations to serve their secondary market missions.

The life cycles of Fannie Mae and the Federal Home Loan Banks, sketched in Section IV, below, relate to the impact upon their missions now that federal laws have changed to remove ceilings on interest rates and to permit primary lenders to serve large geographic areas. These statutory improvements have removed the earlier market imperfections that Fannie Mae and the Federal Home Loan Banks had helped to overcome.

A. Organizations Owned and Controlled by Government (Government Agencies)

The federal government uses agencies to provide large amounts of credit, either directly or through loan guarantees, to housing, agriculture, education, small businesses and other sectors of the U.S. economy. Government ownership and control means that these agencies are a part of the Executive Branch of the U.S. government. With some variations, they are subject to a broad range of legal requirements including budget controls, the government appropriations process, limitations upon borrowing, civil service and classification laws, open-government and disclosure requirements, and laws relating to procurement, contracting out and acquisition and disposition of property. Federal law defines the types of loans each agency may provide, the eligibility of borrowers, relationships with third parties such as lenders who provide government-guaranteed loans, fees, and the location and staffing of offices.

On the one hand, freedom from the need to earn returns on equity and exemption from government taxation mean that federal credit agencies can afford to make loans to borrowers with higher loss rates than would be tolerable to a private lender, even without

access to governmental appropriations. On the other hand, whether or not an agency is successful at overcoming market imperfections, government frequently is tempted to use a government agency to channel a subsidy to favored constituencies and activities.

Also, the legal framework of the government agency imposes a broad range of input controls that restrict the ability of managers to respond to changing markets and public needs. One distinction among federal credit agencies deserves note: the wholly owned government corporation is an organizational form that frees some agencies from some of the input controls that can impede organizational effectiveness. To be a government corporation, the agency should operate on a financially self-sustaining basis, or at least on a potentially self-sustaining basis. If such an agency can support itself from fees and other income, then the legal form of a corporation can permit freedom from the appropriations process and other controls.³

In the United States, government corporations include the Government National Mortgage Association (Ginnie Mae) of the Department of Housing and Urban Development, the Overseas Private Investment Corporation (OPIC), and the Export-Import (ExIm) Bank. Credit agencies that are not government corporations include the Office of Student Financial Assistance of the U.S. Department of Education, units of the Department of Agriculture, the Small Business Administration, and (today, at least) the Federal Housing Administration of the Department of Housing and Urban Development.⁴

The relative effectiveness of federal agencies vis-a-vis private lenders has varied according to the state of the American economy. Many federal credit programs, especially for housing and agriculture, began during the Great Depression, when the private sector essentially had failed. At that time, the federal government was able to attract high quality leadership and staff; many federal credit agencies such as the Reconstruction Finance Corporation and the Federal Housing Administration were notable for their effectiveness. Today, the private economy in the United States displays significant efficiencies and dramatic capacity to adopt innovative technologies compared to many government agencies.⁵

B. Organizations Owned by Government but Privately Managed (Hybrid Organizations)

A second set of organizations includes those that are owned by government but managed by private individuals. In the United States, there are not many such hybrid organizations.

One interesting organization is the Corporation for Public Broadcasting, a nonprofit corporation that receives regular government appropriations, but is designated in its charter act as a private organization. The result is to free the Corporation from most of the input controls that otherwise would apply to a government agency. The Corporation can hire and fire its employees without regard to civil service and classification laws, can acquire and dispose of property, contract for services, rent or own real property, and generally conduct itself as a private institution. On the other hand, the

Corporation is subject to the vagaries of the appropriations process; recent reductions in government funding have led to increased reliance upon private resources.

Many pitfalls face this type of organization including the dangers of resentment from both the governmental and the private organizations that may find themselves in competition to provide similar services. In the course of the savings and loan debacle in the 1980s, for example, the Federal Home Loan Bank Board permitted creation of a hybrid organization known as the Federal Asset Disposition Association (FADA). FADA was intended to help the government dispose of assets taken from failed thrift institutions. While FADA's assets consisted of property owned by the U.S. government, a completely private board of directors governed the institution.

FADA's creation created a storm of controversy that soon led to congressional action to repeal its charter. In several years of operation, the Association failed to transact much business. There are indications that FADA failed to obtain support from the federal government employees at the Federal Savings and Loan Insurance Corporation whose cooperation was essential to FADA's success; some government officials expressed resentment at the high salaries paid to FADA officials for carrying out public functions that might have been implemented by a government agency. In 1989 the Congress created a temporary government corporation known as the Resolution Trust Corporation to perform FADA's functions on a large scale.⁶

C. Privately Owned Organizations Managed by Boards of Directors That Include Governmentally Appointed Members (Federal Instrumentalities)

One of the distinctive features of a special purpose charter is the way that it may specify the governance structure of a financial institution. Thus, some federal instrumentalities are privately owned but are governed by boards of directors that include members who are appointed by the government. The governmentally appointed members of their boards of directors give these instrumentalities a somewhat closer perceived relationship to the federal government than would be the case if all directors were elected by the private shareholders.

Precedent for the mixture of public and private directors goes back to the early nineteenth century and the second Bank of the United States; today this organizational form includes the Banks of the Federal Reserve System as well as government-sponsored enterprises (GSEs) such as Fannie Mae and Freddie Mac.

There is considerable agreement that, for investor-owned financial institutions, inclusion of a minority of publicly appointed directors does not significantly increase governmental control of the institution, at least in the United States. This surprising result (also true of the second Bank of the United States) can be attributed to the power of the shareholder-elected majority of the board, and also to the fiduciary requirements that the law imposes upon directors. All directors, whether shareholder-elected or government-appointed, have similar fiduciary responsibilities to the institution and its shareholders.⁷

In the United States there are few institutions that are privately owned but that operate under a board of directors whose members all are appointed by government. The single major exception is an important one: the Board of Governors of the Federal Reserve System. The President of the United States appoints the Federal Reserve Chair and the other Governors of the Federal Reserve Board. These governmentally appointed Governors, in turn, constitute a majority of the members of the Federal Open Market Committee, the important body that makes monetary policy in the United States. The unusual structure of the Federal Reserve System is a direct result of historical circumstances and the insistence of Marriner Eccles that he would not become President Roosevelt's Chairman of the Federal Reserve Board unless he were given the ability to carry out his governmental functions through a governmentally appointed board.

Freddie Mac presents another interesting case. Between its creation in 1971 and a change in the law in 1989, a board of government officials (the members of the Federal Home Loan Bank Board) managed it even though it was privately owned. The element of government control meant that Freddie Mac became subject to some federal laws such as the Freedom of Information Act, that otherwise apply only to government agencies.

Until Freddie Mac became an investor-owned company, Freddie Mac's owners were institutions of the savings and loan industry. For most of the years between 1971 and the late 1980s, that industry effectively dominated the Federal Home Loan Bank Board; this power relationship helped to limit potential disagreements that otherwise might have occurred between the private owners and the government officials who then served as Freddie Mac's board of directors. In 1988 a new law permitted Freddie Mac's stock to trade freely. The result was a substantial increase in the value of the stock and a windfall to the savings and loan associations that had held the stock up to that time.

Sallie Mae is a government-sponsored enterprise that includes substantial nonvoting investor stock, but that is governed by a tripartite board of lenders and educational institutions elected by shareholders and public directors appointed by the President of the United States. In practice, Sallie Mae's behavior, and especially the GSE's dedication to high returns, has not been distinguishable from the behavior of an investor-owned shareholder-controlled financial institution.

Thus, in the United States, the inclusion of a minority of governmentally appointed members on its board of directors does little to change the behavior of a financial institution. As shall be seen in Part IV below, this observation is true both for investor-owned companies and for those that are structured to be cooperatives.

D. Completely Private Organizations That Operate Under Special Legislation (Federal Instrumentalities)

The final category consists of instrumentalities that are privately owned and that operate under special laws that direct their activities to serving specified functions and public purposes. This category includes the instrumentalities with governmentally

appointed directors, discussed above, such as the Federal National Mortgage Association (Fannie Mae) and the Federal Home Loan Bank System. This category also includes institutions with directors who all are elected by shareholders. These institutions include commercial banks, thrift institutions and credit unions.

The distinguishing feature of all of these institutions is that they operate under special purpose charters that create a special set of benefits and, in return, attempt to confine the permitted activities of the institution to those specified by law.

As a matter of law, these special-purpose financial institutions are instrumentalities of government. In contrast to the ordinary private firm, established under general-purpose laws, these financial instrumentalities may engage only in those activities authorized under their enabling legislation.⁸ The consequence of the special-purpose charter of a financial institution is to transform many issues, that otherwise would be determined by the marketplace, into issues of public policy.⁹

Particular sectors of the economy, and most notably the residential mortgage market, may be served by competing institutions that are organized under quite different charters. In the United States the charters of commercial banks, thrift institutions (i.e., savings and loan associations) and credit unions are authorized under laws of this type. The Congress is perennially involved with political conflict among institutions that seek to obtain advantages by expanding their own charters while confining the charter authority of their competitors.

Often the enabling legislation confers special benefits upon such institutions. Banks, thrifts and credit unions, for example, benefit from access to federal deposit insurance; commercial banks have access to the payment system of the Federal Reserve; credit unions have a special income tax exemption; and so forth.

In return for these special benefits, the enabling legislation also may impose public policy goals upon these institutions. Banks and thrift institutions, for example, are subject to the requirements of the Community Reinvestment Act and the Home Mortgage Disclosure Act. For years, banks and thrift institutions were limited in the geographic areas that they could serve; even today, notwithstanding the likely enactment of financial modernization legislation, the law will continue to create impediments to banks or thrift institutions that might wish to integrate their lending businesses with the provision of financial services such as insurance or securities underwriting, despite the economic convergence of those activities.

Like banks and thrift institutions and other special-purpose institutions chartered by special laws, the GSEs also are limited to providing the financial services set forth in their authorizing legislation. The charter acts of Fannie Mae and Freddie Mac, for example, limit the GSEs to serving a secondary market function with respect to residential mortgages of a specified size and quality. While their charters may limit the activities of instrumentalities, the private ownership and control of these institutions

makes it extremely difficult for the government to hold them accountable for service to particular public purposes.

The legal language of the charter act also has a direct bearing upon governance and control by the way that it specifies whether an organization will be owned by investors or by cooperative members or by some combination. Thus, commercial banks and thrift institutions include investor-owned as well as mutual institutions.

GSEs also exhibit a variety of forms. In contrast to Fannie Mae and Freddie Mac, that are investor-owned, the Farm Credit System and Federal Home Loan Bank System are government-sponsored enterprises that are structured to have a cooperative form.

The cooperative form differs from investor-control in the incentives that it creates for the institution. The Farm Credit System, for example, failed financially in the 1980s when it extended credit to its borrower members on terms that were far more generous than would have been offered by a profit-seeking institution.

Banks and thrift institutions and other borrower members own the Federal Home Loan Bank System; the Federal Home Loan Banks are very careful not to compete with their members in offering financial services. As a result, the Federal Home Loan Bank charter has become increasingly outmoded as the Bank System is pushed into ever less important lending functions. In recent years some of the Federal Home Loan Banks have sought to revive their public purposes through a variety of new programs and legislative proposals.

Federal law also has created a unique cooperative organization, the National Consumer Cooperative Bank. The Bank, now calling itself the National Cooperative Bank, began under federal auspices and soon converted to a completely private institution that benefited from advantages such as a large long-term low-interest loan from the government.

The organization also moved upscale from its origins as the intended financial supporter of small consumer cooperatives. Today the Bank serves primarily large producer cooperatives that have complete access to the financial markets and that draw upon funds from the National Cooperative Bank only when the loan terms are more favorable than those elsewhere. As a technical matter, amendments to the Bank's enabling legislation have transformed the institution from a federal instrumentality into a completely private company, without a special public mission, that happens to be organized under a federal charter rather than a state charter.

II. Financial Institutions That Serve as Instrumentalities of Government

From the early days of the United States, the government has used private institutions to serve as instruments of government policy.¹⁰ Instrumentalities include

institutions that the federal government charters directly as well as some institutions that are formed under the laws of a state.¹¹

Financial institutions that are federal instrumentalities include government-sponsored enterprises,¹² commercial banks, thrift institutions, and credit unions.¹³ The Federal Reserve System consists of two elements; the Board of Governors is an agency of the United States,¹⁴ while the privately owned Federal Reserve Banks are instrumentalities.

To keep the discussion manageable, this paper will cover investor-owned or cooperative instrumentalities of government, but will not discuss nonprofit organizations except in passing. Nonprofit instrumentalities include federally chartered organizations such as Ronald Moe has described.¹⁵ They also include state-chartered nonprofit corporations such as some housing finance agencies or student loan finance agencies that states organize as nonprofits rather than state agencies to carry out a variety of activities in furtherance of public purposes.

When the Federal government creates instrumentality status for a private financial institution, the institution gains benefits and responsibilities, compared to the ordinary private firm. Perhaps most important, the federal instrumentality is usually limited by law in the range of financial services that it may provide. The federally chartered financial institution operates under enabling legislation that, similar to authorizing laws for federal agencies, defines the powers and sometimes the types of customers or geographic areas that the financial institution may serve. For example, economists have traced the financial vulnerability of commercial banks in the United States during the Great Depression to federal laws that restricted them to narrow geographic markets.

Figure 2, below, summarizes some of the approaches that have been used in the United States to promote accountability to public purposes. In return for such limitations, the federal instrumentality gains a number of benefits, generally including an express or implied government guarantee of deposits or other borrowings, access to the payments system of the Federal Reserve System, and often other advantages such as tax exemptions or preferences. Often the federal government protects the instrumentality from competition from new entrants.

For government-sponsored enterprises this protection comes in the form of distinctive charters that are unavailable to new entrants unless they somehow obtain enactment of special charter legislation; for commercial banks and thrift institutions, this protection has traditionally come from federal agencies that were reluctant to issue new charters if they felt that excessive competition might result.¹⁶

As federal instrumentalities, financial institutions operate within a legal framework that applies many federal laws and preempts conflicting state laws,¹⁷ including tax laws.¹⁸ On the other hand, to the extent that instrumentalities are privately owned and controlled, they are exempt from constitutional due process requirements¹⁹ and laws that apply expressly to federal agencies.²⁰

Figure 2
Promoting Accountability of Private Institutions
to Public Purposes

- Charter Act Limitations on Authorized Powers
 - permitted functions
 - eligible market segments
 - eligible members or borrowers
 - requirement to serve less profitable market segments

- Governance/Organization Requirements
 - inclusion of directors appointed by government
 - inclusion of directors to represent particular constituencies
 - specification of investor or cooperative or nonprofit structure

- Supervision by a Government Agency
 - oversight or regulation of activities
 - required approval of new activities
 - supervision of safety and soundness

- Transition or Sunset Provisions
 - transition to competitive market activities at the end of government subsidy (e.g. repayment of government stock or loans)
 - transition to a completely private board of directors at the end of government subsidy
 - transition to a completely private company, without government sponsorship

- Exclusivity or Nonexclusivity of Charter
 - extent that the charter initially is exclusive to one company
 - extent that the government later permits other companies to operate under similar charters or on similar terms

From the perspective of organization and governance, the legal framework of federal instrumentalities has special consequences. Most important, the federal government lacks the general business corporation laws that are common features of state law. This means that important issues of governance, relations of owners of a financial institution to the board of directors, and shareholder rights generally may be undefined, or only loosely defined, by the federal law that governs federally chartered institutions such as national banks and government sponsored enterprises.²¹ In some cases, it may be necessary for the institution's federal supervisor to issue regulations that may help to supplement sparse legislative language and avoid confusion.

Because their performance in the marketplace relates closely to the extent that their charters provide advantages over competitors in the same markets, federal instrumentalities provide interesting lessons for the design of financial institutions in the future. In particular, Fannie Mae, and its companion Freddie Mac, provide an interesting contrast with another government-sponsored enterprise, the Federal Home Loan Bank System.

The contrast is especially useful because of the comparability in advantages, and especially the benefits of an implied guarantee of debt obligations plus tax preferences, that the law provides for these GSEs. That comparability of competitive advantage, albeit combined with somewhat different powers, permits the analyst to attribute much of the difference in performance of the institutions to their governance structure. Section IV, below, illustrates the contrast in governance for the three GSEs and the implications of the governance structure for financial performance.

III. Criteria for Assessing the Desirability of Alternative Organization and Governance Structures

In assessing alternative structures it is useful to suggest criteria by which policymakers can begin to assess their advantages and disadvantages. Based upon research on institutions in the United States,²² four criteria suggest themselves: (1) the institutional strength provided by the organizational option, (2) flexibility to respond to evolving markets and circumstances, (3) accountability to public purposes, and (4) life cycle.

Consider each of these in turn. Institutional strength leads the list of criteria because it is the *sine qua non* for providing financial services. A weak or incapable institution can drain resources rather than contribute to market developments. Especially if a troubled institution is endowed with public purposes, the political system may seek to prop it up with expensive amelioratives rather than admit failure.

Given the remarkable speed with which financial markets, and mortgage markets in particular, develop in many countries, flexibility is an attribute of increasing

importance. It is the criterion of flexibility that highlights the difficulties faced by many government agency credit programs today.

Accountability to public purposes is particularly important if an institution is to be more than merely a source of financial benefit for its private owners. Accountability requires careful consideration; an effective legal framework helps to mitigate or even avoid the potentially serious conflict between doing well and doing good, i.e., the tension between financial returns and service to parts of the market that otherwise might not be served.

Finally, it is important to attend to the life cycle of an institution. The law displays a systematic pattern of lagging behind the financial markets. This creates a need to consider carefully the life cycle and exit strategies for government agencies and government-sponsored enterprises and other institutions that are chartered under special laws. Inattention to life cycle can create an institution that is increasingly out of touch both with public needs and with the demands of the marketplace.

Consider now the application of these criteria to the organization and governance alternatives discussed above. Figure 3, below, summarizes the advantages and disadvantages of the three major organizational forms discussed above.

The government agency lends itself to performance of functions that rely upon uniquely governmental attributes, such as a continuing ability to subsidize activities and the authority to set requirements for the marketplace. However, for provision of financial services, a government agency lacks much of the flexibility and institutional strength that are available to institutions in the private sector. Accountability of government agencies to public purposes can be marred by micromanagement from policymakers and attention to a range of parochial issues such as maintenance of offices or staff in locations that would not be justified on the basis of greater public needs.

The cooperative organization provides a useful tool to support members such as lending institutions. However, the governance by a board elected by the members of the cooperative means that the institution always will support rather than compete with its members. This can be useful, especially at early stages of development of the mortgage market. However, as the mortgage market evolves, the cooperative organization can find itself displaced, possibly by its members as they gain powers directly, and possibly by competitors who begin to thrive at the expense of the cooperative and its members.

The investor-owned institution can have considerable institutional strength and flexibility. However, unless directed by provisions of its charter act, the profit-oriented investor-owned company will tend to move to the most profitable parts of the market, regardless of public purpose.

Figure 3
Alternative Organizational Forms in the United States:
Advantages and Disadvantages

	Government Corporation	Cooperative GSE	Investor-Owned GSE
Institutional Strength	may be limited by governmental restrictions, e.g. as to staffing or ways of doing business	limited by power of the cooperative owners	tends to be strong
Flexibility	can be flexible, subject to preferences of constituencies	can be flexible; limited by power of the cooperative owners	very flexible, within charter limits
Accountability to Public Purposes	yes, but sometimes with outside micro-management for parochial purposes	can be designed, especially initially, but members come first	can be designed, especially initially, but shareholders come first
Life Cycle	structure and functions can become outmoded or uneconomic	can become weak if the members diminish or if the members gain new powers	will try to expand its powers and charter benefits and dominate government oversight and its market

Again, those issues are best addressed by considering an institution's life cycle and the possible need to provide for a transition of the company to a completely private institution, without public benefits or public responsibilities, as the market overcomes the market imperfections that called for government involvement in the first place.

IV. The Impact of Organizational Form and Governance Upon Function: A Closer Look at Two Housing Finance Institutions in the United States

A. Introduction

The functions of an organization strongly determine the appropriate form for its structure. On the other hand, selection of a particular structure can have substantial impact upon the activities of the organization as well.

In the United States Fannie Mae and the Federal Home Loan Bank System each provide interesting lessons in this regard. The contrast between the dynamic and innovative Fannie Mae and the increasingly archaic Federal Home Loan Bank System relates in good part to the fact that Fannie Mae is investor-owned and shareholder-controlled while the Federal Home Loan Banks are owned and governed cooperatively by their member-borrowers.

Both Fannie Mae and the Federal Home Loan Bank System (hereafter, the "Banks") trace their origins to the Great Depression. The Federal Home Loan Bank System was created in 1932 as a part of the government's efforts to provide liquidity to the mortgage market. Fannie Mae began in 1938 to serve similar purposes, as a subsidiary of the huge New Deal credit agency, the Reconstruction Finance Corporation.

Today, both the Federal Home Loan Bank System and Fannie Mae are government-sponsored enterprises. They are privately owned and operate with boards of directors that include a minority of members appointed by the government. They both are secondary mortgage market facilities, but by law provide somewhat different financial services.

All GSEs benefit from special government privileges, including the ability to borrow large volumes of money less expensively than would be warranted by their creditworthiness alone, if considered without regard to their ties to the government. Their special privileges have helped to make Fannie Mae and the Federal Home Loan Bank System into some of the largest financial institutions in the United States, each holding housing-related assets amounting to hundreds of billions of dollars.

Thus, on average, Fannie Mae has more than doubled in size every five years since the government chartered Freddie Mac in 1970. The following table shows the growth of Fannie Mae, including its outstanding debt obligations plus outstanding mortgage-backed securities, between 1970 and 1995:

1970	1975	1980	1985	1990	1995
\$15.2 billion	\$ 30.0 billion	\$ 54.9 billion	\$ 149.0 billion	\$ 423.2 billion	\$ 812.4 billion

Source: CBO (1991) and OFHEO (1999) reports

The Federal Home Loan Banks also have used their GSE privileges to grow rapidly, in terms of their consolidated obligations outstanding:

1970	1975	1980	1985	1990	1995
\$10.5 billion	\$ 16.4 billion	\$ 37.3 billion	\$ 75.6 billion	\$ 117.9 billion	\$ 231.4 billion

Source: CBO report (1991) and FHLBS annual financial statements (1995)

To see how their governance structure affects financial performance, consider first the Federal Home Loan Bank System and then Fannie Mae.

B. The Federal Home Loan Bank System

The Federal Home Loan Bank System consists of twelve regional banks that provide collateralized loans, called "advances," to member financial institutions. Originally membership in the Bank System was limited largely to savings and loan associations. In 1989, after the savings and loan debacle greatly diminished the number of thrift institutions, the System's charter was expanded to provide for membership by other institutions, especially commercial banks with significant mortgage portfolios. The regulator of the Federal Home Loan Banks is the Federal Housing Finance Board (FHFB), an independent government agency.

The governance structure of each Federal Home Loan Bank includes a President/CEO and a fourteen-member board of directors. The board consists of eight shareholder-elected directors and six directors who are appointed by the FHFB. By law, at least two of the appointed directors must be consumer representatives. Each elected director is designated by the FHFB as representing members of a particular state included in the district served by the Bank.²³

The Federal Home Loan Banks provide their primary secondary market benefit in the form of collateralized loans to members who choose to borrow from the system. Because of GSE status, the Federal Home Loan Banks are able to offer longer maturity advances than may otherwise be available to members. A particular benefit of Bank advances is that they can help members to fund their mortgage portfolios with borrowings of comparable duration. The Banks also provide other services for their members, such as data processing and trustee services.

In earlier decades, Federal Home Loan Bank advances at times were essential to the savings and loan industry. At a time when the law limited thrifts to serving local market areas, the Federal Home Loan Bank System used its status as a GSE to borrow

money in cash-rich areas and provide those funds to local savings and loan institutions making mortgages in developing but cash-poor parts of the country. In the 1960's, the law imposed ceilings upon the interest rates that thrifts could pay for deposits. When interest rates rose, deposits flowed out of thrift institutions in a process known as "disintermediation." At such times, Federal Home Loan Bank advances provided a much-needed source to help thrift institutions to fund their mortgage portfolios.

Today, members see the Bank advance as merely one source of funds among many. The high collateral requirements to receive a Bank advance often make other sources more attractive. Indeed, many members buy stock in a Bank as a way to receive dividends rather than to receive advances.

The governance structure of the Banks helps to assure that they will support rather than compete with their members. One President/CEO of a very large Bank explains privately, for example, that the governance structure includes directors who are reelected to serve very long terms, plus a rotating series of President/CEOs. While the pattern for other Banks may vary, it is clear that the tenure of a Bank President/CEO depends directly upon the satisfaction of members with the quality of service that they receive from the Bank.

This leads to the interesting spectacle of reluctance of the Federal Home Loan Banks even to consider charter expansions, for example to guarantee mortgage-backed securities, that might interfere with the profits of their members. Over time, as the role of Bank advances has declined in importance, such charter expansions have seemed increasingly needed if the Banks were to continue to be relevant to today's dynamic mortgage market. Indeed, at the end of 1995, the Federal Home Loan Banks together held an investment portfolio, largely unrelated to any public purpose, that exceeded the total volume of advances outstanding.

The FHFB and the Congress have been seeking new missions and functions for the Bank System. Legislation is pending, for example, that will permit Banks to offer advances to their smaller members that could be collateralized by small business loans, agriculture, and rural and community development loans, and not merely home mortgages. It is not clear that the overcollateralized advance, even if the type of eligible collateral were expanded, can long remain a very competitive product in today's financial environment.

Even without obtaining legislation, the Federal Home Loan Bank of Chicago has developed a new mortgage funding program that may become a substitute for traditional advances. This new program, known as "Mortgage Partnership Finance" allows a lender that is a member of a Federal Home Loan Bank to originate mortgages that are funded directly by the Federal Home Loan Bank on the basis of its access to low-cost GSE funding. However, before it goes to significant scale, the program will need to overcome both operational and legal obstacles.

C. The Federal National Mortgage Association (Fannie Mae)

Fannie Mae provides an interesting contrast to the Federal Home Loan Banks. From its inception in 1938 until 1968, Fannie Mae served the secondary mortgage market as a federal government agency. Under its charter, Fannie Mae was permitted to purchase (but not originate) and sell residential mortgages that were insured by the Federal Housing Administration or guaranteed by the Veterans' Administration.

Fannie Mae served as a secondary mortgage market facility for lenders throughout the United States. Especially in early years, mortgage bankers used Fannie Mae's services; thrift institutions preferred to hold mortgages in portfolio rather than selling them.

Even as a government agency, Fannie Mae was able to use its market position to promote innovations in the residential mortgage market. For example, Fannie Mae helped to promote use of title insurance as a way to reduce dependence upon outmoded title registration and transfer systems.

In 1968, the United States government found itself compelled to deal with growing federal budget deficits. That year, the Johnson Administration proposed to sell Fannie Mae as a corporation to private shareholders, as a way to raise money. The government proposed to separate the secondary market functions into those that were profitable, to be carried out by the new private company, and those that were not profitable, to be carried out by a new government agency to be known as the Government National Mortgage Association (Ginnie Mae).²⁴

Originally, the Johnson Administration considered a cooperative structure for Fannie Mae, in part to assure that private parties would be willing to pay for sufficient stock in the new company. Under the Administration's finished proposal, the company was structured to be investor-owned, but with statutory provision for stock purchases by mortgage companies that sold mortgages to the company or serviced them. The board of directors consisted of a majority of shareholder-elected directors and a minority of directors appointed by the President of the United States.

The cooperative vestiges of early thinking about the 1968 proposal can be seen in the statutory requirements that at least one of the appointed directors shall be from the homebuilding industry, at least one from the mortgage lending industry, and at least one from the real estate industry. In practice, these requirements have been useful in strengthening ties between Fannie Mae and its constituent groups.

The sale of stock in the new company was a huge success. Fannie Mae's stock now is traded on the New York Stock Exchange. As a government-sponsored enterprise, rather than a government agency, Fannie Mae was able to gain considerable flexibility in its operations. An early step was to reduce the number of employees inherited from the government agency; for the remaining employees, salaries rose significantly.

In 1970, the Congress created a parallel secondary mortgage company known as Freddie Mac, the Federal Home Loan Mortgage Corporation. The thrift industry pushed for the creation of Freddie Mac to complement the Home Loan Bank System in supporting thrift institution activities through the secondary mortgage market.²⁵

As noted above, Freddie Mac's board of directors consisted of the three government officials who served as members of the government agency responsible for oversight of the thrift industry, the Federal Home Loan Bank Board. As government officials with limited compensation, the Federal Home Loan Bank Board tended to hold down compensation of Freddie Mac officials and employees to similar levels. Thus, one consequence of the difference in governance structures between Fannie Mae and Freddie Mac was that, especially in the 1980s, Fannie Mae's compensation packages tended to exceed those of Freddie Mac. Fannie Mae was able to use this disparity to attract talent from its rival.

By 1970, the growth of the private mortgage insurance industry meant that the Congress was ready to expand Fannie Mae's charter authority. Both Fannie and Freddie were permitted to deal not only in government-insured or guaranteed mortgages, but also in those that were backed by private mortgage insurance. Today, Fannie Mae and Freddie Mac are eligible to deal in investment-grade conventional (i.e. privately insured) mortgages up to a level specified by statutory formula, based upon new house prices each year.

Fannie Mae and Freddie Mac have continued to push, often successfully, for expansion of their charter authority. For example, the Congress in 1989 deleted a provision that limited the public purposes of Fannie Mae to providing "supplementary assistance" to the secondary mortgage market, and substituted broader language that the GSE shall provide "ongoing assistance" to the secondary market.

Fannie Mae and Freddie Mac have used their market position to help improve the functioning of the secondary mortgage market. In 1971 the two companies, with congressional support, helped to standardize mortgage forms in the United States.

The two companies today are deploying innovative technologies to reduce transactions costs and improve service to the mortgage borrower. Automated underwriting systems of the two companies, for example, help to expand the availability of mortgages to people who might not have qualified under traditional standards of creditworthiness. These changes are evolving at an accelerating pace. Indeed, a Freddie Mac analyst recently published a vision of a marketplace in which mortgages were completely integrated with other financial delivery systems.²⁶ Other financial institutions, that find themselves on the defensive in the competition with Fannie Mae and Freddie Mac, have begun to register some concern.²⁷

At the same time, the enterprises have used their market power to build a base of political influence that resists efforts of the government to make any changes in their

charters that management believes would not further the interests of the investor-shareholders. The U.S. Department of the Treasury has pointed to the "tension between profit and public purpose":

"When creating a GSE, Congress defines the problem (i.e., the market imperfection) it seeks to overcome, provides benefits (subsidies), and imposes limitations on the GSE. But if Congress wishes to revise those decisions in response to changing public needs, it no longer has the same freedom of action. In addition to the usual constraints of the legislative process, it must contend with the private interests of the GSE and its shareholders. Congress must consider, and legislate, any such changes through a process in which the GSEs are significant participants. As a private company, the GSE will act to fulfill its fiduciary responsibilities by promoting and protecting the interests of its shareholders."²⁸

The Congressional Budget Office (CBO) reported in 1996 that Fannie Mae and Freddie Mac, today's largest GSEs, keep a significant portion of their public subsidies (worth about \$ 6.5 billion to Fannie Mae and Freddie Mac in 1995) for shareholders rather than passing them on to homebuyers. The CBO further points out that concern about the apparent imbalance between the costs and benefits of the housing GSEs extends beyond the \$ 2 billion a year that they retain²⁹:

"One further concern is that Fannie Mae and Freddie Mac rather than public officials substantially control the amount of subsidy provided to the GSEs."³⁰

In other words, the investor-owned GSEs have gained so much power that they that their pursuit of investor returns may have begun to crowd out the public benefits. Their power also makes it difficult for the government to devise an exit strategy even if the public costs of all GSE activities, including about two trillion dollars of poorly supervised contingent liability for the government and taxpayers, begin to outweigh the public benefits.³¹

V. Conclusions

Several conclusions emerge from this review of organizational forms. First, in today's economic environment, private instrumentalities can be stronger and more flexible than government agencies in providing financial services. When a government agency organizes itself around financial functions, it tends to resist changes that may be needed to accommodate changes in those functions. Yet continuing organizational change may be essential, to accommodate the continuing evolution of technologies and the markets that the government agency seeks to serve.

Second, government instrumentalities too face difficulty in adapting to changing technologies and markets. The special purpose charter is vulnerable to changes in markets and public purposes. Unless constituencies are strong enough to obtain expansions of a special purpose charter, the institution may find itself, similar to the Federal Home Loan Banks, being pushed to the margins of relevant markets. The result can be irrelevance or, if diminishing returns lead to greater risk-taking, increased likelihood of financial failure and possible taxpayer exposure to financial losses.

With the increasing speed of evolution of technologies and markets, issues of lifecycle become very important for financial instrumentalities. Legislators need to incorporate exit strategies in special purpose charters before rather than after institutions are threatened with irrelevance or financial losses. The framers of early federal financial instrumentalities included twenty-year limits upon the terms of the special purpose charters of the two Banks of the United States, for example. At least with respect to many instrumentalities, such sunset provisions can provide the government an option to renew each statutory charter while also furnishing an opportunity for review of their public benefits and costs.

Third, the hidden cost of the proliferation of special purpose charters is the way that these shift marketplace decisions to government policymakers. The ordinary private firm does not benefit from special subsidies that government has provided to many instrumentalities, such as tax preferences, regulatory advantages or exemptions, or special guarantees such as deposit insurance or the implicit backing of GSE obligations. The ordinary private firm also does not benefit from the barriers to entry and competition that the government often erects around its instrumentalities in an effort to protect them from failure. Perhaps most important, the ordinary private firm goes out of business when it fails; by contrast, the instrumentality generally must be closed by a regulator or other government action.

The net result of the special competitive position of federal instrumentalities is that financial success tends to flow to the institutions with the most favorable charters rather than to the firm that best meets market needs. The government is remarkably unskilled at addressing the perverse effects of a subsidy when the subsidy attaches to a particular institution or type of institution rather than to the actual function that the government is trying to subsidize.

Fourth, the government may face special challenges in attempting to regulate the public benefits and limit the potential public costs of operations of government sponsored enterprises. The government subsidy for GSEs gives them the power to displace the competitors in the marketplace. Their market power, in turn, gives them the ability to dominate the political process as well.

Indeed, GSEs may find that they can gain greater benefit from manipulating the political process than they can from dealing with market forces. Thus, despite having lost their ability to serve a public purpose of significant value, the Federal Home Loan Banks have been able to turn to their congressional authorizing committees and to their federal

regulator, the Federal Housing Finance Board, to permit their entry into lines of business that they hope will be financially more attractive. This pattern of attempting active management of their political environment has been a hallmark of Mercantilist type companies and their successors in the United States, including the Banks of the United States and the transcontinental railroads.³²

Finally, in institutional design as in architecture, form follows function; the design of an appropriate governance structure for a financial instrumentality should relate to the functions that the institution is intended to perform. This leads to a recommendation: government policymakers should be careful before creating or expanding the role of instrumentalities in today's fluid financial markets. Just as technologies are forcing an unbundling of financial services that previously were conveniently lumped together, so too is it necessary today to unbundle government subsidies from institutional forms. The elements of financial policy today increasingly revolve around distributional issues rather than the need to overcome market imperfections that federal agencies and instrumentalities addressed so well in the past.

ENDNOTES

¹ With Philip Selznick, this paper defines an institution as an organization that internal and external constituencies have infused with value. That definition is especially applicable to government agencies and instrumentalities because of their dedication to public purposes in addition to other possible organizational goals. Philip Selznick, *Leadership in Administration: A Sociological Interpretation*, (Evanston, IL: Row, Peterson and Co., 1957), pp. 5-22.

² See, e.g., Harold Seidman, "The Quasi World of the Federal Government," *The Brookings Review*, Volume 2 (Summer 1988), pp. 23-27; and Ronald C. Moe, *Managing the Public's Business: Federal Government Corporations*, Congressional Budget Office, prepared for the Committee on Governmental Affairs, United States Senate, April 1995, Senate Print 104-18.

³ Federal government corporations are analyzed in Moe, *supra*, and are described in U.S. General Accounting Office, *Government Corporations: Profiles of Existing Government Corporations*, GAO/GGD-96-14, December 1995.

⁴ The contrast between government corporations and other federal credit agencies is discussed in, Thomas H. Stanton, "Improving the Design and Administration of Federal Credit Programs," *The Financier: Analyses of Capital and Money Market Transactions*, Vol. 3, No. 2, (May 1996), pp. 7-21.

⁵ Thomas H. Stanton, "Managing Federal Credit Programs in the Information Age: Opportunities and Risks," *The Financier: Analyses of Capital and Money Market Transactions*, Vol. 5, Nos. 2 and 3, (Summer/Autumn 1998), pp. 24-39; and Thomas H. Stanton, "Credit Scoring and Loan Scoring: Tools for Improved Management of Federal Credit Programs," PricewaterhouseCoopers Endowment, Washington, DC, July 1999.

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- 6 The performance of the RTC is discussed in Thomas H. Stanton, "Using Loan Asset Sales to Improve the Management of Federal Credit Portfolios," *The Financier: Analyses of Capital and Money Market Transactions*, Vol. 5, No. 1, (Spring 1998), pp. 5-16.
- 7 See, e.g., note, "Personal Liability of Directors of Federal Government Corporations," *Case Western Law Review*, Vol. 30 (summer 1980), pp. 733-79; and Herman Schwartz, "Governmentally Appointed Directors in a Private Corporation — The Communications Satellite Act of 1962," *Harvard Law Review*, Vol. 79 (December 1965), pp. 350-64.
- 8 See, e.g., Ronald C. Moe and Thomas H. Stanton, "Government-Sponsored Enterprises as Federal Instrumentalities: Reconciling Private Management with Public Accountability," *Public Administration Review*, July/August 1989, pp. 321-329.
- 9 Thomas H. Stanton, "Nonquantifiable Risks and Financial Institutions: The Mercantilist Legal Framework of Banks, Thrifts, and Government-Sponsored Enterprises," chapter 3 in Charles A. Stone and Anne Zissu, *Global Risk Based Capital Regulations*, Vol. 1, (Burr Ridge, IL: Irwin Professional Publishing), 1994, pp. 57-97.
- 10 The law governing federal instrumentalities derives largely from two cases involving the second Bank of the United States, *McCulloch v. Maryland*, 17 U.S. (4 Wheat.) 738 (1819); and *Osborn v. Bank of the United States*, 22 U.S. (9 Wheat.) 738 (1824).
- 11 See, e.g., *Westfall v. United States*, 274 U.S. 256, 47 S.Ct. 629 (1927) (state-chartered bank, member of the Federal Reserve System, is a federal instrumentality); *Weir v. United States*, 92 F.2d 634 (7th Cir., 1937), cert. denied, 302 U.S. 761, 58 S.Ct. 368 (1937) (state-chartered bank, insured by the Federal Deposit Insurance Corporation, is a federal instrumentality); and, more generally, *United States v. Brown*, 384 F. Supp. 1151 (E.D. Mich., 1974), reversed (affirmed on this issue), 557 F.2d 541, 559 (6th Cir., 1977) (Congress may confer instrumentality status upon an organization receiving federal financial assistance in furtherance of an announced national goal).
- 12 Among the cases defining GSEs as federal instrumentalities, see, *Smith v. Kansas City Title and Trust Company, et. al.*, 255 U.S. 180 (1920); *Federal Land Bank v. Bismarck Lumber Co.*, 314 U.S. 95 (1941); *Federal Land Bank v. Priddy*, 295 U.S. 229 (1935); *Fahey v. O'Melveny & Myers*, 200 F.2d 420 (9th Cir., 1952); *Northrip v. Federal National Mortgage Association*, 527 F.2d 23 (6th Cir., 1975); and *Rust v. Johnson*, 597 F.2d 174 (9th Cir., 1979).
- 13 Among the cases defining commercial banks and thrifts as federal instrumentalities, see, *First National Bank v. Missouri*, 263 U.S. 640 (1924); *First National Bank v. Fellows*, 244 U.S. 416 (1917); *Easton v. Iowa*, 188 U.S. 220 (1903); *Davis v. Elmira Savings Bank*, 161 U.S. 275 (1896); and *United States v. Nowak*, 448 F.2d, 134 (7th Cir., 1971).
- 14 See, e.g., *Melcher v. Federal Open Market Committee*, 644 F. Supp. 510 (D.C.D.C., 1986).
- 15 Ronald C. Moe, "Congressionally Chartered Nonprofit Organizations ("Title 36 Corporations"): What They are and How Congress Treats Them," Congressional Research Service, October 18, 1999.
- 16 Thus, J.F.T. O'Connor, Comptroller of the Currency under Franklin Roosevelt, ascribes much of the blame for bank failures during the Great Depression to excessive competition among banks:

"Charters were comparatively easy to obtain....Banks became too numerous; competition too great; necessity for profits too urgent. Eventually and inevitably it became fully recognized that banking is a matter of public concern affected with a public interest, and relief by effective regulation became imperative."

J.F.T. O'Connor, *Banks Under Roosevelt*, (Chicago, IL: Callaghan and Company, 1938), p. 7.

17 See, e.g., *Federal National Mortgage Association v. Lefkowitz*, 390 F.Supp. 1364 (S.D.N.Y., 1975); *Rust v. Johnson*, 597 F.2d 174 (9th Cir., 1979).

18 See, e.g., *Laurens Federal Savings and Loan Association v. South Carolina Tax Commission*, 365 U.S. 517, 81 S.Ct. 719 (1961).

19 See, *Roberts v. Cameron-Brown Company*, 556 F.2d 356 (5th Cir., 1977); and *Fidelity Financial Corporation v. Federal Home Loan Bank of San Francisco*, 589 F.Supp. 885 (N.D. Cal., 1983), *aff'd*, 792 F.2d 1432 (9th Cir., 1986).

20 Accord, *Rocap v. Indiek*, 539 F.2d 174 (D.C. Cir., 1976), applying the Freedom of Information Act to Freddie Mac on grounds that the GSE, although privately owned, was completely controlled by federal officials. At the time of the decision, federal law provided that Freddie Mac's board of directors would consist of the three federal officials who served as members of the Federal Home Loan Bank Board, a federal agency.

21 For an early study of this point, see note, "FNMA and the Rights of Private Investors: Her Heart Still Belongs to Daddy," *Georgetown Law Journal*, 59 (November 1970), pp. 369-92.

22 See, e.g., Thomas H. Stanton, "Assessing Institutional Development: The Legal Framework That Shapes Public Institutions," paper presented at the 1994 World Bank Conference on Evaluation and Development, published in Robert Picciotto and Ray C. Rist, eds., *Evaluating Country Development Policies and Programs: New Approaches for a New Agenda*, New Directions for Evaluation, Number 67 (Fall 1995), pp. 55-65; and Thomas H. Stanton, "Federal Credit Programs: The Economic Consequences of Institutional Choices," *The Financier: Analyses of Capital and Money Market Transactions*, Vol. 1, No. 1, February 1994, pp. 20-34.

23 A good but slightly dated overview of the legal structure of the Federal Home Loan Bank System is found in, Dirk S. Adams, Rodney R. Peck, and Jill W. Spencer, "FIRREA and the New Federal Home Loan Bank System," *Santa Clara Law Review*, Vol. 32, No. 1, (1992), pp. 17-60.

24 Richard W. Bartke, "Fannie Mae and the Secondary Mortgage Market," *Northwestern University Law Review*, Vol. 66, (March-April 1971), pp. 1-78.

25 Richard W. Bartke, "Home Financing at the Crossroads - a Study of the Federal Home Loan Mortgage Corporation," *Indiana Law Journal*, Vol. 48 (Fall 1972), pp. 1-42.

26 Ellen P. Roche, "A New Housing Finance Vision: Universal Accounts Could Make Mortgages Obsolete," *Secondary Mortgage Markets*, Freddie Mac, July 1997, pp. 23-28.

27 Kathleen Day, "Fear of What Fannie May Do: Lenders Say the Federally Chartered Company Is Out to Steal Their Business." *The Washington Post*. August 8, 1999, p. H01

28 U.S. Department of the Treasury, *Government Sponsorship of the Federal National Mortgage Association and the Federal Home Loan Mortgage Corporation*, July 11, 1996, p. 81.

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"The popular perception of Fannie Mae and Freddie Mac as benefactors of home buyers for whom they reduce interest rates and increase home ownership deserves examination. In fact, the housing GSEs are principally a vehicle for delivering a federal subsidy rather than the source of that subsidy. Moreover, the estimates presented suggest that they are not an efficient delivery vehicle because they retain nearly \$1 for every \$2 they pass through."

Congressional Budget Office, *Assessing the Public Costs and Benefits of Fannie Mae and Freddie Mac*, May 1996, p. xii. The study adds that GSEs may provide some benefits besides

conveying a subsidy, but that such benefits are hard to value, especially because they are available from other, fully private firms that operate without government sponsorship.

³⁰ *Ibid.*, p. xiii.

³¹ Thomas H. Stanton, "Government-Sponsored Enterprises and Changing Markets: The Need for an Exit Strategy," *The Financier: Analyses of Capital and Money Market Transactions*, Vol. 2, No. 2, (May 1995), pp. 27-42.

³² Thomas H. Stanton, "Nonquantifiable Risks and Financial Institutions: The Mercantilist Legal Framework of Banks, Thrifts, and Government-Sponsored Enterprises," chapter 3 in Charles A. Stone and Anne Zissu, *Global Risk Based Capital Regulations*, Vol. 1, (Burr Ridge, IL: Irwin Professional Publishing), 1994, pp. 57-97.