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Banking and Financial Institutions

A Guide for Directors, Investors, and Counterparties

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To
Jean, Andy, Jeremy, Lincoln, and Carol

Preface

The traditional role of commercial banks in the financial system, and how they operate, has changed dramatically in recent years. The reasons for the changes include:

1. Financial innovations such as credit default swaps, hedge funds, and securitization.
2. Globalization of banks and financial systems. Some of the biggest bank holding companies in the United States are owned by foreign banks.[1] Equally important, some of the biggest U.S. banks have global operations.
3. The global financial crisis that began in 2007. It continued to have negative repercussions around the world in 2011.
4. New laws, such as the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010, and new regulations that emerged from it.

Simply stated, the way that banks and financial institutions operate is changing. This book examines how they operate in the context of these and other changes.

The book consists of 13 chapters and a glossary of the terms used in it. Chapter 1, "Lessons Learned from Banking Crises," explains that banking crises are not new. They have been going on since biblical times, and they are not unique to the United States. Real estate booms and busts are a common cause of financial crises. The chapter explains why they may happen again.

Chapter 2 explains the economic role of financial intermediaries—the financial institutions that bring borrowers and savers together. It used to be that commercial banks were the primary financial intermediary, but their role has changed in recent years. A large part of what banks used to do is now being done by so-called shadow banks.

Chapter 3 delves into the evolving legal environment. Banks can do only what the laws allow them to do. This chapter examines the major laws affecting banks and bank regulation. There are a lot of laws that banks have to comply with unless they can figure out legal ways around those laws—regulatory arbitrage.

Chapter 4 is about asset and liability management (ALM). Banks earn most of their income from the difference between their borrowing and lending rates. In 2010, market rates of interest were at record low levels, and they can only increase over time. This chapter explains how banks can deal with this and related issues.

Chapter 5 explains how banks can hedge some of their interest rate and credit risks by using various types of derivatives contracts, options, and futures. It also covers the use of special purpose vehicles (SPVs) and enterprise risk management (ERM).

Chapter 6 covers the process of commercial and industrial (C&I) lending. These C&I loans are made to business concerns. The chapter covers how banks make loans, the types of C&I loans, the role of collateral, and other factors.

Chapter 7 is about real estate and consumer lending. Recall from Chapter 1 that real estate loans were a key factor in the financial crisis. For many banks, real estate loans account for most of their lending activities. This chapter explains some of the major features of real estate lending. It also covers consumer lending. One extremely important part of this chapter is how annual percentage rates (APRs) are computed on consumer loans. It also discusses real estate and consumer credit regulations.

Chapter 8 involves bank capital. Banks are very highly leveraged when compared with nonfinancial corporations. The high degree of leverage contributed to the large number of bank failures in recent years. However, because of new international and domestic standards, their capital ratios have increased. But is it adequate? This chapter deals with these issues.

Chapter 9 evaluates the financial performance of banks. Bank regulators require them to file periodic financial reports that are available to the public. This chapter explains how to evaluate their financial statements and their financial performance.

Chapter 10 explores the payments systems. Payments are the heart of the financial system, and they can take many different forms. Payments systems include cash, checks, credit cards, informal value transfer systems (e.g., Hawalas), wire transfers, and other means of payment. While most payments are legal, bankers and others have to report money laundering and suspicious activities to federal authorities—or suffer the consequences. Failure to comply with the bank secrecy act/anti-money laundering (BSA/AML) laws can result in large fines (e.g., $110 million) and going to jail.

Chapter 11 explains some of the other financial services offered by banks. These include cash management services for business concerns, trust services, private wealth management, and correspondent banking.

Chapter 12 is a guide to Islamic banking written by Professor Mohamed Ariff. Mohamed Ariff held a chair in finance and headed the finance faculty at Monash University in Melbourne, Australia, before moving to Bond University, where he is currently professor of finance. While Islamic banking is widely used in more than 80 countries around the world, it is new to the United States. Some U.S. banks are beginning to offer Islamic banking services, and this chapter explains some of the essential features.

In Chapter 13, John Harrison (Superintendent of Banks, Alabama State Department of Banking) gives some tips for bank directors, borrowers, and investors in banks. He also explains what lies ahead.

And finally, the language of banking and finance can be very confusing. The Glossary provides convenient brief definitions of the finance jargon used in this book.

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I want to thank Professor Mohamed Ariff for writing Chapter 12 about Islamic banking and John Harrison, Alabama State Bank Commissioner, for providing his insights about the banking issues in Chapter 13.

About the Author

Professor Benton E. Gup holds the Robert Hunt Cochrane/Alabama Bankers Association Chair at the University of Alabama, Tuscaloosa. Dr. Gup is the author or editor of 29 books, and his articles on financial subjects have appeared in leading finance journals. His most recent books are *The Valuation Handbook* (with Rawley Thomas), 2010, and *The Financial and Economic Crises: An International Perspective,* 2010. In 2009, he was awarded the Midwest Finance Association's Lifetime Achievement Award.

Contents

CHAPTER 1

Lessons Learned from Banking Crises

This chapter examines the causes of the recent financial crisis that began in the United States and then spread around the world. It also explains seven lessons that can be learned from financial crises.

INTERNATIONAL FINANCIAL CRISES

Economic crises are not new. In A.D. 33, Emperor Tiberius had to inject 1 million gold pieces of public money into the Roman financial system to keep it from collapsing.[1] There have been at least 60 different crises since the early seventeenth century.[2] As shown in Table 1.1, there were 16 economic crises between 1987 and 2010. The impact of each crisis varied widely. For example, the removal of the British pound from the European Exchange Rate Mechanism in 1992 and the Russian ruble collapsing in 1997 did not have a major impact in the United States. However, the economic crisis that began in the United States in 2007 was the worst since the Great Depression in the 1930s. Equally important, it became a global crisis. In 2009, crises in Iceland and Dubai adversely affected global investors. In 2010, the financial crisis in Greece roiled the European Union. The European countries having financial problems were Portugal, Ireland, Italy, Greece, and Spain; they were referred to collectively as the PIIGS.

The crisis became global because the biggest banks in the world, most of which are foreign owned, have extensive operations in the United States. Equally important, the largest banks in the United States have extensive overseas operations. Citigroup, for example, has offices in 140 countries, JPMorgan Chase has offices in 60 countries, and Bank of America operates in more than 30 foreign countries.[3]

Table 1.2 lists the world's 10 largest banks in 2007. Royal Bank of Scotland (RBS, first on the list) owned Citizens Financial Group, Inc., the

TABLE 1.1 International Financial Crises, 1987–2010

1987	U.S. stock market crash
1990	Collapse of U.S. high-yield bond market
1991	Oil price surge
1992	Britain removes pound from the European Exchange Rate Mechanism
1994	U.S. bond market crashes
1995	Mexican crisis
1997	Asian crisis
1997	Russian default, ruble collapses; Long-Term Capital Management bailout
2000	Technology, media, and telecom sectors collapse
2001	September 11 payment system disruption
2002	Argentine crisis
2002	German banking crisis
2007	U.S. subprime mortgage turmoil
2009	Iceland's financial crisis
2009	Dubai's financial crisis
2010	Greece's financial crisis

Source for data through 2007. Leonard Matz. "Liquidity Analysis: Decades of Change," Federal Deposit Insurance Corporation (FDIC) *Supervisory Insights*, Winter 2007, Vol. 4, Issue 2 (Freely adapted from a presentation by Leonard Matz, International Director, BancWare Academy for SunGard BancWare, at Federal Financial Institutions Examination Council (FFEIC) Capital Markets Specialist Conference in June 2007).

TABLE 1.2 World's 10 Largest Banks in 2007

Rank	Name	Country	Assets
1	Royal Bank of Scotland (RBS)	United Kingdom	$3.81($ trillions)
2	Deutsche Bank	Germany	2.97
3	BNP Paribas	France	2.49
4	Barclays Bank	United Kingdom	2.46
5	HSBC Holdings	United Kingdom	2.35
6	Crédit Agricole Group	France	2.27
7	Citigroup	USA	2.19
8	UBS	Switzerland	2.01
9	Bank of America Group	USA	1.72
10	Société Générale	France	1.59

Source: "The World's Biggest Banks," *Global Finance,* October 2008, p. 111.

14th largest bank holding company in the United States.[4] A bank holding company (BHC) is a corporation that owns one or more banks or financial service organizations. Deutsche Bank, from Germany, owned Tannus Corporation, the 8th largest BHC, and BNP Paribas owned BancWest Corporation, the 22nd largest BHC. Crédit Agricole (6th on the list) is the only large bank without U.S. operations.

WHAT CAUSED THE CRISIS IN THE UNITED STATES?

Population Growth and Urbanization

Population growth was the most important driving force behind the real estate booms and busts. It created the demand for housing. The population of the United States increased from 205 million in 1970 to more than 302 million in 2007,[5] and about 100 million additional people had to live somewhere. They moved into urban areas such as Atlanta (Georgia), Dallas (Texas), Los Angeles (California), Las Vegas (Nevada), Miami (Florida), and other metropolitan areas located mostly in the south and southwestern parts of the United States.

The increased participation of women in the workforce is another demographic factor to be considered. Women accounted for 38 percent of the labor force in 1970, and 59 percent of the labor force in 2007. Two-income families tend to buy bigger and more expensive homes. In 1980, the average size of a single family home was 1,740 square feet, and it cost $64,600. In 2007, the average size was 2,521 square feet, and the cost soared to $247,900.[6]

Government Policies

Laws The U.S. Congress recognized that the increased population had increased the demand for housing, and they passed the laws that facilitated home ownership. The following is a partial list of those laws:

- Community Reinvestment Act (CRA, 1977) encouraged depository institutions to meet the credit needs of their communities, including low- and moderate-income neighborhoods. The CRA requires that each depository institution's record be evaluated periodically. The CRA examinations are conducted by the federal agencies that are responsible for supervising depository institutions. Depository institutions include Federal Deposit Insurance Corporation (FDIC) insured banks (commercial banks, savings banks, mutual savings banks), insured credit unions, and other institutions defined by law.[7]