# Why Did FDR's Bank Holiday Succeed?

- After a month-long run on banks, on March 5, 1933, President Franklin Delano Roosevelt declared a nationwide Bank Holiday that shut down the banking system.
- The following week, in his first Fireside Chat, Roosevelt appealed directly to Americans to prevent a resumption of bank withdrawals; when the banks reopened on March 13, depositors stood in line to return their hoarded cash.
- The success of the Bank Holiday and the turnaround in public confidence can be attributed to the Emergency Banking Act of 1933, passed by Congress on March 9.
- The President used the emergency currency provisions of the Act to encourage the Federal Reserve to create de facto 100 percent deposit insurance in the reopened banks.
- The Bank Holiday and the Emergency Banking Act reestablished the integrity of the U.S. payments system and demonstrated the power of credible regime-shifting policies.

# 1. Introduction

n Sunday, March 5, 1933, after a month-long run on American banks, the newly inaugurated President of the United States, Franklin Delano Roosevelt, proclaimed a fourday suspension of all banking transactions, beginning the following day. The nation's stock exchanges also closed, even though they were not mentioned in the President's executive order. On Thursday, March 9, Roosevelt did not reopen the banks as planned; rather, he extended the closure for three days. Americans should have reacted in horror to the President's proclamation and his decision to abandon his original schedule. Instead, they waited to hear his plan.

Roosevelt's fifteen-minute radio address to the American people on Sunday evening, March 12—his first Fireside Chat—informed the public that only sound banks would be licensed to reopen by the U.S. Treasury: "I can assure you that it is safer to keep your money in a reopened bank than under the mattress." Much to everyone's relief, when the institutions reopened for business on March 13, depositors stood in line to return their hoarded cash to neighborhood banks. Within two weeks, Americans had redeposited more than half of the currency that they had squirreled away before the suspension.

<sup>1</sup> New York Times, March 13, 1933, p. 1 cont.

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The market registered its approval as well. On March 15, 1933, the first day of trading after the extended closure, the New York Stock Exchange recorded the largest one-day percentage price increase ever. With the benefit of hindsight, the nationwide Bank Holiday in March 1933 ended the bank runs that had plagued the Great Depression.

How, then, did Roosevelt manage to accomplish in one week what Herbert Hoover failed to do in three years?

Contemporary observers consider the Bank Holiday and the Fireside Chat a one-two punch that broke the back of the Great Depression. According to Beard and Smith (1940, p. 78), "the sudden nationwide holiday performed the same function for the bank panic as may a slap in the face for a person gripped by unreasoning hysteria." Allen (1939, p. 111) notes that the bank reopening succeeded because "the people had been catapulted and persuaded by a president who seemed to believe in them and was giving them action. . . ." Alter (2006, p. 269) confirms the importance of Roosevelt's communication skills by quoting Will Rogers on the President's description of the reopening: "He made everyone understand it, even the bankers."

Roosevelt's oratory certainly played an important role, but only the financially naive would have believed that the government could examine thousands of banks in one week to identify those that should survive. According to Wigmore (1987, p. 752), "The federal review procedure for reopening banks also had too many weaknesses to create much confidence, given the number of banks reopened, the speed with which they opened, and the lack of current information on them. There were no standards for judging which banks

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should reopen." Thus, Temin and Wigmore (1990, p. 491) dismiss the importance of the Bank Holiday: "The value of stocks... rose sharply from its trough in March—at the time of the Bank Holiday—to a peak in July.... This abrupt turnaround was hardly the result of the interregnum or the Bank Holiday itself. They contained bad news about the health of the economy. Only after Roosevelt's commitment to inflationary policies became clear during the Hundred Days did the value of stocks rise. The stock market rose and fell with the value of the dollar during 1933, illustrating dramatically the link between devaluation and expectations for the economy."

Temin and Wigmore (pp. 488-9) ignore the March 15, 1933, stock price increase in their assessment of the Bank Holiday. They go further to state: "For the first month the administration was absorbed with the Bank Holiday and preparing for action. Stock, bond, foreign exchange, and commodities markets were quiet and little changed" [italics added].

This article demonstrates that the Bank Holiday that began on March 6, 1933, marked the end of an old regime, and the Fireside Chat a week later inaugurated a new one. The Emergency Banking Act of 1933, passed by Congress on March 9—combined with the Federal Reserve's commitment to supply unlimited amounts of currency to reopened banks—

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created de facto 100 percent deposit insurance. Moreover, the evidence shows that people recognized this guarantee and, as a result, believed the President on March 12, 1933, when he said that the reopened banks would be safer than the proverbial "money under the mattress." Confirmation of the turnaround in expectations came in two parts: the Dow Jones Industrial Average rose by a statistically significant 15.34 percent on March 15, 1933 (taking into account the two-week trading halt during the Bank Holiday), and by the end of the month, the public had returned to the banks two-thirds of the currency hoarded since the onset of the panic.

Together, the Emergency Banking Act and the de facto 100 percent deposit insurance created a safety net for banks and produced a regime shift with instantaneous results, similar to Sargent's (1986) description of "The Ends of Four Big Inflations." This result would come as no surprise to Friedman and Schwartz (1963, p. 434), who observe that "Federal insurance of bank deposits was the most important structural change in the banking system to result from the 1933 panic, and . . . the structural change most conducive to monetary stability since state bank notes were taxed out of existence immediately after the Civil War." However, Friedman and Schwartz (pp. 421-2) simply review the provisions of the

<sup>&</sup>lt;sup>2</sup> See Siegel (1998, p. 183).

<sup>&</sup>lt;sup>3</sup> The Banking Act of 1933, which included a provision for creating the Federal Deposit Insurance Corporation (FDIC), was passed on June 13, 1933. FDIC insurance, which was not retroactive, became effective on January 1, 1934. Although Roosevelt himself opposed deposit insurance legislation (Calomiris and White 2000, p. 193), as we discuss, the President's opposition did not interfere with his commitment to the success of de facto depositor protection that began with the earlier Emergency Banking Act of 1933.

Emergency Banking Act of 1933 and do not recognize the implicit guarantee for deposits in the reopened banks. Both Meltzer (2003, p. 423) and Wicker (1996, p. 146) maintain that the government understood the need to guarantee deposits in reopened banks, but they do not show that the public recognized this new policy and acted accordingly.

Friedman and Schwartz correctly praise the stabilizing role of deposit insurance, but they do not distinguish between a 100 percent guarantee and the insurance program created by the FDIC that began on January 1, 1934. FDIC insurance caps its guarantee at a maximum dollar amount for each deposit account, initially set at \$2,500. Small depositors with FDIC insurance did not have to worry about their accounts, but large depositors, who were only partially insured, could still be panicked into a run. Roosevelt's implicit 100 percent guarantee on March 12, 1933, convinced all depositors to trust the reopened banks.

The nationwide Bank Holiday in March 1933 was a unique event in American financial history. In the past, banks had suspended the convertibility of deposits into currency, but never had there been a complete stoppage of the entire U.S. payments system. The evidence presented here on the speed with which the Bank Holiday and the Emergency Banking Act of 1933 reestablished the integrity of the payments system demonstrates the power of credible regime-shifting policies.

The article is organized as follows. Section 2 describes the February 1933 banking system crisis that culminated in the formal suspension of all banking transactions upon Roosevelt's proclamation of a nationwide Bank Holiday. Section 3 reviews the reasons for the suspension, and Section 4 describes the

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solution to the crisis: the Emergency Banking Act of 1933. Evidence from the contemporary press confirms that an important segment of the American public understood the implicit federal guarantee for all deposits of reopened banks. Section 5 shows that people responded by redepositing the currency they had withdrawn and by bidding up stock prices.

# 2. The Collapse

"The straw that broke the camel's back occurred in Detroit, Michigan," in February 1933, according to Acting Comptroller of the Currency Francis Awalt. 4 Michigan Governor William A. Comstock declared a statewide banking holiday on February 14, 1933, to prevent the failure of the Union Guardian Trust Company of Detroit, a bank with close ties to Henry Ford. The story of the battle between Ford—Union Guardian's largest depositor—and Under Secretary of the Treasury Arthur Ballantine over how to save the bank from insolvency has been told many times (Kennedy 1973; Wigmore 1985; Wicker 1996). The failure of Ford and Ballantine to arrive at a mutually agreeable solution forced the governor to suspend banking operations in the entire state. The fallout from that decision gave new meaning to the law of unintended consequences. Instead of preventing a panic, the Michigan bank holiday precipitated one. The suspension confirmed the public's worst fears—that the banks were unsafe—and sparked a nationwide rush to cash.

The damage from the February 14 Michigan proclamation came from contagion. According to Wicker (1996, p. 121), the Michigan bank holiday "spread fear and uncertainty quickly to the contiguous states of Ohio, Indiana, and Illinois." The contemporary press suggests, however, that those states recognized the danger of imitating the Michigan example. On February 17, the office of Ohio Governor George White issued this statement: "There is no occasion for a proclamation by Governor White of a banking holiday in the state of Ohio." On February 23, the *New York Times* reported that Indiana Governor Paul McNutt declared that there would be "no bank moratorium in Indiana" in order to quiet "unwarranted reports from Chicago that there would be [one]."

Unlike Michigan's Midwestern neighbors, Maryland failed to hold the line. On February 24, Governor Albert Ritchie remarked: "I attended the meeting of bankers this evening with the idea of doing whatever is best for the depositors. . . . I believe there is no justification for the withdrawals which have recently been taking place. But to protect the property and saving[s] of the people of the city [of Baltimore] and the State these large withdrawals should stop. It was the consensus of opinion that a bank holiday should be declared tomorrow."

In the weeks following the Michigan moratorium, there were large increases in the demand for currency (Table 1). For the six weeks ending February 8, 1933, currency in circulation was quite stable, averaging \$5.36 billion. After February 8,

<sup>&</sup>lt;sup>4</sup> Awalt (1969, p. 349).

<sup>&</sup>lt;sup>5</sup> New York Times, February 18, 1933, p. 5.

<sup>&</sup>lt;sup>6</sup> February 23, 1933, p. C31.

<sup>&</sup>lt;sup>7</sup> New York Times, February 24, 1933, p. 21.

Table 1
Currency in Circulation, January-July 1933

Date	Amount (Billions of Dollars)			
January				
4	5.38			
11	5.30			
18	5.32			
25	5.32			
February				
1	5.37			
8	5.47			
15	5.56			
22	5.70			
March				
1	6.43			
8	7.25			
15	6.98			
22	6.32			
29	6.07			
April				
5	5.97			
12	5.86			
19	5.78			
26	5.71			
May				
3	5.67			
10	5.67			
17	5.57			
24	5.51			
31	5.53			
June				
7	5.48			
14	5.44			
21	5.41			
28	5.39			
July				
5	5.47			
12	5.38			
19	5.35			
26	5.31			

Source: Board of Governors of the Federal Reserve System, *Banking and Monetary Statistics* (1943, p. 387).

currency held by the public rose steadily, reaching \$7.25 billion in the week ending March 8, 1933. The \$1.78 billion jump in currency held by the public between February 8 and March 8—an increase of more than 30 percent—confirms the hoarding of cash. Almost all of the increase occurred after February 15.

The rush to cash during the weeks following the Michigan bank holiday triggered bank closures or deposit restrictions in every state, even before Roosevelt's proclamation of March 5, 1933 (Wicker 1996, p. 128). According to the *New York Times*, "A bank holiday 'until further notice' was declared tonight [March 4] in Delaware, the last of the forty-eight states in which restrictions have been made." However, there is disagreement over the precise number of *bank holidays* in force before Roosevelt's presidential decree. According to Friedman and Schwarz (1963, p. 325), "By March 3, holidays in about half the states had been declared"; Meltzer (2003, p. 382) indicates "By inauguration day [March 4], thirty-five states had declared bank holidays"; and Alter (2006, p. 190) maintains "By the early evening of Friday March 3, banks in thirty-two of forty-eight states were closed."

Why is there such confusion? To some extent, the disagreement stems from the use of different sources or time periods; only Wicker (1996) provides a reference for his discussion (the *New York Times*). The more likely source of confusion is that some states went to great lengths to avoid a *de jure* holiday. For example, the *Chicago Tribune* reported that "Indiana Governor Paul V. McNutt today informed state officials... [that] Indiana banks, under the new bank code law recently rushed through the state legislature, have the power to limit withdrawals to one-tenth of one percent. Therefore, no state-wide bank moratorium will be declared in Indiana." <sup>10</sup>

A detailed examination of the Associated Press list of banking restrictions by state (including the District of Columbia) as of the close of business on March 4, 1933, reveals that "Banks in 28 states are 'closed'; Banks in 10 states are 'some or mostly closed'; Banks in 11 states have deposits that are 'restricted to withdrawals of 5 (or some unspecified) percent." The Associated Press characterized Indiana as: "About half [of the banks] restricted to 5 percent [withdrawals] indefinitely." If the term *bank holiday* means an unqualified shutdown of banking transactions by state governments, then the Associated Press limited the number to twenty-eight. 12

As these accounts suggest, Franklin Delano Roosevelt did not invent the bank holiday. So why is his March 5 proclamation credited with launching a process that was crucial to restoring confidence in America's banking system? The answer is that Roosevelt's initiative turned a maze of state restrictions into a uniform national policy. This action was the key first step to resolving the banking crisis: It shifted the

<sup>&</sup>lt;sup>8</sup> The weekly data in Table 1 are not seasonally adjusted, but monthly seasonal factors show that virtually no adjustment is required for February and March (see *Banking and Monetary Statistics*, Table 111, Board of Governors of the Federal Reserve System, 1943).

<sup>&</sup>lt;sup>9</sup> March 5, 1933, p. F24.

<sup>&</sup>lt;sup>10</sup> March 5, 1933, p. A5.

<sup>&</sup>lt;sup>11</sup> New York Times, March 5, 1933, p. F24.

 $<sup>^{12}</sup>$  Although the Associated Press listed New York as "closed," the *New York Times* (March 5, 1933, p. 23) reported that "At least two banks in New York City did not avail themselves of the banking holiday proclaimed yesterday by Governor Lehman. They were the Sterling National Bank, 1410 Broadway and the National Bank of Far Rockaway."

responsibility for the integrity of the payments system to the federal government, where it belonged.

### 3. The Challenge

Roosevelt's challenge was to figure out how to reopen the banks without triggering a resumption of the deposit withdrawals that led to the suspensions. His solution—the Bank Holiday—was a more extensive form of bank suspension that had last occurred in the United States in 1907 under the national banking system. Indeed, Congress had established the Federal Reserve System in 1913 precisely to prevent banks from suspending the convertibility of deposits into currency. Friedman and Schwartz (1963, p. 330) compare the Bank Holiday with earlier restrictions: "One would be hard put to . . . find a more dramatic example of how far the result of legislation can deviate from intention."

Why did the national banking system fail in 1933? Friedman and Schwartz (p. 330) acknowledge that, even with the benefit of hindsight, "the answer is by no means clear." However, a number of points are worth considering. <sup>13</sup> First, the weakened capital position of the commercial banks made them vulnerable to even minor drains. 14 Second, the public's demand for currency during February and March 1933 was exacerbated by a demand for gold. 15 Third, although the Federal Reserve Act provided for an elastic currency by allowing a Reserve Bank to discount eligible commercial paper and ship currency in the form of Federal Reserve Notes to a commercial bank, the Act also imposed a reserve requirement of 40 percent gold backing for Federal Reserve Notes outstanding. Finally, by March 3, 1933, the gold drain at the Federal Reserve Bank of New York reduced its gold reserve ratio to 24 percent. Meltzer (2003, p. 387) states that the Federal Reserve Board then suspended the gold reserve requirement, but quotes Federal Reserve Bank of New York Governor George Harrison, saying that "he would not take the responsibility of running [the] bank with deficient reserves" (p. 386). Perhaps Wicker (1996, p. 145) sums up the situation best: "[Using] the pre-1914 remedy of suspension of cash payments can be explained quite easily. Bold and courageous

leadership was absent. Neither the Fed nor the RFC [Reconstruction Finance Corporation] was willing to accept lender of last resort responsibilities."

The absence of leadership created a vacuum filled with fear and uncertainty, making the reopening of banks a precarious undertaking. According to Acting Comptroller of the Currency Awalt, "No one knew how the public would react when the banks reopened. If they demanded their money they either had to have it or the reopening would be a failure." <sup>16</sup>

To prevent a resumption of bank withdrawals, the President appealed directly to the people on March 12, 1933, in his first Fireside Chat. <sup>17</sup> His opening words set the tone: "My friends, I want to talk for few minutes with the people of the United States about banking—with the comparatively few who understand the mechanics of banking, but more particularly with the overwhelming majority of you who use banks for the making of deposits and the drawing of checks. I want to tell you what has been done in the last few days, and why it was done,

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and what the next steps are going to be." In clear and simple terms, Roosevelt explained the procedure for reopening the banks and claimed that only sound banks would be reopened.

The novelty of this event is captured by the description, the day after the talk, in the *Christian Science Monitor*: "He speaks to the nation over the radio in what is quite possibly the most remarkable address ever made by any President. In man-to-man fashion, in words of only one syllable, he uses the tones of a friend on the inside to assure a people . . . that the bank situation is sound. He recites the problems [and] explains the remedy: 'when people find they can get their money when they want it the phantom of fear will soon be laid [to rest]. . . . It was the government's job to straighten out this situation and the job is being performed." 18

<sup>&</sup>lt;sup>13</sup> See Meltzer (2003, pp. 381-9) and Friedman and Schwartz (1963, pp. 324-32).

<sup>&</sup>lt;sup>14</sup> Friedman and Schwartz (1963, p. 330) emphasize that "The recorded capital figures were widely recognized as overstating the available capital because assets were being carried on the books at a value higher than their market value."

<sup>&</sup>lt;sup>15</sup> According to Wigmore (1987, p. 744), weekly data show a \$1.8 billion increase in currency in circulation and a gold drain of \$563 million from the Federal Reserve System. Wigmore also provides daily data showing a larger gold outflow from the Federal Reserve Bank of New York during the first few days of March.

<sup>&</sup>lt;sup>16</sup> Awalt (1969, p. 368).

 $<sup>^{17}</sup>$  The text of the Fireside Chat, and the excerpts that follow, can be found in the *New York Times* (March 13, 1933, p. 1).

<sup>&</sup>lt;sup>18</sup> March 13, 1933, p. 1.

Frederick Lewis Allen, the contemporary social historian, confirmed the power of the President's oratory (Allen 1939, p. 110): "Roosevelt's first Fireside Chat was perfectly attuned. Quiet, uncondescending [sic], clear, and confident, it was an incredibly skillful performance." However, Allen also emphasized that most people did not understand how the government could accomplish its objective: "The banks opened without any such renewed panic as had been feared. They might not have done so had the people realized that it was impossible, in a few days, to separate the sound banks from the unsound" (p. 110).

Allen suggests that most people did not care what the President said—only the way he said it. But the President's opening words identified two groups of people: the "comparatively few who understand the mechanics of banking . . . [and] the overwhelming majority." How did the President assure the more sophisticated public—and a skeptical press—who could blow the whistle if there was no substance to his promises?

Roosevelt, in fact, delivered a double-barreled message during his Fireside Chat—one for the general public and one for the financiers. To those who understood the mechanics of banking, he said, "Last Thursday [March 9] was the legislation promptly and patriotically passed by the Congress . . . [that] gave authority to develop a program of rehabilitation of our banking facilities. . . . The new law allows the twelve Federal Reserve Banks to issue additional currency on good assets and thus the banks that reopen will be able to meet every legitimate

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call. The new currency is being sent out by the Bureau of Engraving and Printing to every part of the country."

The Emergency Banking Act, passed by Congress on March 9, 1933, gave the President the backing that he needed to ensure the safety of the reopened banks. <sup>19</sup> Without that legislation, the President's words could not have carried the day.

# 4. The Emergency Banking Act of 1933

The key provision of the Emergency Banking Act, mentioned by Roosevelt, allowed the Federal Reserve Banks to issue emergency currency, similar to that issued in 1914 under the Aldrich-Vreeland Act. According to the *New York Times*: "To many of the President's closest advisors the Aldrich-Vreeland Act, repealed when the Federal Reserve Act came into effect, provides the model scheme for the projected expansion of currency through Federal Reserve Notes." Titles I through IV of the Emergency Banking Act went much further, however, granting the President near dictatorial powers.

Title I of the Act approved the President's declaration of the Bank Holiday and allowed the President, during the period of emergency, to regulate all banking functions,

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including "any transactions in foreign exchange, transfers of credit between or payments by banking institutions as defined by the President, and export, hoarding, melting, or earmarking of gold or silver coin." Title II gave the Comptroller of the Currency the power to restrict the operations of a bank with impaired assets and to appoint a conservator, who "shall take possession of the books, records, and assets of every description of such bank, and take such action as may be necessary to conserve the assets of such bank pending further disposition of its business." Title III allowed the Secretary of the Treasury to determine whether a bank needed additional funds to operate and "with the approval of the President request the Reconstruction Finance Corporation to subscribe to the preferred stock in such association, State bank or trust company, or to make loans secured by such stock as collateral." Title IV provided for issuance by the Federal Reserve Banks of emergency currency, called Federal

<sup>&</sup>lt;sup>19</sup> The text of the Emergency Banking Act of 1933 appears in its entirety in the *New York Times* (March 10, 1933, p. 2).

<sup>&</sup>lt;sup>20</sup> March 9, 1933, p. 2. The emergency currency provision of the Aldrich-Vreeland Act, passed in May 1908 to prevent a replay of the Panic of 1907, had been scheduled to expire by legislative design on June 30, 1914. The Federal Reserve Act, passed in December 1913, extended the expiration date for one year, until June 30, 1915, to provide protection against panics while the Federal Reserve System was being organized. The extension allowed Treasury Secretary William McAdoo to invoke the Aldrich-Vreeland Act to prevent a panic in August 1914 at the outbreak of the Great War (see Silber [2007b]).

Reserve Bank Notes, backed either by "(A) any direct obligations of the United States or (B) any notes, drafts, bills of exchange, or bankers' acceptances, acquired under the provisions of this act." Federal Reserve Bank Notes would circulate alongside normal Federal Reserve Notes, even though they were not backed by gold, because the Act provided that the new notes "shall be receivable at par in all parts of the United States . . . and shall be redeemable in lawful money of the United States on presentation at the United States Treasury."

Title I of the Emergency Banking Act conferred on the President considerable power to deal with the crisis. The Administration did not shy away from using that power. In his Fireside Chat on Sunday night, March 12, Roosevelt ordered banks to be opened sequentially: "First in the Twelve Reserve Bank cities—those banks which on first examination by the Treasury have been already found to be all right . . . followed on Tuesday . . . by banks already found to be sound in cities where there are recognized clearing houses . . . [and] on Wednesday and succeeding days, banks in smaller places . . . subject, of course to the government's physical ability to complete its survey." The Treasury issued emergency regulations designed to prevent runs on the reopened banks, including: "No banking institution shall permit any withdrawal by any person when such institution, acting in good faith, shall deem that the withdrawal is intended for hoarding."<sup>22</sup>

Roosevelt recognized that the restoration of confidence was the most important ingredient for a successful reopening: "Confidence and courage are the essentials of success in carrying out our plan." Friedman and Schwartz (1963, p. 440) confirm the role of confidence: "Panics arose out of or were greatly intensified by a loss of confidence in the ability of banks to convert deposits into currency." However, Roosevelt did not inspire great confidence when he said the first banks to be reopened were those that "on first examination by the Treasury have been already found to be all right." Nor did regulations against hoarding assure people that the banks were sound; if anything, the reverse was more likely. The key to creating confidence in the reopened banks rested with Titles III and IV of the Emergency Banking Act.

Title IV gave the Federal Reserve the flexibility to issue emergency currency—Federal Reserve Bank Notes—backed by any assets of a commercial bank. The contemporary press recognized the power of the emergency currency provision: "The new currency feature of the law is one of the most important of the many extraordinary powers given to this administration . . . which stem from the Aldrich-Vreeland Act

... invoked in 1914 for the issuance of about \$386,000,000 in emergency currency."<sup>24</sup> The link to Aldrich-Vreeland currency, which succeeded in defusing the financial crisis at the outbreak of World War I, conferred credibility on the power of Title IV of the Emergency Banking Act of 1933.<sup>25</sup> The *Wall Street Journal* wrote: "Banks which are believed to be 100% sound would be reopened as soon as their condition could be checked. . . . All banks so reopened, it was pointed out, could under Title 4 and under machinery already in existence obtain the cash resources necessary from the Federal Reserve banks."<sup>26</sup>

Title IV of the Emergency Banking Act promised more than just the availability of cash to reopened banks. It also created the expectation that the government would guarantee all depositors against loss, without limit. As the *New York Times* reported: "Some bankers who were here today . . . interpreted the emergency banking act as a measure under which the government practically guarantees, not officially but morally,

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the deposits in the banks which it permits to reopen. This point of view was based on the fact that banks permitted to open are characterized as 100 per cent sound and assured of sufficient currency to meet *all obligations*" [italics added].<sup>27</sup>

Title III of the Emergency Banking Act added to the public's perception of a guarantee, according to the *New York Times*: "The privilege to be extended to banks to issue preferred stock to be taken over by the Reconstruction Finance Corporation when they are in need of funds for capital purposes or reorganization, is also pointed to as another feature of the governmental program which fits in with the theory that a virtual guarantee is extended to depositors." Two days earlier, a *New York Times* headline had announced: "Deposit Guarantee Seen in Bank Law," and the newspaper attributed the view to "an interpretation of the measure . . . by some officials in one of the government departments it concerns." 29

The availability of capital funds through the Reconstruction Finance Corporation would certainly help a bank's balance

<sup>&</sup>lt;sup>21</sup> New York Times, March 13, 1933, p. 1 cont.

<sup>&</sup>lt;sup>22</sup> New York Times, March 13, 1933, p. 2.

<sup>&</sup>lt;sup>23</sup> New York Times, March 13, 1933, p. 1 cont.

<sup>&</sup>lt;sup>24</sup> New York Times, March 10, 1933, p. 3.

<sup>&</sup>lt;sup>25</sup> See Silber (2007a) for a discussion of the 1914 financial crisis.

<sup>&</sup>lt;sup>26</sup> March 10, 1933, p. 1 cont.

<sup>&</sup>lt;sup>27</sup> March 13, 1933, p. 1 cont.

<sup>&</sup>lt;sup>28</sup> March 13, 1933.

<sup>&</sup>lt;sup>29</sup> March 11, 1933, p. 2.

sheet, but only the Federal Reserve could provide unlimited currency to banks to meet a run on deposits. Acting Comptroller of the Currency Awalt confirmed the implicit guarantee many years later, but also hinted at concern over Federal Reserve support: "It was felt that the various Federal Reserve Banks must back the reopened banks to the hilt, and that it was no time for any conservative head of a Federal Reserve Bank to exercise his conservatism, should demand be made for currency. We reasoned, therefore, that if the Federal Reserve agreed to a reopening of a particular bank, it would necessarily be forced to back it *one hundred percent*" [italics added]. <sup>30</sup>

How could a conservative Federal Reserve throttle the guarantee? A bank in need of cash could get the new Federal Reserve Bank Notes, according to Title IV of the Emergency Banking Act, by discounting with its regional Federal Reserve Bank "(A) any direct obligations of the United States or (B) any notes, drafts, bills of exchange, or bankers' acceptances, acquired under the provisions of this act." However, an individual Federal Reserve Bank could refuse to accept a bank's assets as collateral if the assets were considered too risky. Central bankers are always concerned with credit risk. The Federal Reserve Banks may have been especially sensitive because they are private corporations owned by the commercial banks that are members of the System. In a discussion titled "Tragic Interlude in March, 1933," Emanuel A. Goldenweiser, Director of Research and Statistics at the Federal Reserve Board from 1926 through 1945, wrote: "The Federal Reserve Banks and their management were still under the spell of commercial banking practice and theory and were dominated by the concept of liquidity as protection to a

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bank. They were also concerned about protecting the liquidity and solvency of the Federal Reserve Banks themselves as custodians of the country's ultimate reserves."<sup>31</sup>

An agreement to indemnify the Federal Reserve Banks against losses ensured their cooperation in lending freely to banks in need of cash. The promise to protect the Reserve Banks came in the form of a telegram, dated March 11, 1933,

from Roosevelt's Treasury Secretary, William Woodin, to Governor George Harrison of the Federal Reserve Bank of New York, quoting President Roosevelt: "It is inevitable that some losses may be made by the Federal Reserve banks in loans to their member banks. The country appreciates, however, that the 12 regional Federal Reserve Banks are operating entirely under Federal Law and the recent Emergency Bank Act greatly enlarges their powers to adapt their facilities to a national

The key question is: When the banks reopened, did the public behave as though it believed in the newly guaranteed safety of the banking system?

emergency. Therefore, there is definitely an obligation on the federal government to reimburse the 12 regional Federal Reserve Banks for losses which they may make on loans made under these emergency powers. I do not hesitate to assure you that I shall ask the Congress to indemnify any of the 12 Federal Reserve banks for such losses. I am confident that Congress will recognize its obligation to these Federal Banks should the occasion arise, and grant such request."<sup>32</sup> Roosevelt clearly went out on a limb to ensure the Federal Reserve's cooperation.

Congress understood the role of emergency currency in guaranteeing bank deposits. As the *New York Times* observed: "the framing and adoption of the emergency banking law . . . went far to offset demands in Congress for a separate guarantee bill." Of course, the public did not know the details of the Federal Reserve's reluctance to lend, nor did it know of Roosevelt's indemnification scheme. Most Americans, in fact, did not read the *New York Times*, so they were unaware of the publicity accorded the implicit guarantee.

<sup>&</sup>lt;sup>30</sup> Awalt (1969, p. 368).

<sup>&</sup>lt;sup>31</sup> Goldenweiser (1951, p. 165).

<sup>&</sup>lt;sup>32</sup> Federal Reserve Bank of New York Archives, Central Files Unit, 017.1. The Honorable Ogden Mills, outgoing Treasury secretary, was invited to the Board of Directors meeting of the Federal Reserve Bank of New York to read the telegram and to brief the Directors on "recent discussions of the problems involved in reopening the banks of the country which have taken place in Washington, D.C." (Minutes, March 11, 1933, p. 179, Federal Reserve Bank of New York Archives). William Woodin, incoming Treasury secretary, had asked Mills to stay on and help draft the Emergency Banking Act. Also see Alter (2006) and Meltzer (2003) for discussions of the role that Mills played.

<sup>33</sup> March 13, 1933, p. 1 cont.

<sup>&</sup>lt;sup>34</sup> The Directors of the Federal Reserve Bank of New York were sufficiently worried about the riskiness of loans to reopened banks that they transmitted the following resolution to the Treasury secretary: "Pending the legal assumption of the responsibility of the government [to indemnify the Reserve Banks] . . . we believe that banks should be licensed to reopen only with our approval, as the principal burden of taking care of such banks as are reopened will be ours" (Minutes, March 12, 1933, p. 189, Federal Reserve Bank of New York Archives).

Perhaps the articles in the *New York Times* reflected the strategy outlined by Raymond Moley, a member of Roosevelt's brain trust. Moley had worked with Treasury Secretary William Woodin to formulate the Emergency Banking Act and had helped draft the March 12 Fireside Chat. He stated: "Those who conceived and executed... the policies which vanquished the bank crisis... were intent upon rallying the confidence, first, of the conservative business and banking leaders of the country and then, through them, of the public generally" (Moley 1939, p. 155).

Indicative evidence of the strategy described by Moley comes from comparing the Minutes of the Board of Directors of the Federal Reserve Bank of New York with comments in the New York Times. On March 10, 1933, the following entry appeared in the Minutes: "Under this law, enacted as a part of the program for reopening the banks, the Federal Reserve Banks become in effect guarantors of the deposits of the reopened banks. While they are not legally bound there is a large moral responsibility" [italics added]. 35 Two days later, the New York Times echoed precisely that sentiment: "Some bankers who were here today . . . interpreted the emergency banking act as a measure under which the government practically guarantees, not officially but morally, the deposits in the banks which it permits to re-open" [italics added].<sup>36</sup> There is no evidence of a purposeful leak, but Treasury Secretary William Woodin had been a member of the Board of Directors of the Federal Reserve Bank of New York until March 3, 1933, and could have easily arranged a discreet disclosure.<sup>37</sup>

In sum, the contemporary commentary suggests that Roosevelt's rhetoric in his first Fireside Chat gave the public confidence in the opened banks. Business and banking leaders—and the press—could rely on the Emergency Banking Act to deliver on the government's moral obligation to guarantee all deposits. The key question is: When the banks reopened, did the public behave as though it believed in the newly guaranteed safety of the banking system?

# 5. The Evidence

On the very first day that the banks reopened, the press described depositors anxious to redeposit their cash. A front

page headline in the *Chicago Tribune* read: "City Recovers Confidence as 34 Banks Open." The front page of the *New York Times* carried similar news: "Rush to Put Money Back Shows Restored Faith as Holiday Ends." The *Times* article explained: "The public plainly showed that it recovered from the fear and hysteria which characterized the last few days before the banking holiday was proclaimed. It was obvious that the people had full confidence in the banks which received licenses to reopen from the Federal Reserve Bank... there was

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a general 'run' yesterday [March 13] to deposit or redeposit money.... Conditions in New York were duplicated in each of the other Federal Reserve cities throughout the country where full banking facilities were restored." The process continued the following day, according to the *Times*: "With the reopening of the banks in clearing house centers... currency poured in from private hoards and from the tills of business houses to be deposited in the banks."

The success of the reopening had the somewhat anomalous result of making the emergency currency appear redundant. On March 15, a *Times* headline announced: "New Currency Put at \$2,000,000,000: Bureau made first Delivery of Money 24 Hours after Receiving Order." The newspaper then concluded: "If this movement [of returning currency] keeps up, bankers remarked, only a comparatively small amount of the new Federal Reserve Bank Notes will be needed to supplement the existing supplies of regular currency." The public's behavior supports the old banker adage: "When they know they can get their money, they are not so eager to have it."

The data on currency in circulation in Table 1 support the descriptive comments in the press. Currency held by the public had increased by \$1.78 billion in the four weeks ending March 8, 1933. The public returned two-thirds of the increase—\$1.18 billion—by the end of the month. <sup>44</sup> This remarkable turnaround is all the more impressive considering that when the government's initial licensing program ended on

 $<sup>^{35}</sup>$  Minutes, March 11, 1933, p. 172, Federal Reserve Bank of New York Archives.

<sup>&</sup>lt;sup>36</sup> March 13, 1933, p. 1 cont.

<sup>&</sup>lt;sup>37</sup> This tactic is consistent with the approach of the new Administration. Alter (2006, pp. 179-81) confirms Roosevelt's Machiavellian side by documenting his failure to cooperate with Hoover in the month before the election. He suggests that "It is hard to avoid the conclusion that [Roosevelt] intentionally allowed the economy to sink lower so that he could enter the presidency in a more dramatic fashion."

<sup>&</sup>lt;sup>38</sup> March 14, 1933.

<sup>&</sup>lt;sup>39</sup> March 14, 1933.

<sup>&</sup>lt;sup>40</sup> March 14, 1933.

<sup>&</sup>lt;sup>41</sup> March 15, 1933, p. 5.

<sup>&</sup>lt;sup>42</sup> March 15, 1933, p. 5.

<sup>&</sup>lt;sup>43</sup> The quote comes from the *Wall Street Journal* (September 15, 1914, p. 5). It refers to British investors not liquidating their American investments as the crisis of 1914 came under control. See Silber (2007a, p. 128).

Table 2
Significance Tests for Stock Returns: March 3-15, 1933

	Dow Jones Industrial Average	S&P 500 Index	CRSP Equally Weighted Index	CRSP Value-Weighted Index
Return over Bank Holiday (percent)	14.27	15.37	18.48	14.41
Post-election standard deviation of returns (percent)	2.48	2.45	1.81	1.94
<i>t</i> -statistic (with eight trading days)	2.03	2.22	_	_
t-statistic (with ten trading days)	_	_	3.23	2.35

Source: University of Chicago, Booth School of Business, Center for Research in Security Prices (CRSP).

Note: All data are continuously compounded.

April 12, 1933, a total of 4,215 banks, with deposits of nearly \$4 billion, remained closed (Wicker 1996, pp. 146-7). 45

The stock market provides a second assessment of the events from March 3, 1933 (the last trading day before the Bank Holiday), to March 15, 1933 (the day the New York Stock Exchange resumed trading). The Dow Jones Industrial Average increased by a record 15.34 percent on March 15, 1933—the largest one-day percentage price increase ever recorded, according to Siegel (1998, p. 183). However, Siegel omits this day from his ranking of largest daily stock price increases, presumably because trading had been suspended for almost two calendar weeks. Recall that Temin and Wigmore (1990, p. 488) dismiss entirely the March 15 price increase, maintaining that the market was quiet and little changed.

Is the 15.34 percent jump in the Dow Jones Industrial Average significant after accounting for the trading suspension? A simple *t*-test on the continuously compounded return of 14.27 percent on March 15, 1933, can determine whether this increase is statistically significant. The relevant daily standard deviation of returns is 2.48 percent. Allowing for eight regular trading days between March 3, 1933, and March 15, 1933, the *t*-statistic has a value of 2.03, which is significant at conventional levels. Table 2 presents the same set of statistics for three other stock market indexes: the S&P 500 Index (which consisted of ninety stocks at that time);

the Chicago Booth Center for Research in Security Prices (CRSP) equally weighted index; and the CRSP value-weighted index. The *t*-statistics for the Bank Holiday returns using the CRSP indexes allow for ten trading days between the two dates because, unlike the Dow Jones Industrial Average and the S&P 500 Index, the CRSP data include abbreviated Saturday sessions. <sup>48</sup> All of the *t*-statistics are significant.

Stock prices fluctuate for many reasons—and sometimes for no reason at all—but the magnitude of the favorable response on March 15, 1933, implies that the successful reopening of the banking system cannot be ignored. The contemporary press confirms the connection. The day after the market reopened, the *New York Times* observed: "The robust advance in stocks and bonds was interpreted—and correctly so—as Wall Street's mark of approval of the steps taken by the President and Congress in the interval to end the financial disorder." The *Wall Street Journal* added: "The emergency banking act lifted

<sup>&</sup>lt;sup>44</sup> The weekly data are not seasonally adjusted, but the monthly seasonal adjustments for March are minimal (see footnote 8). Moreover, the changes in currency in circulation for the corresponding weeks in each of the three previous years are small and show no pattern. In 1932, currency in circulation declined from \$5.26 billion in the second week of March to \$5.15 billion in the last week of March; in 1931, it grew from \$4.27 billion to \$4.33 billion; in 1930, it rose from \$4.21 billion to \$4.23 billion (source: *Banking and Monetary Statistics*, pp. 384-7, Board of Governors of the Federal Reserve System, 1943).

<sup>45</sup> The history of bank suspensions provides some perspective. Over the 1930-32 period, bank suspensions averaged 1,699 per year; from 1934 through 1940, they averaged 45 per year (source: *Banking and Monetary Statistics*, Table 66, Board of Governors of the Federal Reserve System, 1943).

<sup>&</sup>lt;sup>46</sup> To measure the normal variability of returns during this period, we first calculate the daily standard deviation of returns (continuously compounded) on the Dow Jones Industrial Average from January 4, 1932, through March 3, 1933. We then split the sample on November 8, 1932, the date of Roosevelt's election, and perform an *F*-test to determine whether the pre-election (January 4, 1932, through November 7, 1932) daily standard deviation of 3.45 percent equals the post-election (November 9, 1932, through March 3, 1933) daily standard deviation of 2.48 percent. The *F*-statistic equals 2.03, with 213 and 77 degrees of freedom, implying a *p*-value of .001. Thus, we reject the hypothesis of equality for the pre- and post-election standard deviation of returns. Daily data on the Dow Jones Industrial Average (and the estimate of the daily standard deviation) did not include the abbreviated Saturday trading sessions.

<sup>&</sup>lt;sup>47</sup> The eight trading days between March 3 and March 15 exclude Saturdays. Recognition that variance over nontrading days is lower than variance over trading days (see French and Roll [1986] and Lockwood and Linn [1990]) would increase the *t*-statistic.

 $<sup>^{48}</sup>$  The reduced daily standard deviations for the CRSP indexes compared with the S&P 500 Index and the Dow Jones Industrial Average are due, in part, to the lower standard deviation of returns on the abbreviated Saturday sessions compared with the rest of the week.

<sup>&</sup>lt;sup>49</sup> March 16, 1933, p. 25.

from security and commodity markets an enormous weight of potential liquidation."<sup>50</sup>And the *Chicago Tribune* waxed eloquent in its assessment: "The zooming upward of prices on the reopened stock markets today is regarded as barometrical indication of the economic weather test that is settling in. . . . The courage, determination, and resourcefulness of the new President have apparently taken the country by storm. The reopening of the banks with deposits everywhere exceeding withdrawals crowned with success the first action taken by the administration."<sup>51</sup>

# 6. Conclusion

A number of forces contributed to the success of the Bank Holiday declared by Franklin Delano Roosevelt in 1933. The President placed the responsibility for safeguarding the integrity of the payments system with the federal government. Congress passed the Emergency Banking Act of 1933, giving the President the power to restore confidence in the banking system by establishing 100 percent guarantees for bank deposits. And Roosevelt did not hesitate to use that power to end the banking crisis.

We can draw three main conclusions from this event. First, management of the banking crisis required bold and decisive action. Second, rhetoric alone did not solve the crisis; a substantive component was required to restore the banking system to normal operations. Finally, the speed with which the Bank Holiday and the Emergency Banking Act reestablished the integrity of the payments system demonstrates the power of credible regime-shifting policies.

<sup>&</sup>lt;sup>50</sup>March 16, 1933, p. 6.

<sup>&</sup>lt;sup>51</sup>March 16, 1933, p. 1. The press cited a second factor buoying stock prices: favorable Congressional legislation giving Roosevelt the power to reduce veterans' benefits and federal salaries. According to the *Chicago Tribune* (March 16, 1933, p. 1): "What the country is witnessing is a president doing swiftly and certainly what the overwhelming majority of the people demanded. . . . No sooner had he ended the bank panic than Mr. Roosevelt began pushing through Congress the bill for a 500 million dollar reduction in the cost of the federal government and the bill to legalize and tax beer."

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