

SAE./No.172/February 2021

Studies in Applied Economics

**THE BALANCE SHEET OF THE
EXCHANGE STABILIZATION FUND,
1934-2019**

Jiemin Sheng

The Johns Hopkins Institute for Applied Economics,
Global Health, and the Study of Business Enterprise



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The *Studies in Applied Economics* series is under the general direction of Professor Steve H. Hanke, Founder and Co-Director of the Johns Hopkins Institute for Applied Economics, Global Health, and the Study of Business Enterprise (hanke@jhu.edu).

About the Author

Jiemin Sheng currently works in the financial industry. He has a Master of Arts in International Affairs from George Washington University.

Abstract

In this paper, the author explores the balance sheet of the Exchange Stabilization Fund (ESF) over its first 85 years as a lens through which to analyze the fund. An accompanying spreadsheet workbook provides data from the annual balance sheet of the ESF since the fund's inception in 1934. These data are available in electronic form for the first time, which will be of interest to those wishing to do quantitative analyses of its role in U.S. monetary policy.

Acknowledgments

I wrote the original version of this note in 2019 as an intern in the Office of Global Economics and Debt within the Office of International Affairs of the U.S. Department of the Treasury. It reflects my own views, which are not necessarily those of the Department of the Treasury. I thank the staff of the Treasury Library for help with source documents, Kurt Schuler for guidance on the history of the ESF and on organizing the balance sheets, and Daniel Hall, Peter Wisner, and Patricia Pollard for their comments. I also thank Spencer Ryan for his edits and comments.

Link to digitized data: tinyurl.com/BalanceSheetofESF

Keywords: Exchange Stabilization Fund (ESF), balance sheet, assets, liabilities, gold, foreign exchange intervention

JEL codes: E52, E59, N12

The U.S. government created the Exchange Stabilization Fund (ESF) in 1934. This note uses the historical balance sheet, fully digitized in an accompanying spreadsheet workbook, as a lens through which to survey key developments over the ESF's 85-year history up until just before the recent extensive changes that have occurred in response to the coronavirus pandemic.

Establishment and Functions of the ESF

Congress created the ESF by the Gold Reserve Act of January 30, 1934.¹ The Act transferred the Federal Reserve System's gold reserves to the Treasury in exchange for certificates giving the Fed a claim on Treasury gold at the new exchange rate of \$35 per troy ounce.² The old exchange rate, in effect until March 1933, had been \$20.67 per troy ounce. The difference of \$14.33 per troy ounce was profit to the Treasury. The Gold Reserve Act allocated \$2 billion of the profit to the ESF. The Act also granted the president and the secretary of the treasury, as the president's agent, broad discretion over how to use the ESF. Initially, the ESF was not a permanent institution and required periodic reauthorization by Congress. The Bretton Woods Agreements Act of 1945, by which the United States accepted membership in the International Monetary Fund (IMF) and World Bank, used funds in the ESF for part of the U.S. quota subscription to the IMF, making the ESF permanent.

Within the Department of the Treasury, the Office of International Affairs handles certain administrative aspects of the ESF. The Bureau of the Fiscal Service, another part of the Treasury, handles the ESF's accounting and investment policies, while the Federal Reserve Bank of New York, acting as agent for the Treasury, holds the ESF's account and performs transactions at the Treasury's instruction.

The ESF has been used for three main functions over its lifetime:

1. Foreign exchange intervention. The original purpose of the ESF was to influence current exchange rates and expectations of future rates in a period of sometimes turbulent foreign exchange markets. The ESF was patterned after Britain's Exchange Equalisation Fund, which began operations in 1932, soon after Britain abandoned the gold standard in 1931. Before World War I and again from the mid 1920s until the Great Depression, most currencies had rigid exchange rates with gold. For the United States, after the signing of the Gold Standard Act, a troy ounce of pure gold exchanged for \$20.67. President Franklin Roosevelt took the United States off the gold standard in 1933 to stem outflows of gold from the Federal Reserve following the financial crisis of that year. After a brief period of managed floating, the United States returned to a different type of gold standard at \$35 a troy ounce on January 3, 1934. Unlike the old version of the gold standard, under the new version, only foreigners could exchange dollars for gold; Americans were prohibited from holding monetary gold.

The ESF was then created for the Treasury to use to intervene in foreign exchange markets to stabilize the value of the dollar, including to offset tactics by other countries that might be viewed as competitive devaluations. Unlike the United States, many other countries that abandoned the

¹ The References contain a detailed list of laws concerning the ESF.

² A troy ounce is 1/12 of a pound, whereas a regular, avoirdupois ounce is 1/16 of a pound.

gold standard during the Great Depression did not soon return to it. Later, after World War II, the Bretton Woods international monetary system returned almost all noncommunist countries to pegged exchange rates. They tied their currencies to the dollar, which in turn was tied to gold at \$35 per troy ounce. In this period and in the early part of the era of flexible exchange rates among the major currencies, which began in 1973, the ESF generally conducted intervention to support the value of currencies of nations aligned with the United States. But in the 21st century, interventions have become much less frequent; there have been only two, both coordinated with the Group of Seven (G-7) nations. The first of which occurred in September 2000 when monetary authorities of the Group of Three (G-3) nations³ purchased euros while the ESF sold dollars to support the euro after it depreciated sharply following its introduction in 1999. The next intervention occurred In March 2011, the ESF sold Japanese yen and purchased dollars in coordination with the G-7 to mitigate appreciation pressures on the yen that followed the Tohoku earthquake in Japan.

2. Lines of credit to foreign governments. The ESF was first used to offer a line of credit in to Mexico in 1936. Over its lifetime, the ESF has extended credit lines 125 times. However, many of those lines were never drawn on. For instance, Mexico did not draw on its first line of credit in 1936, though it did become the first country to draw under a second arrangement in 1938. From the Latin American debt crisis of the 1980s onward, the ESF often extended credit in coordination with international financial institutions.

Economic historians generally view a 1995 loan to Mexico as the most controversial use of an ESF line of credit. Congress had refused to approve a loan package out of general funds to support Mexico during a financial crisis. The package, whose proposed size was \$40 billion, would have guaranteed short-term Mexican sovereign debt coming due. The guarantee would only have become effective had Mexico defaulted on its debt. The administration then announced that it planned to use \$20 billion of ESF credits to Mexico subject to only the secretary's discretion. Members of the House of Representatives reacted by introducing bills which included proposals to limit the value of credits to \$5 billion without Congressional approval, to prohibit provisioning federal funds for any swaps, loans, loan guarantees, or grants to Mexico without Congressional approval, and to instruct the Comptroller General of the United States to investigate ESF financing for Mexico. Ultimately, Congress passed legislation, the Mexican Debt Disclosure Act, which required the secretary to report monthly on bilateral financial transactions and the president to report biannually on the Mexican economy. The act also required the president to certify, whenever guarantees or swaps were extended, that there was no projected cost to the U.S. budget due to the credits, to ensure that the U.S. funds would be repaid, and to certify that Mexico was engaging in economic reforms.

The last time to date that the ESF has lent directly to a foreign government was to Uruguay in 2002, when that country was suffering a financial crisis that spilled over from Argentina. During the 2007-08 global financial crisis, the ESF did not directly extend lines of credit to foreign governments. Instead, the Federal Reserve extended swap lines to select foreign central banks.

³ The G-3 consists of the United States, Germany (from 1999 the European Central Bank), and Japan. The G-7 consists of Canada, France, Germany, Italy, Japan, the United Kingdom, and the United States.

3. Transactions with the International Monetary Fund. The ESF is the channel through which the U.S. government makes or receives routine payments in Special Drawing Rights (SDRs), an asset and unit of account of the IMF. The ESF also holds all the SDRs that the IMF has allocated to the United States. The IMF introduced SDRs on January 1, 1970 as a means of increasing global liquidity. It has made subsequent allocations of SDRs in 1971, 1972, 1979, 1980, 1981, and 2009. The 2009 allocation, implemented in the wake of the global financial crisis, was especially large. It totaled 182.6 billion SDRs: 161.2 billion SDRs as general allocations and 21.5 billion SDRs as special allocations. The U.S. share was 27.5 billion SDRs of the general allocation and 2.9 billion SDRs of the special allocation, a total of 30.4 billion SDRs.

4. Other functions. In addition to its three main functions, the ESF has also occasionally been used for other purposes. Arguably, one of the most significant uses occurred in mid-September 2008, when the administration of George W. Bush used the ESF as a temporary backstop to guarantee the assets of money market mutual funds. The failure of Lehman Brothers had triggered heavy redemptions at some funds, which threatened to intensify the financial panic of the period. The guarantee helped stop the redemptions and even earned a profit of \$1.2 billion for the ESF, but Congress subsequently prohibited future use of the ESF in such fashion. Most recently, Congress appropriated \$500 billion to the ESF in 2020 to aid in coronavirus relief. Of the \$500 billion, \$454 billion was made available to support liquidity and to be used as a backstop for Federal Reserve emergency lending while the remaining \$46 billion was available to make direct loans or loan guarantees to firms in passenger air travel, cargo air carriers, and those critical to national security.

The Size of the ESF

The ESF's initial size of \$2 billion was equal to 24.5% of the assets of the Federal Reserve System or 3.0% of U.S. GDP in 1934. Adjusted for inflation, \$2 billion in 1934 dollars is equal to \$38 billion in 2019 dollars. The ESF's actual size as of September 2019 was \$93.2 billion, equal to 2.5% of the Fed's assets or 0.4% of U.S. GDP. (See the graphs on pages 11-12 for a visual representation of many of the points from here to the end of the main text.)

Of the initial \$2 billion, only \$200 million was available as a working fund for day-to-day intervention in foreign exchange markets. On February 26, 1947, Congress permanently removed \$1.8 billion of gold from the ESF, reallocating it as follows: (1) \$687.5 million for the U.S. quota subscription to the International Monetary Fund, (2) \$275.2 million to the gold certificate fund of the Federal Reserve Board of Governors, and (3) \$837.3 million to the Treasury general fund.⁴

After 1947, the now-smaller ESF balance sheet rose steadily from profits on foreign exchange dealings and interest earnings to reach \$363 million in 1963 (see the graphs below). In 1964, it jumped to \$611 million as a result of the U.S. government borrowing \$250 million from the IMF. The United States was not in financial difficulty; rather, it borrowed as a technical measure to help the IMF avoid violating a provision of its Articles of Agreement setting an upper limit on the IMF's holdings of a member's currency.

⁴ Treasury annual report 1950, p. 629, note 6.

Since the mid-1960s, the ESF balance sheet has expanded significantly – from less than \$2 billion to \$93 billion today – due primarily to two factors:

SDR allocations have expanded dramatically. As mentioned, the IMF made its first allocation of SDRs in 1970 and made several further allocations. The allocations entail each IMF member taking out an SDR-denominated liability with the IMF and simultaneously acquiring an SDR-denominated asset of equal value. Ever since 1970, SDRs and their liability counterparts have been a major share of the ESF balance sheet. Currently the share is more than half of total ESF assets or liabilities. The 2009 SDR allocation roughly doubled the size of the ESF, pushing it over \$100 billion for the first time. The ESF’s balance sheet peaked in 2011 at \$105 billion before steadily declining. At the end of the 2019 fiscal year, it was \$93 billion, or about 10% below the peak. The decline from the 2011 peak has been due to valuation effects: the dollar has appreciated more than 20% against a broad trade-weighted basket of foreign currencies during the period. So, the dollar value of the ESF’s foreign financial assets, including SDRs, has consequently fallen.

Policy shifts regarding earnings and expenditures substantially increased retained earnings. The non-SDR portion of the ESF’s balance sheet has also expanded substantially, rising from less than \$2 billion in the mid-1970s to around \$40 billion today, due to shifts in policy regarding earnings and expenditure. From its inception, the ESF’s dollar assets have been held in interest-earning U.S. government securities. However, the ESF’s foreign assets were initially held in noninterest-bearing deposits, typically with foreign central banks. This changed in 1961, when the ESF was allowed to start investing in interest-earning foreign assets. More significantly, for decades after the creation of the ESF, part of its earnings were used by the Treasury to fund the operations of the Office of International Affairs. Officials apparently were unaware that the arrangement may have violated Article I, Section 9 of the U.S. Constitution, which says, “No Money shall be drawn from the Treasury, but in Consequence of Appropriations made by Law.” Starting in October 1979, the IA budget regularly comes under the regular Congressional appropriations process. Since that time, nearly all ESF income has been retained in the balance sheet.

Composition of Assets

Until 1947, gold reserves made up around 90% of the fund’s total assets. (See the graph entitled, “ESF Assets (percent of total)” on page 11.) Congress then appropriated most of the gold, as was described above. After 1952, gold reserves fluctuated, but were never more than about one-third of total assets. ESF annual reports are short on operational details, but a surge in gold holdings in the early 1960s may have been related to U.S. involvement in the London gold pool, an attempt to prevent the market price of gold from exceeding the official prices of the Bretton Woods system of pegged exchange rates. Gold earned no interest, which may have been a reason for its rapidly declining share in the ESF’s balance sheet after 1965. Gold was only 5% of total assets in 1971, when President Richard Nixon in effect ended the gold standard. And since 1978, the ESF has held no gold after all gold was sold to the Treasury general account at the par value of \$35 per troy ounce. The gold was then monetized as the Treasury issued gold certificates against it.

Over time, the ESF increasingly came to hold dollar assets in place of gold. These took the form of government credits, either through deposits at the Treasury (deposits that may not have paid interest) or as U.S. Treasury securities. Initially, the ESF held marketable Treasury securities, but since at latest 1989, the Fund's Treasury credits take the form of special, nonmarketable U.S. Treasury securities that pay an overnight rate of interest. These totaled \$23 billion at the end of fiscal 2019.

A new period in the balance sheet began in 1970 when the SDR came into being. SDRs immediately constituted more than half of the Fund's balance sheet. Despite subsequent allocations of SDRs, they gradually drifted down to just 19% of total assets in 2008 as retained earnings grew. Then, with the allocation of SDRs that IMF members agreed on during the global financial crisis, SDR's share of the balance sheet rose above half, where it has since remained.

Foreign financial assets other than SDRs have fluctuated along with ESF loans to foreign governments and U.S. foreign exchange intervention strategy. These assets jumped from nearly zero to more than a third of assets in 1947 with a loan to Mexico to help stabilize the peso, then returned to a low level as Mexico repaid the loan. They peaked in 1969 at 64% of assets as a result of a shift out of U.S. Treasury securities in compliance with new investment procedures. Foreign financial assets also peaked again at nearly 68% in 1995 as a result of a stabilization loan to Mexico mentioned above. Foreign financial assets other than SDRs have remained steady at around 22% of total assets since 2009.

Composition of Liabilities and Capital

At the start, the ESF was nearly all capital—the counterpart on the liability side to the \$2 billion in assets Congress had allocated to it. (See the graph entitled, “ESF Liabilities and Capital (percent of total assets)” on page 12.) The reduction in ESF assets in 1947 reduced capital to \$200 million, or 67% of liabilities. The capital account (i.e., capital excluding retained earnings) has remained at \$200 million ever since. As the ESF has grown in size, the capital account has shrunk as a share of liabilities: by 1963, it was 55% of liabilities, by 1968, just 8%, and since 1988, under 1%.

The U.S. stand-by agreement with the IMF in 1963 made the ESF a debtor to the IMF for the first time. The agreement allowed the U.S. to purchase currencies from the IMF up to an equivalent of \$500 million. In the following year, it had purchased an equivalent of \$125 million, mainly in German marks and French francs. The agreement enabled the IMF to avoid hitting a limit that would have prevented it from accepting dollars from members making repurchases (loan repayments).⁵ The creation of the SDR in 1970 further boosted liabilities to the IMF, because the SDR liability to the IMF was the counterpart to SDR assets. Near after 1970, liabilities to the IMF were 75% or more of total liabilities, peaking at 89% at 1978. In September 2019, they were 57% of the total.

As discussed above, after changes in the 1970s that began funding IA operations through Congressional appropriations, the ESF began to accumulate significant retained earnings as

⁵ IMF *Annual Report* 1964, pp. 10-12.

interest income was added to the balance sheet and the ESF saw a boost to the value of its foreign assets as the dollar depreciated in the mid-1980s around the time of the Plaza Accord. By 1986, retained earnings exceeded 30% of liabilities plus capital. Meanwhile, since then, the ESF's liabilities have been almost all funds owed to the IMF. All other items combined were less than 8% of total liabilities plus capital from 1986 to 1992 and have been less than 1% since 1993.

References

Web links

The accompanying spreadsheet workbook with data on the ESF balance sheet is here:

<https://sites.krieger.jhu.edu/iae/working-papers/studies-in-applied-economics/>

The ESF page on the U.S. Department of the Treasury Web site is here:

<https://home.treasury.gov/policy-issues/international/exchange-stabilization-fund>

International Monetary Fund. 2017. General and Special SDR Allocations.

<https://www.imf.org/external/np/tre/sdr/proposal/2009/0709.htm#:~:text=A%20general%20allocation%20of%20Special,member%20countries'%20foreign%20exchange%20reserves.>

Laws

Gold Reserve Act of 1934, Public Law 73-87, January 30, 1934: Established a maximum gold content for the dollar of 60 percent of the previous official value; established the Exchange Stabilization Fund (ESF) for a term of up to three years.

An Act to extend the time within which the powers relating to the stabilization fund and alteration of the weight of the dollar may be exercised, Public Law No. 75-1, ch. 5, January 23, 1937: Extended the life of the ESF to June 30, 1939.

An Act to extend the time within which the powers relating to the stabilization fund and alteration of the weight of the dollar may be exercised, Public Law 76-165, ch. 250, July 6, 1939: Extended the life of the ESF to June 30, 1941.

An Act to extend the time within which the powers relating to the stabilization fund and alteration of the weight of the dollar may be exercised, Public Law 77-142, ch. 265, June 30, 1941: Extended the life of the ESF to June 30, 1943, which it also set as the expiration date for the President's power to vary the gold content of the dollar.

An Act to extend the time within which the powers relating to the stabilization fund and alteration of the weight of the dollar may be exercised, Public Law 78-42, ch. 76, April 29, 1943: Extended the life of the ESF to June 30, 1945.

Bretton Woods Agreements Act, Public Law 79-171, July 31, 1945: Accepted U.S. membership in the IMF and World Bank; established the National Advisory Council on International Monetary and Financial Problems; made the ESF permanent.

Bretton Woods Agreements Act Amendment, Public Law 87-490, June 19, 1962: Permitted U.S. purchases of gold or currency from the IMF to be routed through the ESF.

Special Drawing Rights Act of 1968, Public Law 90-349, June 19, 1968: Specified that Special Drawing Rights (SDRs) allocated to or acquired by the United States are resources of the ESF.

An Act to authorize United States participation in increases in the resources of certain international financial institutions, to provide for an annual audit of the Exchange Stabilization Fund by the General Accounting Office, and for other purposes, Public Law 91-599, December 30, 1970, Section 42: Provided for the first Congressional audit of the ESF.

An Act to provide for amendment of the Bretton Woods Agreements Amendment Act, and for other purposes, Public Law 94-564, October 19, 1976: In effect officially ended the gold standard in accord with the IMF's Second Amendment; required the ESF to submit an annual report to Congress, rather than just to the President as previously.

An Act to authorize the Secretary of the Treasury to invest public moneys, and for other purposes, Public Law 95-147, October 28, 1977: Forbade the ESF from lending to a foreign government

or entity for more than six months in any twelve-month period, unless the President provides a written determination to the Congress.

Exchange Stabilization Fund Amendments Act, Public Law 95-612, November 8, 1978: Prohibited using the ESF to pay for administrative expenses and required monthly reporting to Congress of its agreements, transactions, and projected liabilities.

Mexican Debt Disclosure Act of 1995, Title IV of Public Law 104-6, April 10, 1995: Required reporting connected with a recent ESF loan to Mexico.

Public Law 110-343, October 3, 2008, Division A, Title I, section 131: Forbade use of the ESF to backstop money market mutual funds, as the George W. Bush administration had recently done.

Coronavirus Aid, Relief, and Economic Security Act (CARES Act), Public Law 116-136, March 27, 2020, Section 4015: Suspended through the end of 2020 restrictions on using the ESF imposed by Public Law 110-343; allocated \$500 billion through the ESF for making and backstopping loans to businesses.

For consolidated current legislation, see U.S. Code, Title 12, Sections 5236, 5412; Title 22, Sections 262r-3, 286, 5411-5412; Title 31, Section 5302.

Regulations

Memorandum from Secretary of the Treasury Douglas Dillon to President John F. Kennedy, August 30, 1961: Proposed (and received) approval for allowing the ESF to invest in interest-earning assets.

Treasury Department Order No. 170-4, April 26, 1957; Revision 1, October 15, 1962; Revision 2, February 8, 1963; Revision 3, January 7, 1964; Revision 4, August 9, 1972: Rules concerning disbursement of ESF funds.

Treasury Department Order No. 170-13, August 7, 1972: Rules concerning administrative expenses paid by ESF.

Treasury Department Order No. 237, April 7, 1975: Assignment of responsibility for management of ESF.

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United States. Department of the Treasury. 1934-1953. *Annual Report of the Secretary of the Treasury on the State of the Finances for the Fiscal Year Ended June 30, ...* Washington, D.C.: Government Printing Office. (Contains balance sheet data on the Exchange Stabilization Fund before it started issuing a separately published report.) Available at <https://fraser.stlouisfed.org/title/194>.



