

“Timely, Targeted, and Temporary?” An Analysis of Government Expansions over the Past Century

Jason E. Taylor and Andrea Castillo



MERCATUS RESEARCH

 **MERCATUS CENTER**
George Mason University

3434 Washington Blvd., 4th Floor, Arlington, Virginia 22201
www.mercatus.org

Jason E. Taylor and Andrea Castillo. “Timely, Targeted, and Temporary? An Analysis of Government Expansions over the Past Century.” Mercatus Research, Mercatus Center at George Mason University, Arlington, VA, October 2014. <http://mercatus.org/publication/timely-targeted-and-temporary-analysis-government-expansions-over-past-century>.

ABSTRACT

John Maynard Keynes suggested that government should undertake a temporary surge in deficit-financed spending during times of economic need. Today, countercyclical fiscal stimulus spending is believed to be most potent when programs are timely, targeted, and temporary. However, history has shown that fiscal stimulus policies have a dismal record with respect to the “three Ts.” This paper examines episodes of major government expansion during economic emergencies along with the contraction, or lack thereof, once the emergency has passed. We analyze broad measures such as federal government spending, both in absolute terms and as a percentage of GDP. We conclude that most countercyclical spending programs do not follow the three Ts, which may undermine their ultimate effectiveness and explain why many economists are skeptical of such policies.

JEL codes: E61, E62, E65, H12, H3, H50, N12

Keywords: stimulus, macroeconomics, budget, spending, Keynes, timely, temporary, targeted, cost-benefit analysis, benefit-cost analysis

Copyright © 2015 by Jason E. Taylor, Andrea Castillo,
and the Mercatus Center at George Mason University

Release: January 2015

The opinions expressed in Mercatus Research are the authors' and do not represent official positions of the Mercatus Center or George Mason University.

I. INTRODUCTION

John Maynard Keynes suggested that the government should undertake a temporary surge in deficit-financed spending during times of economic need. When the economy is back to full employment, the government should reverse course by cutting spending and running surpluses to pay off the debt built up during the crisis. The government must balance its budget, but Keynesian theory suggests it should do so over the course of the business cycle rather than at every point in time. This idea, formalized in Keynes's 1936 book *The General Theory of Employment, Interest, and Money*,¹ was a major departure from the prior policy dogma suggesting that governments should balance their budgets every year. To illustrate, in 1931 and 1932, Herbert Hoover raised taxes dramatically—the top marginal rate on income rose from 25 to 63 percent—in an attempt to balance the budget even though the unemployment rate was approaching 20 percent. This action only made the Great Depression worse.

Few economists today would disagree that Keynes's cyclically balanced budget logic is, in theory, an improvement over the prior policy dogma. Furthermore, if the government could initiate stimulus policies that were, to quote President Obama in 2009, "timely, targeted, and temporary," economists would be more likely to support such actions during economic downturns.² Current Congressional Budget Office (CBO) director Douglas Elmendorf and Council of Economic Advisers chairman Jason Furman produced one modern primer that explains what a timely, targeted, and temporary stimulus program

1. John M. Keynes, *The General Theory of Employment, Interest, and Money* (London: Palgrave Macmillan, 1936).

2. Since the debate over the American Recovery and Reinvestment Act in 2008 and 2009 and its subsequent failure to accomplish its stated unemployment reduction goals, some economists now argue that the US economy has entered a period of "secular stagnation" in which fiscal stimulus programs should not be timely, targeted, and temporary, but "planned, purposive, and permanent." Robert Kuttner, "Here's How to Deal with Entrenched Unemployment," *Demos Policyship* (January 13, 2014), <http://www.demos.org/blog/1/13/14/heres-how-deal-entrenched-unemployment>.

“History has shown that fiscal stimulus policies have a dismal record with respect to the ‘three Ts.’”

would look like and provides some modern policies that fit their conditions, such as extending unemployment insurance temporarily or increasing food stamps temporarily.³ However, many economists, particularly since Robert E. Lucas and Thomas J. Sargent’s paper in 1979,⁴ express strong skepticism about Keynesian-style fiscal policy. Economists Olivier Blanchard, Giovanni Dell’Ariccia, and Paolo Mauro write that before the downturn that began in 2007, there was a general consensus that if countercyclical policy were to be attempted at all—a point certainly up for debate—it should not be done by fiscal measures, but instead by central banks as embodied by principles laid out by, for instance, John B. Taylor in 1993.⁵ The reason is clear: history has shown that fiscal stimulus policies have a dismal record with respect to the “three Ts.”

Of course, Keynesian fiscal policy has come back in full force since 2008, when the George W. Bush and Obama administrations passed multiple stimulus policies. The United States subsequently ran annual deficits in excess of \$1 trillion a year for four straight years. Recent research argues that the \$831 billion American Recovery and Reinvestment Act of 2009 (ARRA), in particular, failed in its timely and targeted mission.⁶ Unemployment continued to

3. Elmendorf and Furman, “If, When, How: A Primer on Fiscal Stimulus” (Hamilton Project Strategy Paper, Brookings Institution, Washington, DC, 2008).

4. Lucas and Sargent, “After Keynesian Macroeconomics,” *Federal Reserve Bank of Minneapolis Quarterly Review* 3, no. 2 (1979): 1–16.

5. Blanchard, Dell’Ariccia, and Mauro, “Rethinking Macroeconomic Policy” (IMF Staff Position Note, International Monetary Fund, Washington, DC, January 2010); Taylor, “Discretion versus Policy Rules in Practice,” *Carnegie-Rochester Conference Series on Public Policy*, no. 39 (1993): 195–214.

6. Garrett Jones and Daniel Rothschild, “No Such Thing as Shovel Ready: The Supply Side of the Recovery Act” (Working Paper No. 11-18, Mercatus Center at George Mason University, Arlington, VA, September 2011); Garrett Jones and Daniel Rothschild, “Did Stimulus Dollars Hire the Unemployed?” (Working Paper No. 11-34, Mercatus Center at George Mason University, Arlington, VA, September 2011); Veronique de Rugy, “No Correlation Between State Unemployment at Time of ARRA and Stimulus Funds Received,” Mercatus Center at George Mason University, January 11, 2010, <http://mercatus.org/publication/no-correlation-between-state-unemployment-time-arra-and-stimulus-funds-received>.

rise after its passage and remained stubbornly high for several years. The Federal Reserve projects that the economy will return to “full employment” (i.e., an unemployment rate of about 5.5 percent) in 2016, which would mean that unemployment would have been above its “natural rate” for about eight years.⁷

With respect to the third “T”—temporary—while it is impossible to know for certain how much the fiscal expansion of the past few years will affect the long-run size and scope of government, history can provide insight. Along with the issues of “targeted” and “timely,” this paper will examine whether episodes of major government expansion during emergencies tend to be transitory—in particular, it will examine the contraction, or lack thereof, of these government expansions once the emergency has passed.

II. A MODEL OF TIMELY, TARGETED, AND TEMPORARY

Modern macroeconomists who favor stimulus programs do not advise the government to stimulate aggregate demand by burying banknotes in the ground so that private enterprise can put people to work digging them up again—as Keynes famously suggested, tongue in cheek, in *The General Theory*. Rather, economists believe stimulus programs should be “timely, targeted, and temporary.”⁸ First, stimulus spending should be properly timed to take effect while the economy is operating short of its capacity. An ill-timed stimulus program will be too late to help when needed, and also runs the risk of overheating an already-recovering economy while wasting federal resources in the process.

Next, stimulus spending should not be indiscriminate, but instead should target the sectors that can make best use of it. In testimony before the Joint Economic Committee discussing the ideal fiscal stimulus to counteract the 2008 recession, Obama economic advisor Lawrence Summers specified that targeted stimulus “requires that funds be channeled where they will be spent rapidly and where they will reach those most in need.”⁹ Thus, while the general goal of stimulus is to boost aggregate demand, targeted stimulus spending will address the specific economic sectors that will yield the greatest social benefits for the resources expended. Keynes noted that while large-scale public

7. “Advance Release of Table 1 of the Summary of Economic Projections to Be Released with the FOMC Minutes,” Federal Reserve, accessed July 21, 2014, <http://www.federalreserve.gov/monetarypolicy/fomcprojtabl20140319.htm>.

8. While Obama used this “timely, targeted, and temporary” phrase, it was actually articulated earlier by one of his chief economic advisers, Lawrence Summers. See Lawrence Summers, “Fiscal Stimulus Issues” (Testimony before the Joint Economic Committee, January 16, 2008), http://larrysummers.com/wp-content/uploads/2012/10/1-16-08_Fiscal_Stimulus_Issues.pdf.

9. *Ibid.*

works may be the “right cure for a chronic tendency to a deficiency of effective demand,” they are unattractive targets for stimulus spending because they are slow-moving and difficult to reverse.¹⁰ In addition, the targeted condition requires that stimulus spending be directed to appropriate output- or welfare-driven¹¹ projects that maximize social benefits for a given cost, as laid out for example by Lawrence Summers and Bradford DeLong,¹² instead of indiscriminately funding any project that is deemed “shovel-ready.” Wasteful spending, even if targeted, will still be wasteful. Furthermore, some have argued that previous deficit-financed stimulus programs were partially undermined when individuals chose to save, rather than spend, one-time government payments—in essence the government borrowed money from Peter’s bank and gave it to Paul, who deposited it right back into the same banking system.¹³

Finally, stimulus spending should be temporary. Once an economy has sufficiently recovered from recession—or is on a rapid and self-sustaining path back to full employment—the government should remove the stimulus, and pay for it via surpluses. If the stimulus is not temporary, risks of debt-induced high interest rates and inflation will persist. Furthermore, if the stimulus involves government spending in an area that would have otherwise (particularly in normal economic times) come from the private sector, there is a strong possibility that these resources will displace or compete with private investment. Also, bubbles may form if the government overstimulates certain industries for long periods of time.

The challenge for policymakers is to meticulously track macroeconomic conditions, identify the correct sectors and methods for economic intervention, bring a properly designed program to bear in the appropriate range of time, and finally, curry the political will to terminate the program once the emergency ends. We can look back at previous stimulus programs to determine to what extent their performance aligned with theory and consider what impact this had on program effectiveness.

10. John M. Keynes, *Collected Writings*, ed. Elizabeth Johnson and Donald Moggridge (Cambridge: Cambridge University Press, 1980), 27:122.

11. Eric Sims and Jonathan Wolff, “The Output and Welfare Effects of Fiscal Shocks over the Business Cycle” (NBER Working Paper No. 19749, National Bureau of Economic Research, Washington, DC, December 2013). The authors argue that welfare-targeted stimulus projects yield higher multipliers in demand-driven recessions, while output-targeted stimulus projects yield higher multipliers in supply-driven recessions.

12. Lawrence Summers and Brad DeLong, “Fiscal Policy in a Depressed Economy,” *Brookings Papers on Economic Activity* 44, no. 1 (2012): 233–97.

13. John F. Cogan, John B. Taylor, and Volker Wieland, “The Stimulus Didn’t Work,” *Wall Street Journal*, September 17, 2009, <http://online.wsj.com/news/articles/SB10001424052970204731804574385233867030644>.

III. CASE STUDY: THE CIVIL WORKS ADMINISTRATION

We begin our discussion with an agency that was formed when the ideas behind Keynesian-style stimulus policies were still in their infancy. The Civil Works Administration (CWA) appears to serve as a historical model for exactly what policymakers seem to have in mind for implementing an effective stimulus program. In the fall of 1933, it became clear that the Federal Emergency Relief Administration (FERA) and the Public Works Administration (PWA), the two extant federal public works agencies at that time, were not providing relief work to as many workers as were in need. The economy, which had surged in the spring and early summer of 1933, experienced a dramatic contraction between August and October 1933 and members of the Franklin D. Roosevelt administration fretted about the plight of unemployed workers in the upcoming winter months. In the waning days of October, Harry Hopkins, director of FERA, along with a handful of FERA administrators, formed a plan to quickly provide expanded work relief to millions of Americans during the winter. The new program would have the federal government itself directly hire workers and supervise projects rather than providing grants to states to hire private companies to build roads or schools. Furthermore, the government would undertake very broad activities that would employ skilled workers like writers, architects, teachers, draftsmen, and musicians.

Before going to President Roosevelt with this idea, Hopkins met with officials from the PWA, which had been authorized to spend up to \$3.3 billion, to see whether the agency would be willing to provide funding. Hopkins was able to secure a promise of \$400 million, which he and his team estimated could employ four million people during the winter of 1933/34.¹⁴ On November 2, Hopkins presented the idea to Roosevelt over lunch. Roosevelt told Hopkins to get to work immediately, and that evening Roosevelt formally approved the transfer of \$400 million from the PWA to Hopkins's still-nameless agency. On the evening of November 4 and into the early morning of November 5, Hopkins and his staff hashed out the details of what would become the Civil Works Administration. On November 8, a press release officially announced the creation of the CWA. The new organization would undertake activities that could be done quickly and without long planning delays—what today might be dubbed “shovel-ready” projects.

On November 15, more than 1,000 governors, mayors, county officials, and relief administrators from around the country gathered in a Washington,

14. Forrest A. Walker, *The Civil Works Administration: An Experiment in Federal Work Relief, 1933–1934* (New York: Garland Publishing, 1979), 33.

DC, hotel as Hopkins explained how the new program squared with the expectations of his audience. Roosevelt concluded the meeting with a short speech about the CWA. That evening, Hopkins hosted a smaller executive meeting with state relief administrators in which he told them how many people each state could hire using a quota system based on population and current relief load. By Monday, November 20, just 18 days after Hopkins lunched with the president, the first workers began CWA projects, and on November 23, the first payday, 814,511 workers received a check.¹⁵ On December 21, 3,418,431 workers received a CWA paycheck, and on January 11, 1934—the peak of the agency’s activity—4,263,120 Americans were employed on CWA projects.¹⁶ When the \$400 million ran out, an additional \$450 million was added to its appropriation.¹⁷

In February 1934, the CWA began to curtail its activities, and on March 31, it effectively ceased operation. During its 136 days of existence, the CWA undertook 177,600 projects, from sealing abandoned coal mines to compiling and analyzing climate data from the Soviet Union.¹⁸

This account is not intended to glorify the accomplishments of the CWA. In fact, the CWA was criticized for showing favoritism in how it dispersed work relief, and the economic value attached to some of the make-work projects the agency undertook can certainly be questioned. Additionally, many contemporaries were upset that unlike other relief programs of the day, the CWA did not use a “means test” whereby relief work was allotted to those most in need, based on how much debt they had or how long they had been out of work—in the context of this paper, contemporaries argued that the CWA work projects were not targeted as well as they could have been. Still, that a program of its size could go from thought to practice in well under a month stands as a remarkable achievement, particularly during peacetime. That the program spent \$850 million, about \$15.4 billion in 2014 dollars, and put about 6 million different people on its payrolls in four months and then disappeared completely is equally extraordinary. We do not mean to imply that the CWA was a perfect agency, but with respect to the three Ts of stimulus policy—timely, targeted, and temporary—we will show that this agency is a major outlier in the history of government stimulus programs.

15. *Ibid.*, 43.

16. *Ibid.*, 67.

17. *Ibid.*, 67.

18. *Ibid.*, 82.

IV. “TIMELY, TARGETED, AND TEMPORARY” IN PRACTICE

Timely

Have stimulus programs generally been as well timed as the CWA was in the winter of 1933/34? A 2012 study of historical *Economic Reports of the President (ERP)* from 1953 to 2011 compares policymakers’ expectations to the actual outcomes of spending programs.¹⁹ It finds that early editions of the annual *ERP* in the wake of the Keynesian revolution displayed heady optimism about policymakers’ abilities to accurately time countercyclical fiscal policy. Kennedy’s 1962 *ERP*, for instance, praises the Keynesian stimulus used to counteract the downturn of the 1960–1961 recession: “Government fiscal and monetary policies contributed strongly to the favorable economic developments of the past year.” In the next sentence, however, the *ERP* admits that “the downswing probably would have ended early in 1961 in any case.”²⁰

The 2012 study concludes that policymakers have consistently struggled to properly time fiscal stimulus spending. According to this analysis of the *ERPs* during every postwar recession in the 20th century—1957–1958, 1960–1961, 1969–1970, 1973–1975,²¹ 1980, 1981–1982, and 1990–1991—stimulus spending was either improperly timed or did not occur at all. Government spending generally peaked well after the economy had already entered the recovery stage of the business cycle. The 1976 *ERP* laments

“Policymakers
have consistently
struggled to
properly time
fiscal stimulus
spending.”

19. Antony Davies et al., “The U.S. Experience with Fiscal Stimulus: A Historical and Statistical Analysis of U.S. Fiscal Stimulus Activity, 1953–2011” (Working Paper No. 12-12, Mercatus Center at George Mason University, Arlington, VA, April 2012), <http://mercatus.org/publication/us-experience-fiscal-stimulus>.

20. *Ibid.*, 11.

21. Congress did pass a countercyclical tax cut to stave off the 1973–1975 recession, but National Bureau of Economic Research data show that the recession had already ended by the time the tax bill was signed into law on March 29, 1975. Economists at the time doubted the efficacy of these tax cuts. See, for instance, Victor Zarnowitz and Geoffrey H. Moore, “The Recession and Recovery of 1973–1976,” *Explorations in Economic Research* 4, no. 4 (1977): 1–87.

the failure to counteract the 1973–1975 recession with the following: “Our ability to forecast is at best imperfect. . . . We also lack reliable estimates of how long it takes before the economy responds to policies.”²² Today, economists generally view the “impact lag”—the time between the implementation of a policy and its full effect—as being anywhere between three months and three years.²³ The 1982 *ERP* gives a dim view regarding the so-called recognition lag, or the time it takes policymakers to even realize there is a problem: “The information needed to [fine-tune the economy] is often simply not available, and when it becomes available, it is quite likely that underlying [economic] conditions will already have changed.”²⁴ The 1990 *ERP* nicely lays out the various problems to achieving timeliness: (1) difficulty in assessing current macroeconomic data, (2) imprecise economic forecasting, and (3) lags between policy implementation and economic effect.²⁵

The 2012 study finds that the government did a better job with respect to timing of stimulus policies in the two 21st-century recessions, 2001 and 2007–2009. It should be noted, however, that the countercyclical timeliness of the Bush tax cuts of 2001 was almost entirely fortuitous, as they were formulated during the campaign season of 2000, when the economy was still expanding. And given the length and magnitude of the Great Recession—the longest downturn since the Great Depression of the 1930s—making any stimulus reasonably timely was not difficult. Even still, there were widespread complaints that Obama’s stimulus did not deliver the needed punch quickly enough.²⁶ On September 22, 2011, Republican presidential candidate Gary Johnson said, “My next-door neighbor’s two dogs have created more shovel-ready jobs than this current administration.”²⁷ Even Obama admitted the presence of a strong policy implementation lag when he joked on June 13, 2011, that “shovel ready was not as shovel ready as we expected.”²⁸

22. Davies et al., “Fiscal Stimulus,” 15.

23. For the Fed’s estimates of monetary policy lags, see “How Does Monetary Policy Affect the U.S. Economy?,” Federal Reserve Bank of San Francisco, accessed July 21, 2014, <http://www.frbsf.org/us-monetary-policy-introduction/real-interest-rates-economy>. Economists generally view the fiscal impact lag as being of similar magnitude because they both rely on the time lag of the so-called multiplier effect whereby one person’s spending becomes another person’s income and, hence, more spending occurs.

24. Davies et al., “Fiscal Stimulus,” 18.

25. *Ibid.*, 19.

26. Paul Krugman, “The Obama Gap,” *New York Times*, January 9, 2009, A27 (New York edition).

27. “Gary Johnson’s Dog Comment at Fox/Google Debate 9/22/11,” YouTube video, 0:13, posted by “acdccult69,” September 22, 2011, https://www.youtube.com/watch?v=_hYAWHpFLpc.

28. David Jackson, “Obama Jokes about ‘Shovel-Ready’ Projects,” *USA Today*, June 13, 2011, <http://usat.ly/kUFblZ#.VJBrkwl4aA.twitter>.

Clearly, a major problem that hinders policymakers' abilities to properly time countercyclical stimulus spending is the lack of reliable contemporary data. Official government data on GDP, employment, consumer prices, and so on are, by definition, backward looking, and often subject to dramatic revisions in the months that follow their release. The recession of 2001 dramatically illustrates this point. On November 26, 2001, the National Bureau of Economic Research (NBER) officially declared that the economy was in a recession and noted that the recession had begun in March, eight months earlier. Immediately after the announcement, President Bush called on Congress to pass a stimulus package so he could "sign it before Christmas."²⁹ Later, the NBER would date November 2001 as the trough of the eight-month recession, the point at which the economy began growing again³⁰—in other words, policymakers did not even know the economy was in recession until the recession was, in fact, over.

A number of governmental and nongovernmental organizations, like CBO, the World Bank, and the Organisation for Economic Co-operation and Development (OECD), forecast future data to anticipate macroeconomic trends and guide policy. Private organizations, like FocusEconomics and Consensus Economics Inc., also provide forecasts. Interestingly, Roy Batchelor reports that the consensus forecasts of private entities are generally less biased and more accurate than OECD and International Monetary Fund (IMF) forecasts.³¹ In the United States, the Congressional Budget Office reports that its own forecasting history has been comparable to the *Blue Chip* consensus of 50 private-sector forecasts, exhibiting roughly the same error and accuracy rates.³² Robert Krol also finds that CBO forecasts are generally consistent with private forecasts; however, he reports that economic forecasts from the Office of Management and Budget, which is under the direction of the executive branch, diverge from CBO and private forecasts and are biased toward overstating economic growth.³³

Private forecasters, however, are hardly immune to error. The Federal Reserve Bank of Philadelphia's Survey of Professional Forecasters (SPF) has

29. "Economists Call It Recession," *CNNMoney*, November 26, 2001, <http://cnmfn.cnn.com/2001/11/26/economy/recession/>.

30. "It's Official: 2001 Recession Only Lasted Eight Months," *USA Today*, July 17, 2003, http://usatoday30.usatoday.com/money/economy/2003-07-17-recession_x.htm.

31. Batchelor, "How Useful Are the Forecasts of Intergovernmental Agencies? The IMF and OECD versus the Consensus," *Applied Economics* 33, no. 2 (2001): 225–35.

32. Congressional Budget Office, "CBO's Economic Forecasting Record: 2013 Update" (January 2013).

33. Krol, "Forecast Bias of Government Agencies," *Cato Journal* 34, no. 1 (2014): 99–112.

collected forecaster predictions on macroeconomic trends since 1968.³⁴ The SPF “Anxious Index” forecasts, which report real GDP forecasts of private forecasters one quarter ahead, have tended to underpredict real GDP changes during expansion and contraction phases. Bureau of Economic Analysis forecasts, on the other hand, exhibit the opposite error by overpredicting declines and underpredicting recoveries.³⁵ Different forecasts have their relative strengths and weaknesses, but no forecaster has a crystal ball. A policymaker’s choice of which economic forecasts to rely on will have a significant effect on the timeliness (or lack thereof) of the resulting stimulus program.

Targeted

Have stimulus programs been targeted, according to the principles laid out by Summers in his 2008 testimony and in his paper with DeLong?³⁶ To adequately target stimulus spending, policymakers must have the correct information to determine both the proper spending channels and whether stimulus spending passes an appropriate benefit-cost test. This requires that policymakers avoid temptations to distribute money merely to friends or in ways that will bring the most political capital. Looking back to the birth of modern stimulus policies, Gavin Wright suggests that 1930s New Deal spending was strategically allocated to solidify political support for the Democratic Party rather than solely on the basis of economic need.³⁷ In a follow-up piece, Gary M. Anderson and Robert D. Tollison demonstrate that factors such as the tenure of the state’s House and Senate representatives as well as congressional representation on key appropriations committees helped determine a state’s allocation of New Deal spending, while “greater economic distress was only weakly correlated” with spending.³⁸

A 1978 analysis of budgets in the wake of the 1973–1975 recession suggests that federal grants to state governments simply bolstered municipal coffers

34. The survey was previously administered by the American Statistical Association and the National Bureau of Economic Research until being turned over to the Federal Reserve Bank of Philadelphia in 1990.

35. Dennis J. Fixler and Bruce T. Grimm, “Revisions, Rationality, and Turning Points in GDP” (presented at “Tracking the Turning Points in the Economy,” AEA Meetings, Washington, DC, January 3–5, 2003).

36. Summers, Testimony; Summers and DeLong, “Fiscal Policy.”

37. Wright, “The Political Economy of New Deal Spending: An Econometric Analysis,” *Review of Economics and Statistics* 56, no. 1 (1974): 30–8.

38. Anderson and Tollison, “Congressional Influence and Patterns of New Deal Spending, 1933–1939,” *Journal of Law and Economics* 34, no. 1 (1991): 175.

rather than increasing aggregate demand through the funding of timely public investment projects.³⁹ It also finds that ill-defined allocation mechanisms and poorly aligned political incentives confounded proper stimulus targeting. As George Stigler suggests, federal spending on states appears, as a rule of thumb, to be influenced more by political clout than by “need” or correct fiscal policy.⁴⁰

John B. Taylor notes that the pessimism regarding the countercyclical fiscal policy experience of the 1970s and 1980s—crystallized by Lucas and Sargent’s 1979 “rational expectations” argument and Lucas’s 1983 critique that the effects of future policy changes cannot be anticipated by merely observing and projecting historical data interactions—was pushed aside in debates over stimulus packages in the first few years of the 21st century.⁴¹ Matthew D. Shapiro and Joel Slemrod analyze the 2001 and 2008 countercyclical tax rebates and suggest that, even if they were well timed, most recipients simply saved their rebate checks.⁴² Furthermore, Taylor finds that only a small portion of the 2009 ARRA spending stimulus went to direct purchases of goods and services.⁴³ Much of it went to temporary transfers and tax credits that were largely saved rather than spent, consistent with Milton Friedman’s “permanent-income hypothesis,”⁴⁴ which challenged the long-standing Keynesian consensus that households adjust current consumption expenditures based on current income and replaced it with the observation that households’ annual consumption decisions were a function of their permanent incomes.

Another large portion of the ARRA stimulus funds went toward state and local government grants, which are often motivated more by politics than by prudent economic targeting of distressed industries. A preliminary survey of the firms that received ARRA funding suggests that spending was not nearly as targeted toward high-value “shovel-ready” projects as policymakers had hoped.⁴⁵

39. Edward D. Gramlich, “State and Local Budgets the Day after It Rained: Why Is the Surplus So High?,” *Brookings Papers on Economic Activity* 9, no. 1 (1978): 191–216.

40. Stigler, “The Size of Legislatures,” *Journal of Legal Studies* 5, no. 1 (1976), 17–34.

41. Taylor, “An Empirical Analysis of the Revival of Fiscal Activism in the 2000s,” *Journal of Economic Literature* 49, no. 3 (2011): 686–702; Lucas and Sargent, “Keynesian Macroeconomics”; Robert E. Lucas, “Econometric Policy Evaluation: A Critique,” in *Theory, Policy, and Institutions: Papers from the Carnegie-Rochester Series on Public Policy*, ed. Karl Brunner and Alan Meltzer (Amsterdam: Elsevier Science, 1983), 257–84.

42. Shapiro and Slemrod, “Consumer Response to Tax Rebates,” *American Economic Review* 93, no. 1 (2003): 381–396; Shapiro and Slemrod, “Did the 2008 Tax Rebates Stimulate Spending?,” *American Economic Review* 99, no. 2 (2009): 374–79.

43. Taylor, “Fiscal Activism.”

44. Friedman, *A Theory of the Consumption Function* (Princeton, NJ: Princeton University Press, 1957).

45. Jones and Rothschild, “Did Stimulus Dollars Hire the Unemployed?”

“Recent fiscal stimulus programs have proven tricky to properly target.”

Whether because of the difficulties inherent in targeting stimulus spending, political temptations to reward supporters, or unanticipated behavioral reactions from economic actors, recent fiscal stimulus programs have proven tricky to properly target. For example, the ARRA included several billion dollars for projects related to the smart grid, in the hope of modernizing and making more efficient the nation’s power system. According to journalist and author Michael Grunwald, however, an “unfortunate side effect is that the few [companies] that had actually started doing some smart-grid work, they pretty much stopped, because it was like, hey, now the feds might help pay for it. So it was really bad stimulus.”⁴⁶ Furthermore, the initial stimulus money for the grid went mostly to the installation of smart meters. Again according to Grunwald, “smart meters are good, but their first real impact is that they allow you to lay off all of your meter readers. So that wasn’t really terrific stimulus either.”⁴⁷ Clearly, the ARRA was not well targeted, which may help explain why it has so many detractors.

The degree to which previous stimulus programs have been properly designed, timed, and employed has determined, to a large extent, their ultimate effectiveness.⁴⁸

46. Grunwald, quoted in David Roberts, “Obama’s Stimulus Package Was a Ginormous Clean Energy Bill, Says Michael Grunwald,” *Grist*, August 14, 2012, <http://grist.org/politics/obamas-stimulus-package-was-a-ginormous-clean-energy-bill-says-michael-grunwald>. Still, Grunwald generally views the ARRA as a policy that will have major long-term impacts that will transform the American economy. Grunwald, *The New New Deal: The Hidden Story of Change in the Obama Era* (New York: Simon and Schuster, 2012).

47. Grunwald, quoted in Roberts, “Obama’s Stimulus Package.”

48. Measures of fiscal multipliers—the ratio of the change in GDP to the increase in government spending—can also help determine the extent to which countercyclical fiscal policy measures are stimulative. There is a wide discrepancy in empirical studies of just how large the government spending multiplier is. Although the Obama administration assumed a multiplier value in excess of 1.5 (from Christina D. Romer and Jared Bernstein), Valerie Ramey’s review of fiscal multiplier estimates suggests that this is at the upper end of most estimates, which are generally between 0.5 and 1.5. Of course, a multiplier value below 1 indicates that, on net, government spending crowds out some private-sector spending. Romer and Bernstein, “The Job Impact of the American Recovery and Reinvestment Plan,” White House, Washington, DC (2009); Ramey, “Can Government Purchases Stimulate the Economy?,” *Journal of Economic Literature* 49, no. 3 (2011): 673–85.

Our review of countercyclical fiscal stimulus programs in the United States suggests they have rarely been as timely or targeted as required in theory.

Temporary

Have stimulus programs been temporary, as was the case with the CWA, which lasted only about four months? Politicians face strong temptation to continue stimulus spending past the end of recession: constituents pressure representatives to continue the government spending programs from which they have benefited. The “ratchet effect” theory of government proposed by Robert Higgs predicts that “emergency” increases in state power, like those in response to an economic crisis, tend to not recede but become the new normal.⁴⁹ The size of government continuously grows as policymakers opt to “never let a good crisis go to waste.”⁵⁰ We examine this question in more depth in the following sections.

Benefit-Cost Analyses: Are the Three Ts Enough?

Before we turn to a more in-depth analysis of whether stimulus programs tend to be temporary, the program known as “Cash for Clunkers” provides an interesting recent example of an attempted timely, targeted, and temporary stimulus policy. The program, officially called the “Car Allowance Rebate System” (CARS), was in effect in July and August 2009, just after the recession officially ended. The program was designed to stimulate purchases of new fuel-efficient vehicles and thus help automobile producers, while simultaneously having a positive long-run impact on the environment. Atif Mian and Amir Sufi report that the program did boost sales on such autos during the short period it was in place.⁵¹ However, because consumers’ purchases of fuel-efficient vehicles decreased by roughly the same amount in the 10 months following the program, the net economic effect over a one-year period was basically zero. From the perspective of “timely,” it might generally be argued that moving purchases ahead to a period when they are going to have the largest countercyclical impact is a worthy achievement, even if a program

49. Higgs, *Crisis and Leviathan* (New York: Oxford University Press, 1987).

50. As Obama’s former chief of staff Rahm Emanuel famously said, “You never want a serious crisis to go to waste.” Gerald F. Seib, “In Crisis, Opportunity for Obama,” *Wall Street Journal*, November 21, 2008, <http://online.wsj.com/article/SB122721278056345271.html>.

51. Mian and Sufi, “The Effects of Fiscal Stimulus: Evidence from the 2009 Cash for Clunkers Program,” *Quarterly Journal of Economics* 127, no. 3 (2012): 1107–42.

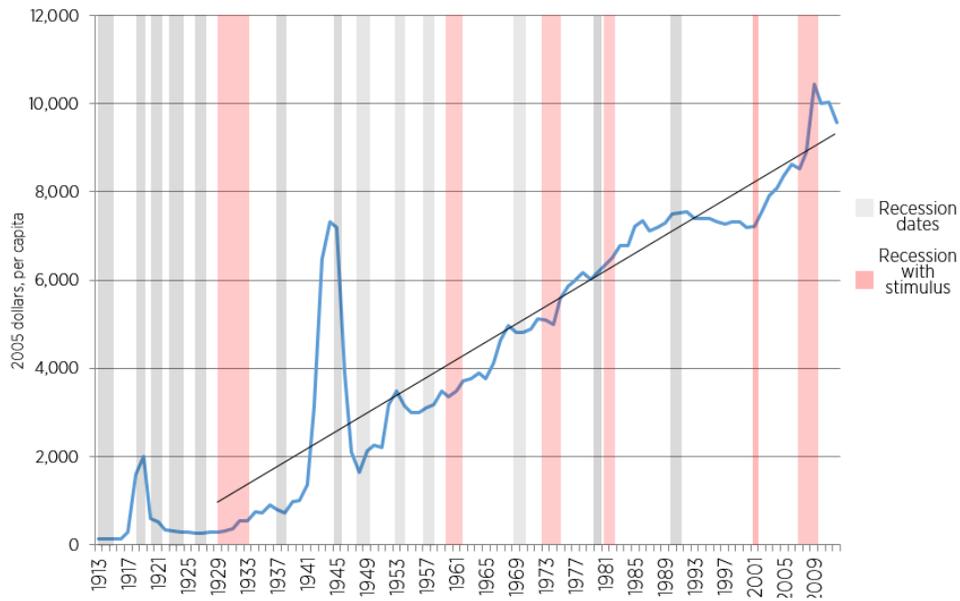
is simply creating intertemporal spending movements. This program clearly targeted the automobile industry, which was hit hard by the global downturn. To its credit, the program was also extremely temporary, lasting only a few weeks. Still, most economic studies of CARS concluded that the policy's overall costs far outweighed its benefits. The government gave taxpayer-financed checks to citizens who destroyed their "clunkers," but Burton A. Abrams and George R. Parsons note that this was not simply a zero-sum transfer because the receiver of the funds had to destroy property that had some economic value to him or her.⁵² The authors estimated that the net cost to society of \$2,600 per destroyed car far exceeded the value of the long-run environmental gains, which they estimated at about \$600 per car. Thus, even if a stimulus policy does meet the criterion of the three Ts, it may still fail on a traditional benefit-cost analysis.

V. OVERVIEW OF GOVERNMENT SPENDING OVER THE PAST CENTURY: CRISES, STIMULI, AND RATCHETS

Figure 1 illustrates real federal spending per capita (RFSPC) in the United States over the past century. Figure 2 shows federal spending as a percentage of GDP. We prefer RFSPC because spending as a percentage of GDP can rise or fall owing to movements in GDP, whereas RFSPC movements are purely about government spending—while controlling for changes in population and inflation. In the two figures, shaded areas represent recession years—red for recessions in which countercyclical policies were enacted, gray for recessions in which no countercyclical policies occurred—and a trend line (beginning in 1929, considered the birth of Keynesian-style policies) is included in the RFSPC graph. Wartimes are, not surprisingly, clear outliers from trend as spending jumps dramatically. Another clear outlier is the 1990s, when both measures fell. In the aftermath of the recessions of 2001 and 2007–2009, spending has surged and returned to its long-run trend. When federal spending is measured as a share of GDP, a sharper divergence is present. Between 1930 and 1983, federal spending as a percentage of GDP grew steadily from under 5 percent to about 24 percent of GDP. Then government spending as a percentage of GDP began a precipitous fall to under 18 percent in the late 1990s before stabilizing at about 20 percent in the first few years of the 21st century. Between 2008 and 2011, this measure rose to a peacetime high, exceeding 25 percent.

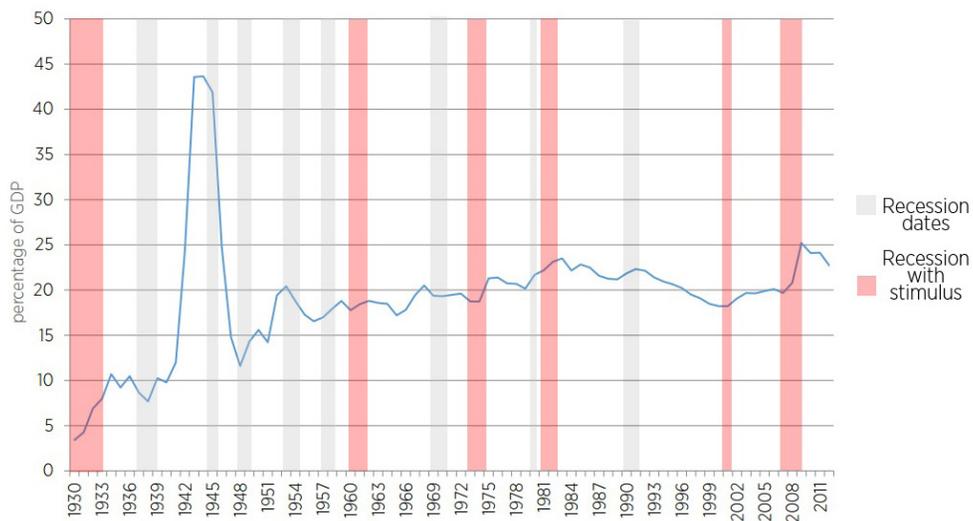
52. Abrams and Parsons, "Is CARS a Clunker?," *Economists' Voice* 6 (August 2009): 1–4.

FIGURE 1. US REAL FEDERAL SPENDING PER CAPITA, 1913–2012



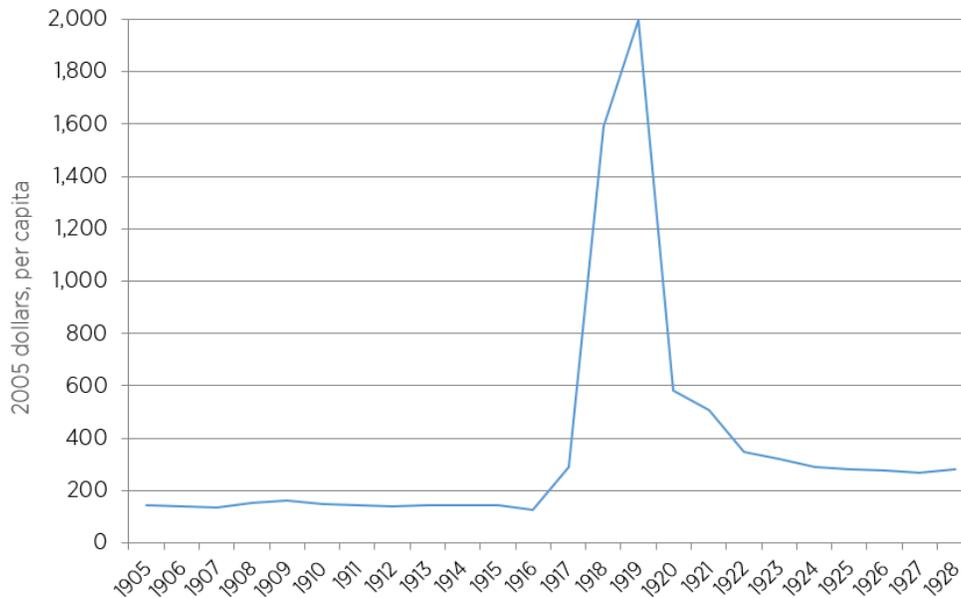
Source: *Historical Tables*, Office of Management and Budget. Produced by Jason Taylor and Andrea Castillo for the Mercatus Center at George Mason University, July 21, 2014.

FIGURE 2. US SPENDING AS A PERCENTAGE OF GDP, 1930–2012



Source: *Historical Tables*, Office of Management and Budget. Produced by Jason Taylor and Andrea Castillo for the Mercatus Center at George Mason University, July 21, 2014.

FIGURE 3. US REAL FEDERAL OUTLAYS PER CAPITA, 1905–1928



Source: *Historical Tables*, Office of Management and Budget. Produced by Jason Taylor and Andrea Castillo for the Mercatus Center at George Mason University, July 21, 2014.

In *Crisis and Leviathan*, Higgs suggests that during times of crisis the size and scope of government expands and, more importantly, that once the crisis ends, government does not contract back to its prior level.⁵³ Instead, there is a permanent ratcheting up of government. In other words, even if government actions during times of stress are targeted and timely, they are unlikely to be temporary because a legacy of enhanced government size or scope remains.⁵⁴ Sometimes these “ratchets” occur due to military crises. During World War I, for example, the top marginal income tax rate jumped from 7 to 77 percent. By 1925, the rate had fallen to 25 percent, but this was still three and a half times higher than its prewar level. RFSPC was \$143 in 1914 but rose dramatically during the war, to \$1,998 in 1919. Again spending fell after the war, but it never approached the prewar level. By 1925, RFSPC was \$282, about twice its level from a decade earlier. Figure 3 illustrates this spending ratchet.

53. Higgs, *Crisis and Leviathan*.

54. Long-term entitlement spending on programs like Social Security and Medicare has increasingly consumed a larger portion of the federal budget. Federal spending on these programs increases automatically and limits budgetary resources available for stimulatory attempts.

Perhaps just as importantly as the clear increases in government spending, the temporary measures instituted during the wartime emergency also led to a permanent ideological shift regarding the role of government. During the war, the government had taken control of the economy to an unprecedented extent—and the war was won. This led many economists at the time, such as Stuart Chase and Rexford Tugwell—both of whom would become key advisors to the Franklin D. Roosevelt administration—to believe that the government should engage in more planning of the economy during peacetime.⁵⁵

More relevant to the thesis of this paper, Higgisian ratchets in government size and scope can occur in the face of economic downturns via the stimuli designed to counteract those downturns. The Great Depression of the 1930s brought forth many economic stimulus measures, particularly under the Roosevelt administration, as the president was effectively given wartime powers to combat the downturn. Many of Roosevelt’s New Deal agencies employed the federal government in expanded capacities that were unprecedented in peacetime. Agencies such as the aforementioned FERA and PWA provided grants and loans to states toward relief work projects such as the construction of public goods. In 1935, FERA was disbanded, but its function was essentially replaced by the Works Progress Administration. While these and other “relief” agencies were designed to provide temporary assistance during an economic crisis, they were the opening salvo in the longer-term trend of having the government act as a source of income or employment for Americans.

An important institutional legacy of the 1930s is the Fair Labor Standards Act (FLSA), which today sets minimum wages and maximum hours. Roosevelt believed that higher hourly wage rates for workers would increase purchasing power and stimulate aggregate demand⁵⁶ and hence end the depression. Roosevelt also pushed for shorter maximum workweeks because of his belief in “work-sharing”—the notion that employment should be spread among more people working 35 or 40 hours per week rather than fewer working 45 or 50 hours, as was the typical workweek before the 1930s.⁵⁷ In June 1938, the FLSA

55. Chase, *The Tragedy of Waste* (New York: Macmillan, 1925); Chase, *A New Deal* (New York: Macmillan, 1932); Tugwell, *Industry’s Coming of Age* (New York: Columbia University Press, 1927); Tugwell, *The Industrial Discipline and the Governmental Arts* (New York: Columbia University Press, 1933).

56. Jason E. Taylor and George Selgin, “By Our Bootstraps: Origins and Effects of the High-Wage Doctrine and the Minimum Wage,” *Journal of Labor Research* 20, no. 4 (1999): 447–61.

57. Jason E. Taylor, “Work-Sharing during the Great Depression: Did the ‘President’s Reemployment Agreement’ Promote Reemployment?,” *Economica* 78, no. 1 (2011): 133–58; Todd C. Neumann, Jason E. Taylor, and Price Fishback, “Comparisons of Weekly Hours over the Past Century and the Importance of Work-Sharing Policies in the 1930s,” *American Economic Review Papers and Proceedings* 103 (May 2013): 105–10.

was passed and it began to phase in the 40-hour workweek (with a mandate to pay time and a half for hours over this amount) and a 40-cent-per-hour minimum wage—an amount that has been raised periodically over time and now stands at \$7.25 per hour, although many states have higher minimum wage levels.

The stimulus attempts during the Great Depression created several other emergency agencies and laws that have affected the long-term economic landscape. The Agricultural Adjustment Act (AAA) was passed in May 1933 to boost farm prices by curtailing supply. Although the AAA of 1933 was ruled unconstitutional in 1936, an amended AAA was passed in 1938 and still indirectly affects agricultural prices today. The Tennessee Valley Authority (TVA) was created in May 1933 to help provide flood control, electricity generation, and economic development to the Tennessee Valley. Today, the TVA provides electricity for nine million Americans through a mix of coal, hydroelectric, and nuclear power plants, as well as some alternative energy facilities. The Social Security Administration was created in 1935 to provide a source of income to the elderly, disabled, widowed, and unemployed, as well as to women with children whose fathers were not providing support. Most of the protections created under this act are still around today. Major parts of today's financial system, such as the Securities Exchange Commission and the Federal Deposit Insurance Corporation, were also created in the depths of the Great Depression.

Some of the above agencies and laws were, of course, designed to be long-run reform measures rather than temporary emergency stopgaps. Indeed, government program planners and administrators often designed programs with the intent of expanding their budgets or authority over time, as Jeffrey Miron and David Weil report was the case with Social Security.⁵⁸ In many cases, the emergency conditions were used as a rationale to pass a law long supported by progressives. As Roosevelt advisor Stuart Chase—the man who coined the phrase “New Deal”—said, “Why should the Russians have all the fun remaking a world?”⁵⁹ In any case, the measures employed to try to stimulate the moribund economy of the 1930s clearly resulted in a permanent ratcheting up in the size and scope of government. Real federal spending per capita rose from \$293 in 1929 to \$903 in 1936—a 208 percent increase in just seven years. In 1940, the year before the bombing of Pearl Harbor brought the United States directly into the Second World War, real federal spending per capita was up to

58. Miron and Weil, “The Genesis and Evolution of Social Security” (NBER Working Paper No. 5949, National Bureau of Economic Research, Cambridge, MA, March 1997).

59. Quoted from Amity Shlaes, *The Forgotten Man: A New History of the Great Depression* (New York: Harper-Collins, 2007), 126.

\$1,000, a number that would then rise dramatically and never return to anything approaching the pre-Depression level.⁶⁰

It has often been said that World War II was the largest Keynesian-style stimulus in history. Indeed, unemployment vanished after the government conscripted 12 million into the military and ran unprecedented deficits. In 1944, RFSPC peaked at \$7,321, a number that would not be seen again until 1986, and government spending as a percentage of GDP reached its all-time high of 43.6 percent.⁶¹ The top marginal income tax rate jumped to 91 percent during World War II and, unlike after the First World War, when tax rates came at least part of the way back to where they had been, the top marginal rate remained at its wartime levels for two decades. Furthermore, while federal spending did fall precipitously between 1945 and 1948,⁶² RFSPC was 65 percent higher in 1948 than in 1940, the year before the United States entered the war. Thus, the war clearly brought a permanent ratchet in the size of the federal government.

It would be interesting to see whether sustained jumps in spending after times of war reflected defense spending, nonmilitary spending, or both. For the era since 1940, we can isolate spending on national defense from federal spending in general. Figure 4 displays real federal defense spending per capita (RFDSPC) from 1940 to 2011, while figure 5 illustrates real federal nondefense spending per capita (RFNDSPC), calculated as RFSPC minus RFDSPC.

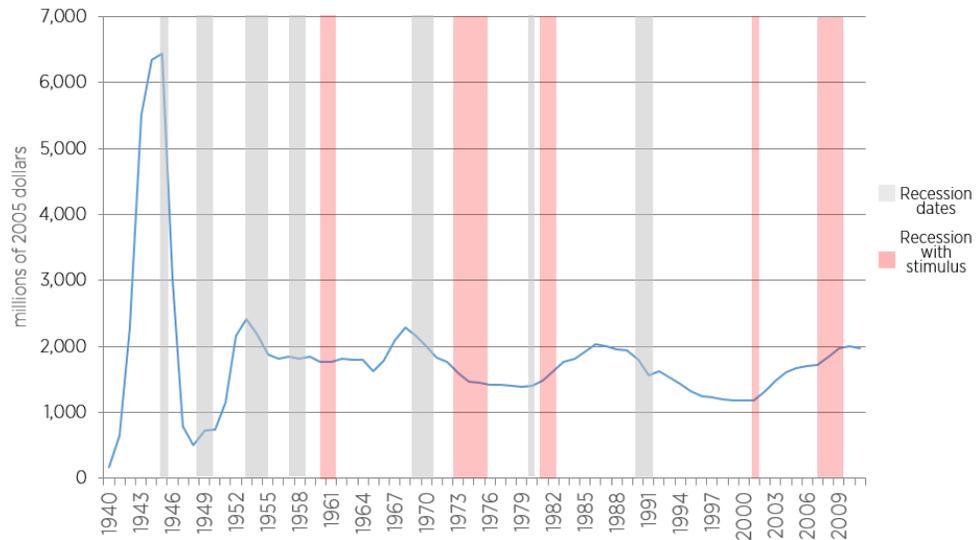
With respect to World War II, nondefense spending barely rose during the war and returned to its prewar level at its end in 1945. Real military spending per capita, however, rose from \$175 in 1940 to about \$6,400 in 1944 and 1945. After the war ended, defense spending fell significantly. Still, it averaged \$685 between 1947 and 1950, nearly four times as high as before the war. Thus, while the 1930 to 1940 ratchet was related to economic stimulus, the ratcheting up of government in the 1940s and 1950s was related entirely to defense. Interestingly, the same is true of the Korean War era (1950–1953). Figure 5 shows that military spending tripled between 1949 and 1953 and that after that war ended, RFDSPC remained well over twice as high as it was prior to the war. Of course, if one views the Korean War simply as an early battle in the long Cold War, this result is not surprising.

60. Office of Management and Budget, “Historical Tables,” accessed July 21, 2014, <http://www.whitehouse.gov/omb/budget/historicals>.

61. *Ibid.*

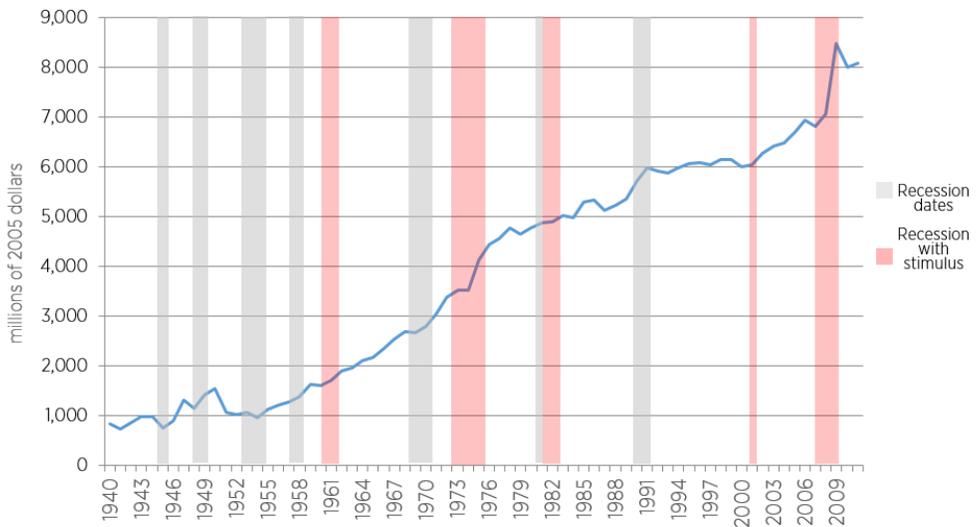
62. Jason E. Taylor and Richard K. Vedder, “Stimulus by Spending Cuts: Lessons from 1946,” *Cato Policy Report* 32, no. 3 (2010).

FIGURE 4. US REAL FEDERAL DEFENSE SPENDING PER CAPITA, 1940–2011



Source: *Historical Tables*, Office of Management and Budget. Produced by Jason Taylor and Andrea Castillo for the Mercatus Center at George Mason University, July 21, 2014.

FIGURE 5. US REAL FEDERAL NONDEFENSE SPENDING PER CAPITA, 1940–2011



Source: *Historical Tables*, Office of Management and Budget. Produced by Jason Taylor and Andrea Castillo for the Mercatus Center at George Mason University, July 21, 2014.

In light of our discussion of the three Ts and stimulus spending, it is important to note that Keynesian-style countercyclical policy was not attempted during the 1950s under President Eisenhower even though the economy experienced two recessions. Richard Vedder and Lowell Gallaway note that while Democrats attacked Eisenhower's "Hoover-like approach" to the recessions of 1953–1954 and 1958, the economy recovered without any fiscal or monetary stimulus.⁶³

In total, real federal spending per capita grew by an average of 2.31 percent in the two decades after the Korean War (1954–1974). One may suspect that much of this rapid growth was due to higher military spending related to the Cold War. However, figure 4 shows that defense spending per capita was remarkably stable across this period, with the exception of a spike in the late 1960s at the peak of the nation's involvement in Vietnam. Between 1954 and 1964, RFDSPC sat near \$1,800. It then jumped during the Vietnam War to a peak of nearly \$2,300 in 1968 before falling, and by 1974 RFDSPC was \$1,470, about 18 percent lower than its 1954 level. Real nondefense spending per capita, on the other hand, grew very steadily by an average of 6.7 percent per year in response to the New Frontier and Great Society programs of presidents Kennedy and Johnson, as well as President Nixon's domestic spending programs. As a whole, the growth in government across these 20 years appears to have been far more related to butter than to Cold War–induced guns.

In terms of economic stimulus, soon after taking office, Kennedy put forth several measures aimed at ending the recession of 1960–1961. He called these measures "The Program to Restore Momentum to the American Economy."⁶⁴ Among them were increases in Social Security payments and nearly \$5 billion of new outlays related to the Housing Act of 1961, which included money toward new housing construction, urban renewal, and public transportation, and a temporary extension of unemployment benefits.⁶⁵ The stimulus also included about \$400 million in new funding to the Area Redevelopment Act, which had the goal of stimulating urban and rural areas with persistently high unemployment. Indeed, RFNDSPC rose by 6.3 and 10.4 percentage points in 1961 and 1962, respectively. While the economy recovered and grew smartly between

63. Vedder and Gallaway, *Out of Work: Unemployment and Government in Twentieth-Century America* (New York: Holmes and Meier, 1993), 189.

64. John F. Kennedy, "Message to the Congress Presenting the President's First Economic Report," January 22, 1962, available through the American Presidency Project at <http://www.presidency.ucsb.edu/ws/?pid=8621>.

65. "Legislative Summary: Housing," John F. Kennedy Presidential Library and Museum, accessed October 16, 2014, <http://www.jfklibrary.org/Research/Research-Aids/Ready-Reference/Legislative-Summary-Main-Page/Housing.aspx>.

1963 and 1968—aided by the Kennedy tax cuts of 1964 that lowered marginal income tax rates across the board in hopes of stimulating long-run growth via the supply side—RFNDSPC spending grew by an average of 6 percent per year. While growth in nondefense spending may have been justified by Keynesian theory in the early 1960s, when such stimulus could help bring the economy back to full employment, the spending momentum did not slow at all during the mid- to late 1960s even though unemployment rates were unprecedentedly low—below 4 percent for most of this time. The increase in spending helped push inflation, which had been about 1 percent in the early to mid-1960s, to 5.5 percent by the end of the decade—and the rate of inflation would continue to climb in the 1970s.⁶⁶ Of course, such an outcome is a danger of a stimulus policy that is poorly timed, nontemporary, or both.

The next major Keynesian-style stimulus program occurred in 1975, a year that saw the largest peacetime growth in real per capita government spending since the Great Depression with an 11.95 percent surge.⁶⁷ Broken down into its component parts, nondefense spending rose an astounding 17.4 percent, while defense spending actually fell 1.1 percent. The growth in nondefense spending per capita in 1975 was relatively similar to 2009, when the measure rose 20.1 percent. With this in mind, the years following 1975 might provide useful insight into what we might expect to happen to spending in the years following the Great Recession—era stimuli.

The unemployment rate, which was 5 percent in the spring of 1974, jumped to over 7 percent by the end of that year and peaked at 9 percent in May 1975. The economy was experiencing what was at that time the sharpest recession of the postwar era. President Ford proposed a Keynesian-style stimulus measure in late March 1975, the month that the recession officially ended. In response, Congress passed the Tax Reduction Act of 1975, which gave individuals a 10 percent tax refund on their 1974 payments (up to \$200) as well as a \$30 per person tax credit. Social Security recipients also received a one-time \$50 check. In the end, about \$8.1 billion went out in lump-sum payments to individuals—note that while they are called tax refunds, as was the case with President George W. Bush’s stimuli in 2001 and 2008, they were accomplished with government checks going to individuals, and hence are reflected in the data as government spending. In 1975, the government also reduced withholding taxes by another \$8.1 billion and firms received tax credits of \$5.1 billion in the hope

66. See table 24 of the Bureau of Labor Statistics, “CPI Detailed Report, August 2014,” <http://www.bls.gov/cpi/cpid1408.pdf>.

67. The year 1967 saw total per capita spending rise 12.3 percent, driven largely by the 17.9 percent jump in defense spending in relation to the Vietnam War.

of boosting business investment spending.⁶⁸ In total, the Tax Reduction Act of 1975 provided \$21.3 billion in stimulus measures, or the equivalent of about \$93.6 billion in 2014 dollars.⁶⁹

Because much of this stimulus was financed with tax credits or refunds, one would expect these events to have less of a long-term impact on government spending. In fact, although the economy grew between 1976 and 1981, RFNDSPC did not retreat back to its 1974 pre-stimulus levels, but instead continued to rise rapidly by 3.4 percent per year.⁷⁰ Aiding the rise, in May 1977 the Carter administration passed the \$20.1 billion (\$78.4 billion in 2014 dollars) Economic Stimulus Appropriations Act of 1977, which targeted government employment programs. Much of the act's funding was used to dramatically expand the Nixon-era Comprehensive Employment and Training Act (CETA), which, like the 1930s New Deal programs, put unemployed Americans to work directly in "public service" jobs, such jobs working in libraries and senior citizen centers. By 1978, the peak enrollment of the act's existence, 725,000 Americans were enrolled in the programs.⁷¹ Notably, because this occurred three years after the recession of 1973–1975 ended, it was clearly not well timed in the Keynesian sense—while unemployment had peaked at 9 percent in May 1975, it hovered around 6 percent throughout 1978. A 1982 CBO report analyzing the CETA shows that the programs' spending remained high even after the recession ended in 1975, growing from \$2.9 billion in 1975 to \$9.5 billion in 1978. Spending on the program dropped off slightly to \$7.7 billion by 1981, but it remained well above where it had been before the 1973–1975 recession, with \$4.4 billion in outlays by 1982.⁷²

By 1980, RFNDSPC had surged to \$4,776, almost 36 percent higher than its 1974 level. Federal spending as a percentage of GDP rose from 18.7 percent to 21.7 percent between these years. Figure 5 visually documents a clear "ratchet," as suggested by Higgs,⁷³ whereby spending rises dramatically during a time of crisis—in this case a recession—and then continues to grow at a

68. Note that tax cuts would not show up in RFSPC, thus reducing its power as an indicator of stimulus efforts.

69. "Summary of Tax Reduction Act of 1975, H.R. 2166, as Passed by the House," *Joint Committee on Taxation*, March 4, 1975, <https://www.jct.gov/publications.html?func=startdown&id=4152>.

70. Office of Management and Budget, "Historical Tables," accessed July 21, 2014, <http://www.whitehouse.gov/omb/budget/historicals>.

71. Walter Shapiro, "CETA: A '70s Government Jobs Program That Didn't Work," *Politics Daily*, November 19, 2009, <http://www.politicsdaily.com/2009/11/19/ceta-a-70s-federal-jobs-program-that-didn-t-work>.

72. Congressional Budget Office and National Commission on Employment Policy, "CETA Training Programs—Do They Work for Adults?" (1982), <http://cbo.gov/sites/default/files/doc25-entire.pdf>.

73. Higgs, *Crisis and Leviathan*.

“The recession of 2001, and perhaps more importantly, the terrorist attacks of September 11, 2001, brought another paradigm shift in the nation’s budget.”

rate similar to its pre-crisis trend, but now from the new, higher, level.

RFSPC growth slowed, but RFSPC still grew 2 percent per year during the 1980s (1.8 percent average growth in RFNDSPC and 2.5 percent growth in RFDSPC). Then between 1990 and 2000, the nation’s budget experienced a remarkable turn of events. Real federal spending per capita *fell* by an average of 0.43 percent per year. This decline was driven by decreases in federal defense spending: RFDSPC fell by an average of 4.1 percent per year, while RFNDSPC rose by an average of only 0.5 percent per year. The United States ran four consecutive years of budget surplus and President Clinton’s Secretary of the Treasury Robert Rubin argued that surpluses provided stimulus to the economy in the long run by lowering interest rates and promoting investment. Keynesian economics, which argued that deficits—not surpluses—stimulated the economy, seemed to be a dead letter. It is notable that, unlike previous periods, the 1980s and 1990s enjoyed an unusual lack of major financial crises or recessions that would normally tempt policymakers into spending more money on fiscal stimulus. Aside from a moderate downturn in 1990–1991, the economy saw continuous growth from 1982 to 2001.

The recession of 2001, and perhaps more importantly, the terrorist attacks of September 11, 2001, brought another paradigm shift in the nation’s budget. Under President George W. Bush, RFSPC jumped from \$7,200 in 2001 to \$8,897 in 2008—an average annual growth of 3.1 percent compared with an average growth in real GDP of only 1.8 percent. This increase was driven by increases in both defense and nondefense spending. During this period, RFDSPC increased by 56 percent from \$1,179 in 2001 to \$1,838 in 2008, an average of 6.5 percent growth per year. Real nondefense spending per capita increased by 17 percent from \$6,030 in 2001 to \$7,059 in 2008, an average of 2.3 percent growth a year. While Bush employed some modest targeted Keynesian-style fiscal stimulus policies in 2001—sending out tax rebate checks of up to \$300 per taxpayer—much of the increase in the federal government’s

size was related to the “War on Terror” and long-term domestic programs (e.g., No Child Left Behind, Medicare Part D) rather than short-run stimulus.⁷⁴

The financial crisis and recession of 2007–2009 brought extreme fiscal stimulus measures by both Bush and Obama. The Bush administration’s Economic Stimulus Act of 2008 injected \$152 billion into the economy, the majority of which came through tax rebate checks of up to \$600 per taxpayer (\$1,200 for married couples, even if one spouse was not working) and \$300 per dependent child. In the wake of the financial crisis, Congress passed the Economic Stabilization Act and Troubled Asset Relief Program in 2008, an unprecedented expansion of government scope that allocated \$700 billion to the Treasury Department to inject capital into floundering banks and financial institutions. Of course, this amount pales in comparison to the estimated \$16 trillion that the Federal Reserve Board allocated through loans and asset purchases to banks throughout 2008 and 2009, as reported by the Government Accountability Office in 2011.⁷⁵

Then in 2009, the American Recovery and Reinvestment Act (ARRA) created an \$831 billion stimulus through a combination of tax rebate checks, infrastructure spending, and decreased spending in categories such as health, renewable energy, and education. The Tax Relief, Unemployment Insurance Reauthorization, and Job Creation Act of 2010 obligated another \$916.8 billion in stimulus by prolonging the Bush tax cuts, cutting payroll taxes, and extending unemployment coverage. The Middle Class Tax Relief and Job Creation Act of 2012 later extended the payroll tax cut provisions at a cost of \$167.6 billion. All told, the major and minor stimulus legislation from 2008 to 2012 amounted to over \$2 trillion in new federal spending and tax cuts.⁷⁶

74. Furthermore, growth rates in discretionary spending, as Veronique de Rugy points out, kept pace with mandatory outlays—such as those attributable to an aging population—throughout the Bush administration, as the raw data on federal defense and nondefense spending suggest. De Rugy expounds on how nondefense spending rates kept pace with defense spending rates. While some of the nondefense spending included expenditures on homeland defense spending, large expansions in spending by the Department of Education and the Department of Health and Human Services contributed significantly to the increase in nondefense spending. Thus, spending surges prompted by national emergencies and demographic changes were clearly not the only causes of the substantial increase in federal spending in other areas during the Bush administration. De Rugy, “Spending Under President George W. Bush” (Working Paper No. 09-04, Mercatus Center at George Mason University, Arlington, VA, March 2009).

75. Government Accountability Office, “Federal Reserve System: Opportunities Exist to Strengthen Policies and Processes for Managing Emergency Assistance,” Report to Congressional Addressees, GAO-11-696, July 2011.

76. Calculations from Thomas Friey, “\$800 Billion Stimulus? I Wish,” *Cato at Liberty*, August 5, 2012, <http://www.cato.org/blog/800-billion-stimulus-i-wish>.

In 2009, RFSPC rose 17.33 percent, from \$8,897 to \$10,439. As a percentage of GDP, in 2010 government spending reached its highest level since World War II, hitting 25.2 percent. Like the surge in spending after 1975, the increase in federal spending in the wake of the 2008 financial crisis was almost entirely driven by nondefense spending, which grew just over 20 percent in 2009. Interestingly, as a percentage of GDP, government spending was higher in 2010 than it was during World War I, when the nation became a largely command economy.

Real government spending per capita has fallen—particularly since the Budget Control Act of 2011, better known as “the sequester,” which mandated small across-the-board cuts to growth rates in nominal discretionary spending beginning in March 2013—but it still remains significantly above its pre-crisis level. Only time will tell whether the surge in federal spending that accompanied the Great Recession stimulus measures will be temporary, or whether it will prompt a long-term upward shift in government spending, as was the case with the post-1975 domestic spending schemes. If history is any guide, unless there is a major change in the way Washington operates, federal spending will not return to its precrisis levels.

VI. CONCLUSION

The underlying assumption of Keynesian-style stimulus policies is that they will be “timely, targeted, and temporary”—a phrase used by both Obama and one of his key economic advisors, Lawrence Summers. In practice, this model has proved much harder to achieve than the textbook theory suggests. By the time policymakers recognize a problem, settle the debate on what to do about it, pass legislation, and implement it, often the crisis has ended. Furthermore, knowing what sectors of the economy should be targeted with stimulus in order to ensure the maximum positive impact for society presents another obstacle that is nearly impossible to overcome. Finally, there is the issue of “temporary.” Once government spending ramps up to new levels, or the scope of government expands into new territory, history suggests that a retreat back to the prior status quo is unlikely.

The Civil Works Administration of 1933 provides a stark exception to the rule. The CWA, which was specifically created to help provide relief jobs during the harsh winter months, went from thought to action in about three weeks, spent \$15.4 billion in 2014 dollars over a period of 136 days, put more than six million Americans on the payroll at various points in its short life, and then was terminated when spring arrived. The CWA was not without its critics, but one

must admire the way the agency performed with respect to the three Ts. Recent experience from the Great Recession of 2007–2009 shows that a policy as timely and well-targeted as the CWA is difficult to achieve. Perhaps most importantly, our analysis of expansions of government size and scope shows that the CWA’s speedy and complete exit is highly unusual—although there are modern examples such as 2009’s “Cash for Clunkers” program. As Milton Friedman famously said, “Nothing is so permanent as a temporary government program.”⁷⁷

We have examined real federal spending per capita, decomposed into real federal defense spending per capita and real federal nondefense spending per capita, as well as federal spending as a percentage of GDP over the past century, and it is clear from this analysis that what goes up rarely comes back down. Episodes such as the two world wars, the Great Depression, the Korean War, and the recession of 1973–1975, among others, saw sharp increases in RFSPC, which persisted well after the crisis because spending either never came down or came down by only a fraction of the extent it went up. Significant changes in defense spending explain the long-term ratcheting up in RFSPC following the Korean War and the gentle decrease in RFSPC during the halcyon days of the 1990s. Sometimes, increases in RFSPC are due to increases in both defense and nondefense spending, as was the case with spending patterns during the George W. Bush administration from 2001–2008. Other times, surges in RFSPC come entirely from surges in nondefense spending, as with the post-1975 Ford and Carter administrations’ domestic spending schemes and the post-2008 financial crisis rescue and recovery plans.

Expansions in government scope follow a similar pattern. For example, Franklin D. Roosevelt’s economic attempts to end the Great Depression—that is, the New Deal—created many laws and agencies such as the Agricultural Adjustment Act, legislation on minimum wages and maximum hours, the Tennessee Valley Authority, and Social Security, which are still with us today. Likewise, tax increases that accompanied the First and Second World Wars sharply increased the progressivity of the system. Top marginal rates fell part of the way back after World War I, but remained nearly four times as high as they were before the war. During World War II, top marginal tax rates rose to 91 percent and they did not fall from this level until 20 years after the war’s end.

By measure after measure, it is clear that the Keynesian idea that expansions of government size and scope during times of crisis are timely, targeted,

77. “Milton Friedman in His Own Words,” Becker Friedman Institute for Research in Economics at the University of Chicago, accessed July 21, 2014, <https://bfi.uchicago.edu/post/milton-friedman-his-own-words>.

and temporary is operating under a false premise. Were stimulus policies able to achieve these three Ts, the economics profession would be far more unified behind the idea of using Keynesian fiscal measures. Our analysis helps explain Elmendorf and Furman’s finding that economists have grown increasingly skeptical of countercyclical fiscal policy since the late 1970s.⁷⁸ With respect to the goals of timely and targeted, the stimulus measures designed to combat the 2007–2009 financial crisis are today viewed either in the light of “we could have done better” or outright failure—depending on the politics of the individual holding the views. Only time will tell whether the large surge in government size and scope that the United States has experienced over the past few years will result in a permanently larger size and scope of government. History strongly suggests that this will be the case.

78. Elmendorf and Furman, “If, When, How.”

ABOUT THE AUTHORS

Jason E. Taylor received his PhD from the University of Georgia in 1998. He has taught at the University of Virginia and Central Michigan University. In addition to winning multiple university-wide teaching awards, Taylor is an authority on 20th century American economic history, particularly the Great Depression and World War II. He has published in journals such as the *Journal of Law and Economics*, *Public Choice*, *Economica*, the *Journal of Institutional and Theoretical Economics*, *American Economic Review Papers and Proceedings*, *Explorations in Economic History*, the *Southern Economic Journal*, the *Journal of Economic History*, and the *Journal of Industrial Economics*.

Andrea Castillo is the program manager of the Technology Policy Program for the Mercatus Center at George Mason University and is pursuing a PhD in economics at George Mason University. She is a coauthor of *Liberalism and Cronyism: Two Rival Political and Economic Systems* with Randall G. Holcombe and *Bitcoin: A Primer for Policymakers* with Jerry Brito. Castillo received her BS in economics and political science from Florida State University.

ABOUT THE MERCATUS CENTER AT GEORGE MASON UNIVERSITY

The Mercatus Center at George Mason University is the world's premier university source for market-oriented ideas—bridging the gap between academic ideas and real-world problems.

A university-based research center, Mercatus advances knowledge about how markets work to improve people's lives by training graduate students, conducting research, and applying economics to offer solutions to society's most pressing problems.

Our mission is to generate knowledge and understanding of the institutions that affect the freedom to prosper and to find sustainable solutions that overcome the barriers preventing individuals from living free, prosperous, and peaceful lives.

Founded in 1980, the Mercatus Center is located on George Mason University's Arlington campus.