A Pictorial History of the U.S. Federal Debt Limit

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The 800th anniversary of the Magna Carta is as good a time as any to think about Constitutions. One way to describe a constitution is that it expresses society’s agreement about who decides what when. The histories of the Magna Carta and of the U.S. Constitution illustrate that though we pretend that Constitutions are immutable rules constraining the governors, in truth Constitutions evolve in response to changes in technologies and peoples’ beliefs about what things are possible and valuable.

A feature of constitutions that especially interests us as economists is their role as timing protocols that protect property and liberties by permanently limiting government authority. Late 20th century macroeconomists focused on the benefits of once-and-for-all timings that tie the hands of government agents in ways that prohibit them from succumbing to tempted opportunistic behaviors. The struggle between “commitment” and “discretion” is at the center of the modern macroeconomic literature on “time consistency”; it is also everywhere in the financial and macroeconomic history of the U.S.

Our contribution to this conference highlights just one narrow set of issues illustrating some related institutional design issues: how the U.S. Congress and its creation, the Department of the Treasury, have shared authority for designing government bonds and limiting the amount that the Federal government has borrowed from its own citizens and foreigners. Our story is about retention of control and delegation of authority.

In recent years, members of the U.S. Congress have engaged in high visibility debates about whether and when to raise the limit that it imposes on the Federal Government’s borrowing. Some sophisticated observers have regarded these debates as a side show:

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In my brief time in Washington, I’ve found the worst myth to be the belief that the debt ceiling imposes any control on government spending. The plain truth is that the debt limit does not affect the deficits or surpluses;

Assistant Secretary for Financial Markets, U.S. Treasury, Brian C. Roseboro, June 26, 2003¹

We study the extent to which Secretary Roseboro’s portrayal is accurate today, and if so, whether it has always been so.

As a component of a broader study of the fiscal history of the United States, we have constructed a record of the limits Congress placed on Federal debt from 1776 until today. We say “constructed” because the Congress began imposing an explicit limit on total debt only in 1939. Before that, Congress placed specific limits on individual or sub-classes of securities, causing us to have to deduce an aggregate debt ceiling implied by these individual limits. With our pre-1939 implicit aggregate debt limit in hand, we contrast its behavior with the post-1939 explicit debt limit. We discuss how and why the meaning of a “debt limit” might have changed over the last 240 years.

Article 1, Section 8 of the U.S. Constitution grants Congress sole authority over Federal debt management: “The Congress shall have Power To lay and collect Taxes, Duties, Imposts and Excises, to pay the Debts . . . of the United States; . . . and . . . To borrow Money on the credit of the United States.” Our story is about how Congress performed some of these duties since 1776 and about which powers the Congress chose to keep to itself and which it chose to delegate to the Treasury.

Between 1776 and 1920 the Congress authorized the Secretary of the Treasury to issue roughly 200 different securities. The Congress itself designed each of these securities; it set the coupon rate, term to maturity, unit of account in which payments were promised, tax exemptions, and call features. In addition, the Congress specified the purpose for which the proceeds of a bond sale could be used, e.g., to finance a war, to redeem and reschedule an outstanding bond issue, to engage in infrastructure projects such as the building of the Panama Canal.

Following the same practice used by the British Parliament, Congress also imposed explicit limits within each authorization. Congress typically specified the quantity that Treasury could issue of each security over a set period of time; thus once a security was issued and redeemed, it could not be re-issued. In some instances, such as during wars, Congress recognized the Treasury’s need to manage its cash by regularly rolling-over short-term debt and thus placed limits on the quantity outstanding of short-term notes. But more often than not, disdain of fiat currency caused

Congress to keep a tight rein on the Treasury’s ability to create short-term money-like assets.

However, during the two decades following World War I, facing the need to finance persistent deficits and prodded by successive Secretaries of the Treasury, the Congress gradually delegated authority to design securities and manage the composition of the debt to the Treasury. By 1939, the Congress had ceded nearly all decisions regarding security design and debt management to the Treasury. The only power retained by the Congress was to limit the aggregate quantity of debt outstanding.

To construct an implied aggregate Federal debt limit prior to 1939, we sum the bond-by-bond limits stated in the authorizing legislation and the quantities of each bond that was issued and retired. We plot our aggregate debt limit series (dotted line), along with the outstanding gross Federal debt (solid line), in the first three of four graphs. In the fourth graph, labelled ‘1939-2014’, we plot the official debt limit and the Federal debt subject to this limit. We use these graphs to guide our answers to the following questions:

1. Has the debt limit usually increased over time?

   Before 1939, no, it declined about as often as it rose. After 1939, yes.

   Prior to 1939, Congress restricted the issuance of most debt offerings within a pre-determined window of time. Hence once the limit was reached or the authorization expired, no more of that security could be issued. Further when the security was redeemed (either by maturing or by being refinanced), it could not be re-issued. Thus as the government paid off its debt after the War of 1812 or the Civil War, the limit declined in tandem with the decline in the outstanding debt.

   During the War of 1812 and the Civil War, Congress granted the Treasury considerable “fiscal space” (i.e., latitude to issue new debt). However, once these existential crises passed, Congress reasserted its control over the size and character of the debt. This was not the case following World War I or World War II.

2. Has the debt limit been an upper bound on total debt to be anticipated over a medium to long horizon under a set of ‘normal’ conditions (i.e., peace with no astronomical calamities)?

   Before 1939, mostly yes. After 1939, evidently no.

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Figure 1: Nominal Federal Debt and the Aggregate Statutory Limit

Nominal debt is the dotted line. The statutory limit is the solid line. Prior to 1939, the limit is constructed by summing individual limits on securities. After 1939, the limit is the official debt ceiling.
3. Has the debt limit been a reliable signal containing information about future values of the fundamentals that characterize Federal fiscal policy, namely, prospective surpluses of federal revenues over expenditures?

Before 1939, usually yes; since 1939, emphatically no, as lamented by Secretary Roseboro in the quotation above.

4. Why did Congress ultimately delegate security design and management of the debt to the Treasury during the 1920s and 30s?

During the 1920s, Congress accepted Secretary of the Treasury Andrew Mellon’s recommended that:

While it is impossible to forecast at this time what form future refunding operations will take, it is obvious that the orderly and economical management of the public debt requires that the Treasury Department should have complete freedom in determining the character of securities to be issued and should not be confronted with any arbitrary limitation which was not intended to apply to these circumstances. Moreover, it is highly desirable that the authority be provided well in advance of actual needs.³

Secretary Mellon reckoned that this ‘complete freedom’ would help the Treasury develop a thick and liquid market in Treasury bonds, notes, and bills.

5. Why had earlier Congresses rejected advice from Mellon’s predecessors to delegate security design authority to the Treasury?

Because earlier Congresses valued continuous tight control over debt design and debt quantities more than they valued any gains in market liquidity. Congresses were often wary of Treasury issuing short-term securities that resembled fiat currency. Also many Congresses evidently intended that the Federal government not to be permanently selling securities.

6. Is the debt limit designed to constrain someone?

Before 1939, evidently yes. In some famous episodes, it tied the hands of the Secretary of Treasury in several ways. In the 1890s, it almost forced the Secretary of Treasury to take the U.S., off the gold standard and onto silver, which as Milton Friedman has discussed, was the purpose of a substantial bloc, perhaps a majority, of the Congress.\textsuperscript{4} After 1939, we don’t know.

7. Has the debt limit been “unambiguous” in terms of units of account?

Over some long periods of time, yes. Over other long periods of time, no, it was ambiguous in terms of gold versus silver or gold and silver versus greenbacks.

8. How is the debt limit measured? Is it “marked to market” or is it in terms of “face value”?

Since Alexander Hamilton started reporting Treasury accounts in 1790, it has been measured in terms of face value. Fluctuating interest rates have driven market values away from face values, occasionally widely. Interest rate fluctuations have reflected both exchange rate risk and on some occasions default risk.

Summing up, the behavior of the U.S. debt limit as an economic time series changed markedly after 1939. This change coincided with the Congress’s devolution of authority for designing and managing U.S. Federal debt to the Secretary of Treasury. Is this pattern a coincidence or was there a common cause that drove both Congress’s arrangement with the Treasury and the content of the debt limit either as a forecast of future debt levels or as a tool to constrain future Congresses or Presidents? We haven’t answered that question yet, but a provocative book by Bill White proposes some answers.\textsuperscript{5}