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In pursuit of a stable stabilization policy in Sweden.
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Abstract: In a historical perspective, the stabilization policy regime in Sweden is in a state of constant change, affected by economic crises, international impulses, domestic politics, and developments in macroeconomic theory. Economists have been deeply involved in this process. The current framework for monetary and fiscal policy, with an independent central bank focusing on inflation targeting, and a rule-based fiscal policy, is not the final stage of this process. Future crises will once again change the goals, the instruments, and the institutional framework. In a historical perspective, the rapid expansion of the financial system, with the accompanying accumulation of private debt and high rates of asset inflation, stands out as a likely cause behind the next crisis. The next crisis will be followed by yet another step in the perennial pursuit of a better stabilization policy.

Key words: Monetary policy, fiscal policy, gold standard, price-level targeting, inflation targeting, financial repression, the Riksbank, Sweden.

JEL codes: E12, E30, E60, G01, H63 and N14

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In pursuit of a stable stabilization policy in Sweden.
From the gold standard to inflation targeting and beyond

1. Introduction¹

Over the last one hundred years, the goals, the instruments and the institutional framework for Swedish stabilization policy, i.e., for monetary and fiscal policy, have gone through dramatic changes. The stabilization policy regime (or the framework for stabilization policy) that is now in place came about as a reaction to the high inflation rates of the 1970s and 1980s and the large budget deficits following the economic crisis in Sweden at the beginning of the 1990s.

Today's stabilization policy regime is best described as a rules-based one, with a distinct separation between the framing of monetary and fiscal policy, respectively. The central bank, the *Riksbank*, acts independently from the government. The objective of monetary policy is price stability. The scope of fiscal policy is restricted by budgetary rules. The *krona* has a floating exchange rate, and the Swedish financial market is well integrated with the international market.

This is a radical shift from the state of things a mere 50 years ago. At that time, the power over the stabilization policy was in the hands of a single decision-maker: the government; in practice, this meant the Ministry of Finance. Budget policy lacked a constraining legal framework, and the exchange rate of the *krona* was fixed. In short, the Riksbank was a branch of the Ministry of Finance. Capital controls shielded the Swedish credit market from international financial impulses. Comprehensive regulations of the domestic financial system were enforced leading to financial repression.

¹ This paper is a translation of Jonung (2017), skillfully carried out by Karl Mcshane. It was originally prepared for a special issue of *Ekonomisk Debatt* on "New thoughts about stabilization policy". Fredrik NG Andersson has updated all the figures for this version. Andreas Bergström, Oskar Grevesmühl and Jesper Hansson have provided constructive comments.

If we go further back in time to the pre-1914 gold standard, the institutional setting has more similarities to the system currently in place. The stabilization policy was then rules-based, and the power over monetary and fiscal policy was separated. The Riksbank's task was to preserve the krona's fixed exchange rate to gold. The Swedish financial markets were closely linked to international markets. Fiscal policy was constrained by a tradition requiring a balanced annual government budget.

What are the forces that over time have created changes in the stabilization policy regime? Will the pendulum swing back from the present regime in the future? This essay seeks to answer these questions. First, an overview of Swedish stabilization policies since the end of the 19th century is presented. Next, this historical panorama is used to provide the background to a discussion on what the future may hold for the current policy framework.

2. 1873–1931. The gold standard

At the beginning of the 1870s, the three Scandinavian countries introduced a common currency, the Scandinavian *krona*, pegged to gold. This step was an adjustment to the international monetary system based on gold that originated from the United Kingdom. Gold was the nominal anchor for monetary policy, whose primary goal became to uphold a fixed exchange rate. The outcome was a stable long-run price level, with cyclical fluctuations of the rate of inflation around zero, up until the First World War (Figure 1).

There was no “active” countercyclical fiscal policy. The principle for the management of the government budget was that each budget should be balanced. In practice, the budget outcome was essentially determined by the business cycle. The public debt hovered around 20 percent as a share of GDP (Figure 2). Public borrowing was reserved for investments in infrastructure that is in the construction of railroads.²

² See Jonung (1984) for an account of the Swedish experience of the classical gold standard.

The first economist in Sweden to question the gold standard was Knut Wicksell (1854-1926), who argued that the aim of monetary policy ought to be a stable price level. The means to achieve this objective was the Riksbank's discount rate. The theory behind this monetary policy rule, known as *Wicksell's norm*, is central to the present policy of inflation targeting adopted by major central banks across the world. Wicksell (1899) was optimistic concerning the future. Once "the men of practice" had understood his theory, the way was open for a "fully stable monetary value."

"The men of practice," however, showed little interest in Wicksell's proposal. The reason for this was simple: his recommendation required a floating exchange rate of the *krona* and, at the time, the *krona* was pegged to gold. Under these circumstances, Wicksell's proposal was utopian.

While ignored by public officials, Wicksell's norm led to a lively debate among Swedish economists. David Davidson (1854-1942) suggested an alternative norm: the price level should decrease in inverse proportion to economic growth. Both Wicksell's and Davidson's norms were later to be adopted by the Riksbank.

At the outbreak of the First World War in 1914, the Riksbank immediately abandoned the *krona's* fixed rate to gold, even though the gold standard was inscribed in the Swedish constitution. During the war, Sweden experienced rapidly increasing inflation, with a peak rate of approximately 40 percent in 1918 (Figure 1).

The monetary policy debate was intensified by the wartime inflation. Economists, led by Knut Wicksell, criticized the Riksbank and demanded a higher interest rate to quell the rapid increase in prices. Wicksell, in pursuit of justice, furthermore fought for a reduction of the general price level, back to the level of 1914, in the belief that this would eliminate the wartime redistribution of wealth and income caused by the high rate of inflation.

After the end of the World War I, politicians and economists, in general, agreed that the *krona* should once again be pegged to gold. The Riksbank decided that the exchange rate ought to be the same as before the start of the war. The return to the gold standard at the pre-war parity for the *krona* contributed to the greatest rate of deflation and the highest unemployment rate seen in modern times in Sweden (Figure 1 and 3). Sweden

went back to gold officially in 1924 as the first country in Europe taking this step. It was soon followed by other European states.

The critique of the deflation policy was harsh, especially from business. The industrialist Ivar Kreuger (1880-1932) eloquently blamed the economists' unrealistic belief in a smooth adjustment process during a period of deflation. The exchange of views during these years led to an increased acceptance of price stability as the main goal of a monetary policy based on a paper standard.

3. 1931–51. Price stabilization

The interwar international gold standard turned out to be short-lived. In September 1931, Great Britain broke the tie between the pound and gold. A week later, Sweden followed suit. At the same time, the Minister of Finance, Felix Hamrin (1875-1937), declared that the objective of Sweden's monetary policy would now be to maintain the domestic purchasing power of the *krona*. The wording came straight from Gustav Cassel (1866-1945), the internationally best known of Swedish economists at the time.

The Riksbank thereby became the first—and is still the only—central bank to declare a stable price level to be its official goal. The declaration meant that Wicksell's norm had been turned into practice. This breakthrough would have been unthinkable had it not been for the animated debate among economists before, during and after the First World War's macroeconomic upheaval.³

The Riksbank quickly set to work. Three economists—Gustav Cassel, David Davidson, and Eli Heckscher (1879-1952)—were immediately brought in to counsel the Bank. Among other things, the economists recommended the Riksbank to produce a consumer price index to help guide the new policy and to hire in-house economic experts. However, this experiment quickly ended, as the Riksbank could not resist its inclination towards a fixed exchange rate. In 1933, the krona was once again pegged, this time to the British pound. However, as long as the English price level remained stable, Swedish

³ See Jonung (1979) for an account of the price level targeting of the Riksbank in the 1930s.

consumer prices were also kept stable. In this sense, the price stabilization policy lived on, but now only through a fixed exchange rate to the pound.

The deep economic depression of the 1930s fostered a debate on the role of fiscal policy. Once again, Sweden became a pioneer of stabilization policy. Earlier, before the crisis had hit Sweden with full force, Bertil Ohlin (1899-1979) argued for a debt-financed expansionary fiscal policy to counter the recession. In 1931, he suggested that the tradition of balanced budgets ought to be abolished, that taxes should be lowered, and public works started to support the Swedish economy in a recession.

After the 1932 election, the Social Democratic Minister of Finance, Ernst Wigforss (1881-1977), announced an expansionary fiscal program, the so-called crisis policy (*krispolitiken*). In an appendix to the 1933 government budget, Gunnar Myrdal (1898-1977) presented a theory of countercyclical fiscal policy that opened up for the use of budget deficits during recessions.

Ohlin was the most prominent of the proponents of expansionary fiscal policy. To him, full employment was the key goal. He also became the first economist to criticize the price level stabilization program as insufficient. According to him, it should be complemented with fiscal measures.

As a reaction to John Maynard Keynes' *General Theory*, published in 1936, Ohlin launched the concept of the Stockholm School. The School was made up of young Swedish economists who had developed a program for active countercyclical policies before or in parallel with Keynes.⁴ The short and quite limited crisis policy of Ernst Wigforss had no significant macroeconomic effects, but it represented a breakthrough for the view that fiscal policy should be used to stabilize the business cycle.

The economic and political response at the start of the Second World War reflected the lessons learned during the First World War. Extensive regulations, including capital and rent controls, were introduced at an early stage to prevent an expected rise in the rate of inflation. Inflation was held back in contrast to the high rate of inflation during

⁴ For a survey of the Stockholm School see the contributions in Jonung (1991).

the First World War (Figure 1). The mobilization effort was financed by a considerable increase of the public debt (Figure 2).

The planning for the post-war period focused on avoiding a depression similar to the depression that followed at the end of the First World War. Aggregate demand was expected to fall as the war ended, just as it had after the previous war. David Davidson's norm of a price level that should decrease in inverse proportion to economic growth was included in the monetary policy program of 1944. Once again, Sweden was a pioneer; no other country had chosen this norm as guide for monetary policy. The revaluation of the *krona* in 1946 was a part of this program. However, the program was quickly abandoned, as peacetime brought strong economic growth, instead of an expected depression.

4. 1951–73. The gold standard again

At the end of the Second World War, international attempts were made to avoid the mistakes that led to the interwar depression. In this spirit, the Bretton Woods system was created, administered by the IMF and based on fixed exchange rates and the regulation of international capital flows. Sweden became a member in 1951 and pegged the *krona* to the dollar, which, in turn, was pegged to gold. The gold standard returned, albeit in modified form.

During the coming years, a vast system of formal and informal regulations was developed. The capital controls put in place during the war insulated the domestic financial system from international impulses. Behind this protective barrier, the Riksbank determined the interest rate, the growth rate of the credit volume, and the allocation of credit between the major sectors of the Swedish economy. The housing sector was given the highest priority, being protected from cyclical swings. The interest rate was kept below that of a free market rate, which led to a state of permanent credit rationing. The policy was motivated with the so-called low interest rate doctrine (*lågräntedoktrinen*), developed by, among others, Gunnar Myrdal. Low interest rates were considered beneficial for investment and growth as well as contributing to a fair distribution of income. In short, financial repression characterized the policy of the Riksbank.

The capital controls created some latitude in the design of the domestic stabilization policy. New policy instruments were designed to control investments, like the system of investment funds. There was a strong trust in the government's ability to control and regulate economic activity in minute detail, reflected in the belief in fine-tuning. The Minister of Finance gathered considerable economic and political power to his department. Control over the Riksbank was ensured by having the state secretary of the Ministry of Finance act as the Chairman of the Board of the Riksbank.⁵

The Bretton Woods system collapsed at the beginning of the 1970s, when the US severed the tie between the US dollar and gold, due to expansionary US fiscal policies. When the connection between the dollar and gold disappeared, so did the tie between the *krona* and gold. Gold was no longer the nominal anchor for the stabilization policy regime in any country. The peg to the dollar remained in force. Sweden abandoned the gold standard officially in 1975, with little fanfare.

5. 1973–1992. Full employment

The following decades were filled with economic and political turmoil. Sweden was turned into a laboratory for stabilization policy. Hardly any country experimented with as many policy arrangements as Sweden did during the 1970s and 1980s. The peg to the dollar was first replaced with a fixed exchange rate to the West German currency in 1973. The objective of the stabilization policy was to achieve full employment. The means were growing government spending and repeated devaluations to keep up aggregated demand when Sweden was hit by the two oil crises (OPEC I and II), see Figure 2. Inflation was addressed with price controls during the 1970s and 1980s.⁶

OPEC I, which occurred in 1973–1974, was met with the so-called bridging over policy (*överbrygningspolitiken*), the most expressly Keynesian experiment in Swedish stabilization policy history. The aim was to use expansionary fiscal measures to "bridge

⁵ See, for instance, Lindbeck (1968) and the contributions in Werin (1993) for an extensive review of the stabilization policy regime during the Bretton Woods period.

⁶ For an account of the Swedish experience of price controls to contain inflation, see Jonung (1990).

over” the international depression that was expected following the sharp increase of oil prices in 1973. The experiment failed. The high inflation in Sweden prompted devaluations in 1976 and 1977 to restore the competitiveness of Swedish exports.

The lessons learned during OPEC I affected the response to the next oil crisis, OPEC II, which struck in 1979. The response was another devaluation in 1981, administered by the center-right-wing government in power. Following the election in the fall of 1982, the new Social Democratic government carried out an offensive devaluation (*offensiv devalvering*), another innovation in Swedish exchange rate policy, to establish a competitive advantage beyond that one created by the devaluation in 1981.

Among economists, criticism of the policy of devaluations grew. It was formulated by, among others, the Economic Policy Council of the Centre for Business and Policy Studies (SNS), in their annual report of 1985.⁷ The report delivered the message that devaluations, although successful in increasing employment in the short run, would, in the long run, only lead to inflation and yet more devaluations. Instead, the Council suggested a norm-based or rule-based policy, with the goal of a low and constant rate of inflation. The means would be a fixed exchange rate while ruling out the possibility of devaluations. The idea of basing stabilization policy on a norm greatly influenced public debate in Sweden. In 1991, the Social Democratic government declared that low inflation was considered a prerequisite for reaching full employment.

In 1985, the Riksbank abolished the major part of the domestic credit market regulations. This step, known as the November Revolution, became the starting point for the biggest transformation in Swedish economic policy framework in modern times. As the domestic regulations were removed from the credit market, commercial banks increased their lending dramatically. The result was an intense economic boom, with sharply rising asset and consumer prices, and record-low unemployment rates. In 1989, the external capital controls, were abolished and the Swedish financial sector became integrated with international financial markets.

Because of the design of the deregulation process, Sweden followed the traditional pattern of a boom-bust financial cycle. The real interest rate, negative during the boom,

⁷ See Söderström, ed., (1985).

rose dramatically around 1990, primarily due to the Riksbank's defense of the fixed exchange rate of the *krona* by raising its policy rate. This triggered a currency and banking crisis, with falling investments, rapidly rising unemployment, and large budget deficits (Figure 2 and 3). The severity and speed of the crisis caught economists and policymakers by surprise. The many years with financial regulations had contributed to a general ignorance of the forces that unregulated financial markets could create. Currency speculation forced the Riksbank to abandon the fixed exchange rate in November 1992 and, once again, the *krona* got a floating exchange rate.⁸

6. 1993–2019. Price stability again

The floating exchange rate of the *krona* formed the basis of a new stabilization policy regime based on a paper standard, as was the case in September 1931. The same day that the fixed exchange rate regime collapsed, the Riksbank asked the Canadian central bank, which had earlier switched to inflation targeting, for advice. In January 1993, the Riksbank declared that price stability would be the overall aim of monetary policy. It introduced the same operative target as Canada, a consumer price inflation rate of 2 percent, and the same tolerance range +/- 1 percentage point. The level was chosen to signal a break with the high inflation of the previous decades.

As during previous crises in Sweden, the economic debate turned lively. The profession of economists contributed with a series of analyses in a government commission headed by professor Assar Lindbeck (1930 -) to explain the crisis and identify policy measures to fight the crisis. The commission presented a set of policy recommendations, more so than in any previous analysis of Swedish crises (SOU 1993:16). From today's perspective, however, much of the advice lacked any direct connection to the boom-bust process.

During the following years, a completely new institutional framework for the stabilization policy regime emerged, based on a set of new rules, including a separation

⁸ See Jonung, Kiander and Vartia (2009) for a study of the causes and consequences of the financial crises in the Nordic countries in the early 1990s.

of power between the government and the central bank. The new central bank law of 1999 stated that the Riksbank would be independent of government involvement and would have price stability as its only objective. The large budget deficits experienced during the crisis of 1991-1993 inspired the introduction of a rules-based budgetary and fiscal framework. This emerged gradually with a surplus target and an expenditure ceiling as vital components. In 2007, an independent Fiscal Policy Council was established with a mandate to investigate whether the current fiscal policy is in line with the fiscal framework.

The Swedish membership in the European Union is part of the new stabilization policy regime. The membership guarantees the free movement of capital to and from other Union members. Sweden must also fulfill a series of rules concerning fiscal policy.

The consultative referendum of 2003 concerning a Swedish adoption of the euro was an important crossroads. For the first time ever, a referendum was being held between either membership in a monetary union (and, thereby, the abolishment of the national currency) or a completely floating exchange rate. Most voters chose the latter. Economists were involved on both sides of the debate.

Sweden countered the global financial crisis in 2008 with a relatively tight fiscal policy and an expansionary monetary policy with low interest rates. This reaction was based on the lessons learned during the crisis of the 1990s, which had shown that expansionary fiscal policy and restrictive monetary policy was an inappropriate response to a financial crisis. The commercial banking system was offered generous liquidity support at an early stage of the crisis.

The new policy regime, with inflation targeting as main element, made monetary policy the heart of stabilization policy. The Riksbank is responsible for keeping the inflation rate at 2 percent in the medium term. In the short run, the Riksbank is also supposed to stabilize the economy as a whole, if it can do so without endangering the inflation target. In the short run, the Riksbank may thus consider both employment and growth; the idea of fine-tuning has returned, but this time within the realm of monetary, instead of fiscal, policy.

The role of fiscal policy is greatly reduced in this new regime, without any explicit countercyclical role to play, except in times of large demand or supply shocks.” The

goal of fiscal policy has become to support monetary policy and to avoid causing any instability: “The most important contribution of fiscal policy to stabilize the business cycle is to maintain confidence in the long-run viability of public expenditures. If this is not the case, the lack of confidence would complicate the Riksbank’s task to uphold price stability.”⁹

The new framework has been the focus of several evaluations, in accordance with the Swedish tradition of public scrutiny. The financial crisis of 2008 was the inspiration of the Financial Crisis Committee (*Finanskriskommittén*) that, among other things, investigated how financial crises should be prevented and managed (SOU 2014:52). The Committee also presented suggestions on how the surveillance of macro-prudential issues should be organized. Macro-prudential supervision was strengthened and placed under the responsibility of the Swedish Financial Supervisory Authority. A Financial Stability Council was formed, with representatives from the government, the Riksbank, the Financial Supervisory Authority, and the Swedish National Debt office. The Surplus Target Committee evaluated the fiscal policy framework in 2016 (SOU 2016:67). The Committee suggested the addition of a debt anchor to strengthen the fiscal framework. The Committee on Finance of the Riksdag has taken the initiative of regular evaluations of monetary policy, conducted by foreign economists. The monetary and fiscal policy debate among economists is lively for the moment.¹⁰

7. Lessons from history

This historical expose invites several conclusions. First, Swedish stabilization policy has been constantly in a state of change where deep economic crises have been the main drivers behind these change. Crises have forced politicians, civil servants, and economists to continuously rethink old policies. Policymakers have been forced to learn and to adapt, trying to find a solution to the immediate and often severe imbalances,

⁹ The quote is from the government document *Ramverk för finanspolitiken (Framework for fiscal policy)* (Regeringens skrivelse 2010/11:79, p. 6).

¹⁰ See, among others, Swedenborg (2015) and *Makropolitik i kris (Macro policy in crisis)* (2016) for current overviews of the debate among Swedish economists, as well as several articles in *Ekonomisk Debatt* in recent years.

while trying to avoid the mistakes made during previous crises. Thus, times of crisis have paved the way for something new—both in economic policy and in theory. The crises of the 1930s and 1990s highlight this conclusion.¹¹

Second, so far no norms or rules for the stabilization policy have been stable in the long run. There is presently no theory that stabilization policy could rely on that would provide protection against future shocks. Therefore, all rules and frameworks should include an escape or exit clause to guarantee sufficient flexibility during serious crises. The challenge is to construct an emergency exit in such a way that prevents it from becoming a main entrance.

Third, in a small open economy, such as that of Sweden, the stabilization policy regime is determined to a large extent by international forces. While Sweden has certainly experimented with many policy innovations, like Wicksell's and Davidson's norms, the bridging over policy during OPEC I, and the offensive devaluation of 1982, these experiments have all been short-lived. Following these tryouts, Sweden has always returned to the international pattern.

The historical overview presented here also highlights the central role played by economists. They have influenced the stabilization policy regime in several cases, both during crises and during less dramatic circumstances. They have developed theories behind monetary and fiscal policy. They have evaluated the policies implemented and learned lessons for future policies. They have acted as advisors to the government and to the opposition. They have staffed government investigations and committees, and they have been active in the public debate.

Lastly, if we look forward, we should expect a new crisis and, following close behind, a new stabilization policy framework. We do not know either how the new crisis will strike or when it will arrive. Nevertheless, this must not stop us from considering questions like: Could we already today identify imbalances that are likely to lead to tomorrow's crisis? What will the lessons from a future crisis be?

¹¹ See Jonung (1999) for an overview of the Swedish stabilization policy regime as the outcome of a learning process in the period 1970-1999.

8. When will the next stabilization policy framework emerge?

Let me now turn from history and look toward the future. I would like to focus on the development that I view as being the most serious threat to the current regime, namely the rapid expansion of the financial system and the accompanying accumulation of debt driven by new financial technologies. To me, this process, sometimes called financialization, or the financial revolution, appears to be the Achilles' heel of the current stabilization policy regime. This is not a novel conclusion. Economists have made the same point for some time, especially in the American debate following the financial crisis of 2008.¹²

Figures 4, 5, and 6 together illustrate the financial revolution from a Swedish perspective. Figure 4 shows the ratio between total credit and GDP, Figure 4 the real house price index in Stockholm, and Figure 6 the real stock index. The overall patterns in the three figures are strikingly similar: the time series are fairly constant up until the mid-1980s. While there are fluctuations reflecting the influence of the World Wars and the depression in the 1930s, no dramatic change takes place. However, something exceptional happened during the 1980s. The credit volume suddenly soared, as did asset prices, i.e., the prices of housing and stocks. Housing prices increased sharply, but the shift is especially clear for the stock index. The three time series also started to fluctuate more violently than before.

This pattern is not unique to Sweden; the same pattern has been repeated internationally. Jordà et al. (2015) use the term *the financial hockey stick* when they discuss how the ratio between credit volume and GDP increased abruptly in the 1980s in many countries. Sweden is, in fact, a laggard in this case, as financial deregulations took place later in Sweden than in most other Western countries.

What conclusions can be made from the pattern that emerges in Figures 4–6? Several lessons are possible. The first thing the figures show us is that international, and,

¹² Before the crisis, Axel Leijonhufvud, among others, warned against the financial risks of inflation targeting. See Leijonhufvud (2007).

thereby, Swedish, monetary policy has lost the nominal anchor once supplied by the gold standard. The anchor kept the growth rate of the credit volume down. The paper standard that replaced the gold standard has not—at least not yet—been able to stop the higher growth of the supply of credit, as compared to the growth of the real economy as measured by real GDP. The paper standard of today lacks the clear connection between the credit volume and an asset such as the stock of gold that the gold standard once provided. Therefore, as it grows, the financial system becomes more elastic and harder to control. Experience tells us that the accumulation of debt first slows down after a crisis. This pattern was seen in countries like the US and Great Britain after the 2008 financial crash although the build-up of debt has increased by now.

The second lesson that can be learned from the figures is that the volatility of the three time series is closely related to the financial crises that hit Sweden in the past decades: the financial crisis in the early 1990s and the 2008 crash. The role of credit as a driver of financial crises is well documented.¹³ Simply put: a credit system is a prerequisite for a credit crisis.

A third conclusion is that the high growth rate of credit after the financial deregulation is not linked to higher growth in the real economy. Apart from a few high-growth years during the height of the dot-com bubble, average growth in Sweden has returned to the low levels experienced in the 1970s. During later years, households—not firms—have increased their debt in Sweden. The present debate about secular stagnation is an illustration of the disappointing rate of growth—despite abundantly available capital and low real interest rates (Andersson 2017).

After the financial deregulations in Sweden, a pronounced credit cycle emerged, with a longer duration and greater amplitude than the traditional business cycle, as measured by the GDP output gap (Andersson and Jonung 2015). The Swedish credit cycle is also determined largely by the global cycle. This limits the Riksbank's ability to control the

¹³ See e.g. Reinhart and Rogoff (2009).

rate of inflation, interest rates, and the credit volume within Sweden. Thus, the high level of financial integration weakens Swedish monetary autonomy.¹⁴

In practice, the new financial world is controlled by American and European monetary policy through the strong position of the dollar and the euro in the global financial system—despite floating exchange rates and inflation targeting.¹⁵ Because of this international context, financial integration, credit expansion and changes in interest rates are highly correlated across national borders. Many countries outside the US and the euro area, being financially integrated with the dollar and the euro, tend to keep a relatively fixed exchange rate against these anchor currencies. Sweden is an example of this global pattern. Swedish commercial banks finance a large part of their domestic lending by borrowing on the international financial markets. Thereby, the Swedish interest rate is determined by the international rate.¹⁶

Figures 4–6 hint at great challenges emerging for the stabilization policy regime. The framework presently in place has solved the problems experienced in the past—specifically the high rate of inflation and the growing public debt of the 1970s and 1980s. At the same time, it has contributed to new imbalances. Above all, it has failed to halt the increase in asset prices that has occurred since the mid-1990s. The credit volume has increased steadily, mostly due to monetary policies targeting the Swedish rate of inflation through low interest rates. Thereby, monetary policy has fueled growing financial imbalances and a rising risk of future corrections of asset prices.¹⁷

Herein lies a clear conflict between price stability, on the one hand, and financial stability, on the other hand. This conflict is highly topical today. When the Riksbank tries to push up the consumer price index toward the targeted 2 percent inflation with

¹⁴ According to Rey (2015), exchange controls would be required to create monetary autonomy for a country like Sweden.

¹⁵ See, e.g., Ilzetzki et al. (2017).

¹⁶ The Riksbank's interest rate closely follows the key interest rate of the ECB. The importance of the dollar is clear from the deal that the Riksbank struck with the Federal Reserve following the 2008 crash, guaranteeing access to dollar loans during an emergency.

¹⁷ This is the message in Andersson and Jonung (2015). Also see Borio (2014), for an overview of the international pattern.

the help of negative interest rates, as it has in recent years, it inevitably also puts upward pressure on asset prices.¹⁸

I have here described the present problems of the rule-based monetary policy in Sweden. There are also economic and political difficulties with rules-based fiscal policy, especially in countries implementing austerity measures. However, in Sweden, the fiscal policy framework has so far enjoyed solid political support. The primary reason for the high level of support is the fact that the Swedish budgetary rules were implemented during a period of high growth and recovery, as a lesson learned from the domestic budget crisis of the 1990s (Figure 2).¹⁹

If the next crisis is a financial crisis, the current division of power between control over monetary and fiscal policy will probably be called into question. The divorce between the two was based on the experience of high inflation and increasing public debt in the 1970s and 1980s. The reasoning went that, if monetary policy was decided by an independent central bank with an inflation target and fiscal policy was constrained by rules, macroeconomic stability would automatically follow. The global crisis of 2008 undermined this optimism.

Following the crisis, financial stability has emerged as a high priority, however, far from at par with price stability and fiscal sustainability. There are several institutional solutions to choose from to address this change of priorities. One way would be to change the monetary policy framework in such a way that financial stability becomes the primary objective of the Riksbank and price stability is subordinated to this aim. Such an arrangement makes sense, as financial stability is a prerequisite for a stable price level. In this case, the Riksbank should be given the tools necessary to maintain financial stability.

Another way would be to induce greater coordination between the Riksbank and other authorities to achieve financial stability. The Financial Stability Council could be seen as a first tentative step towards such a solution. After the next financial crisis, this

¹⁸ An excellent analysis of the financial imbalances can be found in the Riksbank's publications; see, for instance, *Financial Stability* (2016:2) for a detailed overview.

¹⁹ The evolution of the Swedish fiscal framework is discussed in Jonung (2018) discuss the challenges of rule-based fiscal policy in an international perspective.

discussion club, presently rather ineffective, will probably be replaced by a more efficient institutional arrangement.

The current inflation-targeting regime, with largely independent authorities responsible for setting stabilization policies, has contributed to an increasing demand for economists with PhD exams. The Riksbank was a forerunner in this area, and other government authorities have followed suit. Thus, economists have, as a group, benefitted from the strengthening of the role of experts caused by the increased independence of government authorities. The relatively large share of economists among high public officials means that the public will probably hold economists, as a group, at least partly responsible if Sweden is once again hit by a deep economic crisis.

9. Conclusions

The most important message of this article is that the journey of Swedish stabilization policy does not have an end station. The established models and thinking concerning stabilization policy are constantly questioned and developed, not just during crises. There is a never-ending pursuit for macroeconomic stability—and for a new anchor or anchors to help achieve this stability. The debate also rages on in-between economic crises, when new imbalances are built up, but crises constitute the central source for profound change.

The current quest is driven by the financial deregulation that occurred between 1985 and 1989. This opened up the door for a financial revolution, in the form of a rapid buildup of debt. First, it gave Sweden the crisis in the early 1990s and, as a result, the present-day stabilization policy regime. It has also contributed to the creation of a large financial system, the role of which economists have yet to incorporate fully into the theory and practice of Swedish stabilization policy. We are in a new, financially dominated world for which no well-functioning compass or established map seems to exist.

It is trivial to predict that the present stabilization policy regime, as codified in the existing rules and policy behavior, will most probably change after the next deep crisis. My guess is that the source of this future disturbance will be found in the financial

sector. Many—not the least the Riksbank—have warned against the consequences of current developments. However, no convincing solution has yet been presented. We will probably have to wait until the next crisis before such a solution can be found and implemented.

References

Andersson, F NG (2017), “Sekulär stagnation: vad är det, finns det, och hur påverkar det penningpolitiken?”, *Ekonomisk Debatt*, vol. 45, no. 4, pp. 13-25.

Andersson F NG and L Jonung (2015), “Krasch, boom, krasch – den svenska kreditykeln”, *Ekonomisk Debatt*, vol. 43, no. 8, pp. 17–31.

Borio, C (2014), “The financial cycle and macroeconomics: What have we learnt?” *Journal of Banking and Finance*, vol. 45, pp. 182-198.

Iizetki, E, C N Reinhart and K S Rogoff (2017), “Exchange arrangements entering the 21st century: which anchor will hold?”, NBER working paper no. 23134, February.

Jonung, L (1984) “Swedish Experience under the Classical Gold Standard 1873-1913”, in Michael Bordo and Anna Schwartz, ed., *The Classical Gold Standard in Retrospective*, University of Chicago Press/National Bureau of Economic Research.

Jonung, L (1979), “Knut Wicksell's Norm of Price Stabilization and Swedish Monetary Policy in the 1930's”, *Journal of Monetary Economics*, vol. 6, pp. 459-496.

Jonung, L (1990), *The Political Economy of Price Controls. The Swedish Experience 1970-1985*, with a preface by Mancur Olson, Avebury, 1990.

https://portal.research.lu.se/portal/files/69079414/108_The_political_economy_of_price_controls_1990.pdf

Jonung, L (1991), *The Stockholm School of Economics Revisited*, Cambridge University Press, Cambridge.

Jonung, L (1999), *Med backspegeln som kompass - om stabiliseringspolitiken som läroprocess*, rapport till ESO, Ds 1999:9, Finansdepartementet, Stockholm, March, 1999. http://eso.expertgrupp.se/wp-content/uploads/1999/10/Ds-1999_9-Med-backspegeln.pdf

Jonung, L (2017), “Jakten på den stabila stabiliseringspolitiken”, *Ekonomisk Debatt*, vol. 45, no. 4, pp. 26-40.

Jonung, L (2018), “Homegrown: The Swedish fiscal policy framework”, chapter 12 in Roel M.W.J. Beetsma and Xavier Debrun, eds., *Independent Fiscal Councils: Watchdogs or lapdogs?*, VoxEU.org eBook. CEPR Press, January.

<https://voxeu.org/content/independent-fiscal-councils-watchdogs-or-lapdogs>

Jonung, L, J Kiander and P Vartia, eds., (2009), *The Great Financial Crisis in Finland and Sweden. The Nordic Experience of Financial Liberalization*, Edward Elgar, Cheltenham, 2009.

Jordà, O, M Schularick and A M Taylor (2016), “Macrofinancial history and the new business cycle facts”, *NBER Macroeconomics Annual Conference*, Cambridge.

Lindbeck, A (1968), *Svensk ekonomisk politik*, Aldus, Stockholm.

Leijonhufvud, A (2007), “The perils of inflation targeting”, VoxEU.org, 25 June.

<http://voxeu.org/article/perils-inflation-targeting>

Makropolitik i kris. Mediatryck i Lund, 2016.

<http://www.lusem.lu.se/kwc/publications/policy-papers>

Reinhart, C N and K S Rogoff (2009), *This Time Is Different: Eight Centuries of Financial Folly*, Princeton University Press, Princeton.

Rey, H (2015), “Dilemma not trilemma: The global financial cycle and monetary policy independence”, NBER working paper, no. 21162, May.

SOU 1993:16, *Nya villkor för ekonomi och politik*, betänkande från Ekonomikommisionen.

SOU 2014:52, *Resolution – en ny metod för att hantera banker i kris*, slutbetänkande av finanskriskommittén.

SOU 2016:67, *En översyn av överskottsmålet*, betänkande av överskottsmålskommittén.

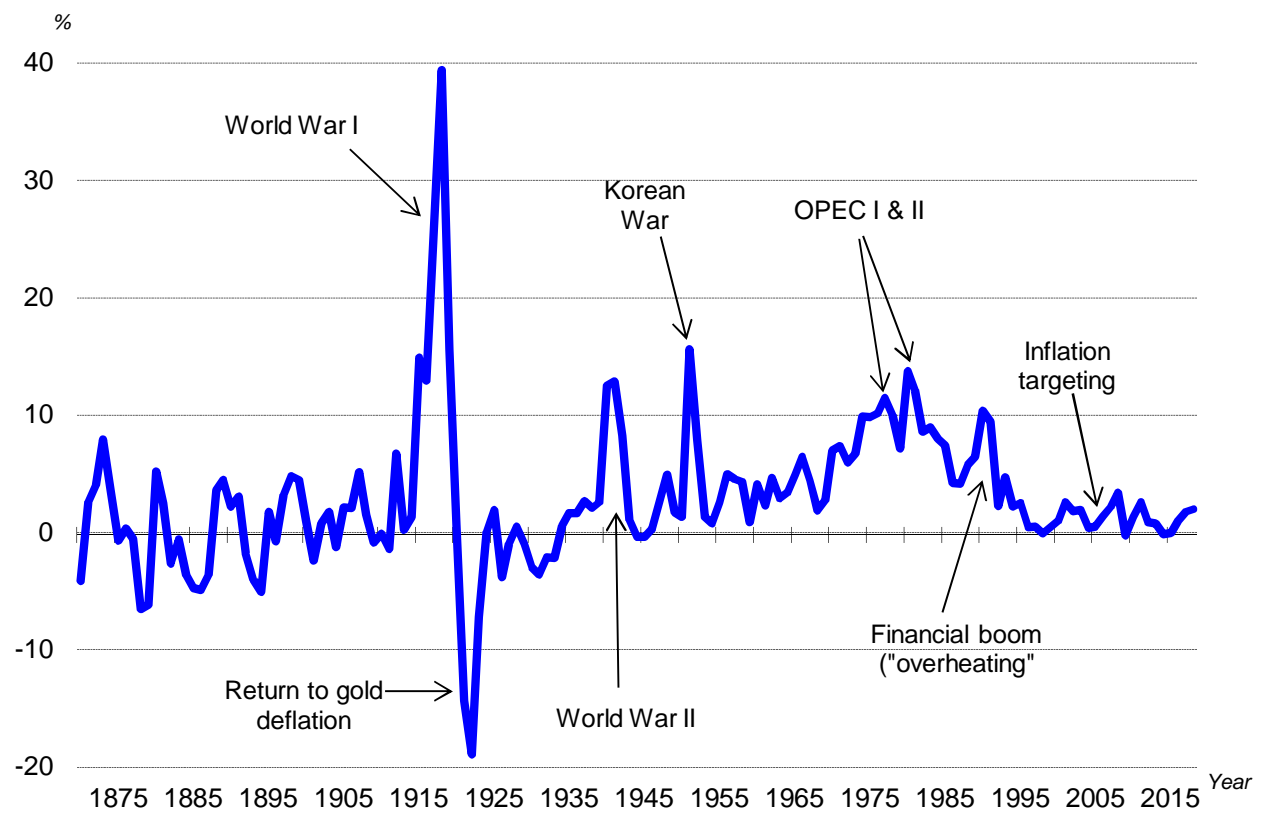
Swedenborg, B, ed., (2015), *Svensk ekonomisk politik – då, nu och i framtiden. Festskrift tillägnad Hans Tson Söderström*, Dialogos Förlag, Falun.

Söderström, H Tson, ed., (1985), *Vägen till ett stabilare Sverige*, SNS, Stockholm.

Werin, L, ed., (1993), *Från räntereglering till inflationsnorm*, SNS, Kristianstad.

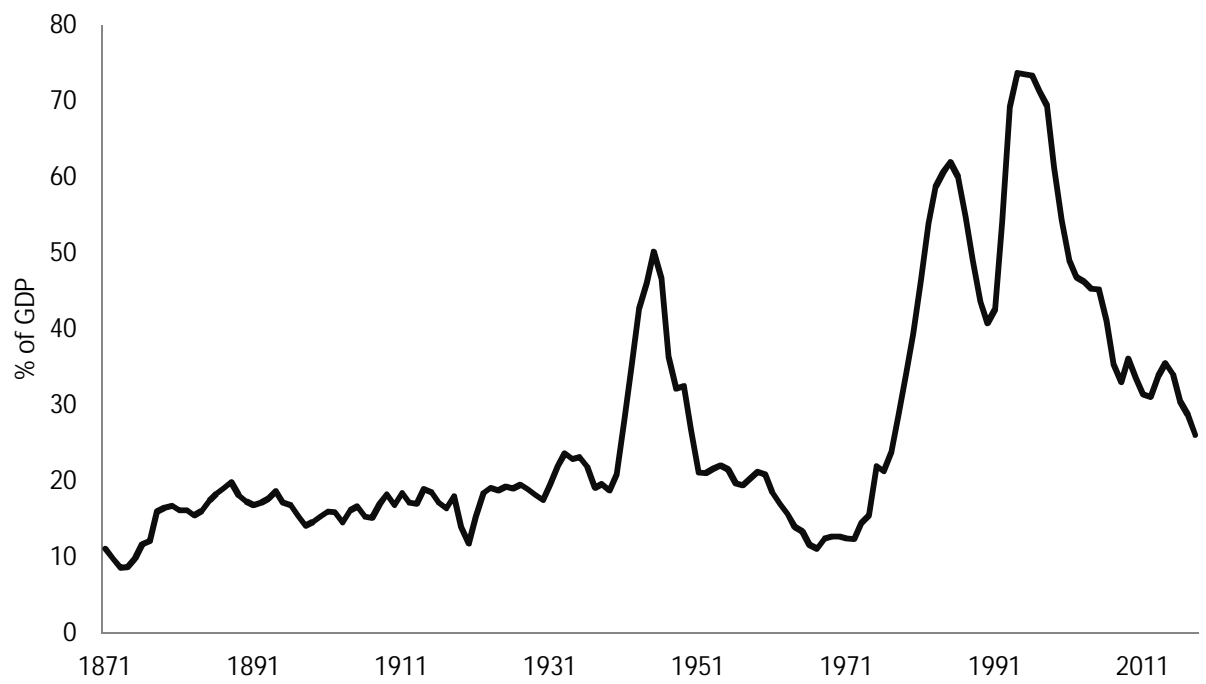
Wicksell, K (1899), “Penningrätans inflytande på varuprisen”, *Nationalekonomiska föreningens förhandlingar under förra halvåret 1898*, pp. 47-70.

Figure 1. The rate of inflation in Sweden, 1871-2018. Percent.



Source: See Jonung (2017).

Figure 2. Central government debt to GDP in Sweden, 1871-2018. Percent.



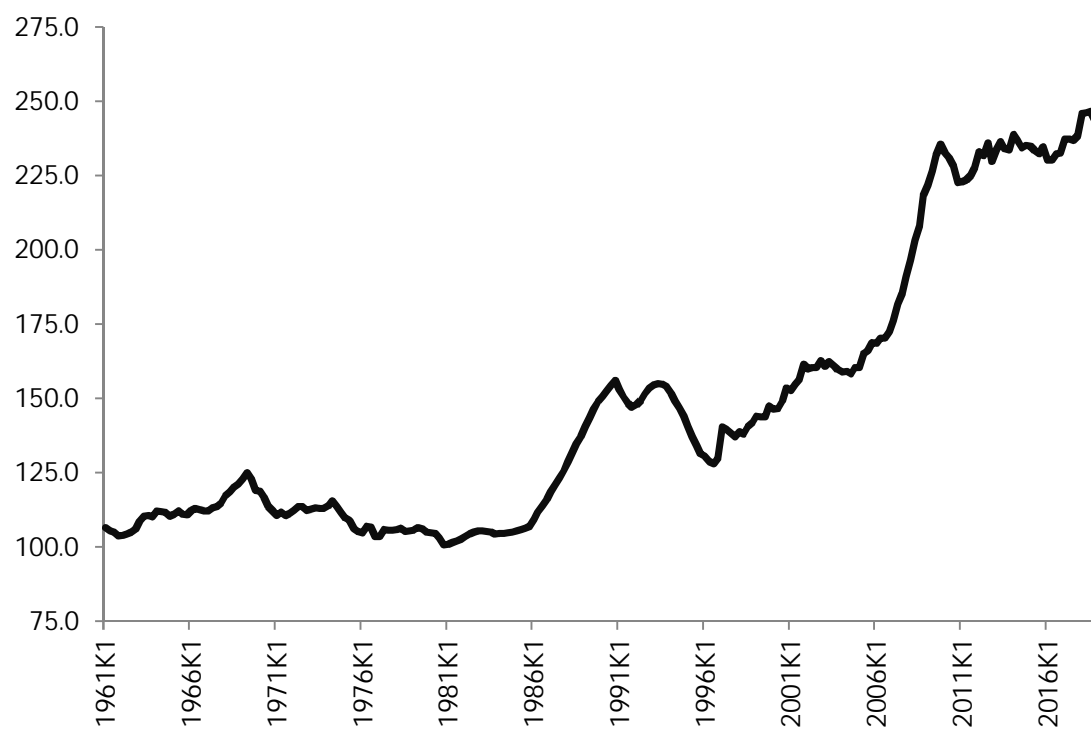
Source: See Jonung (2017).

Figure 3. The rate of unemployment in Sweden, 1908-2018. Percent.



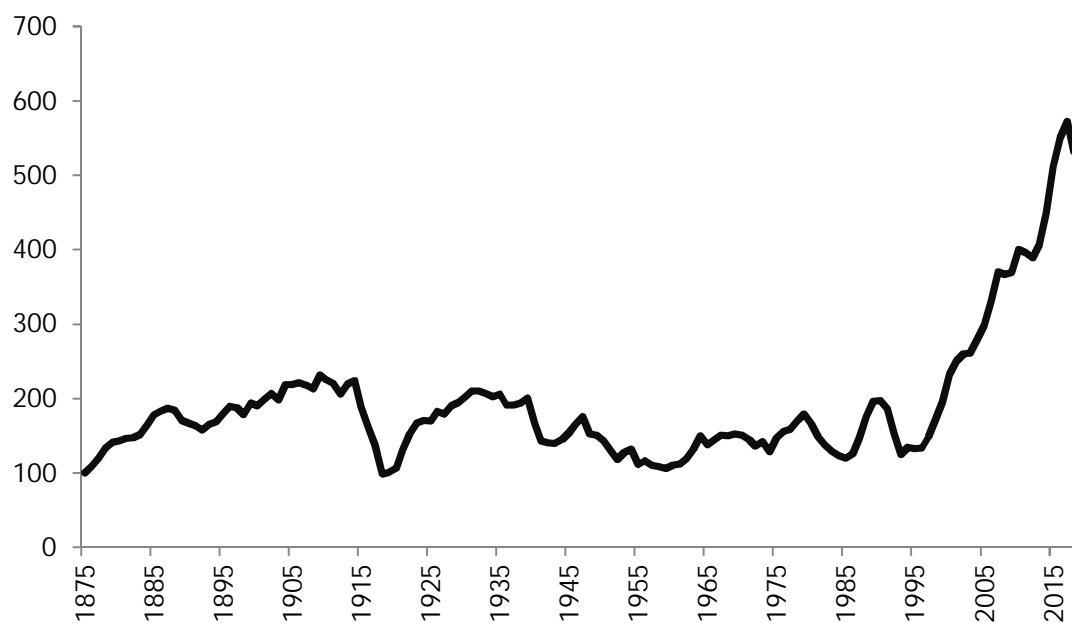
Source: See Jonung (2017).

Figure 4. Total debt to GDP in Sweden, 1961-2018. Percent.



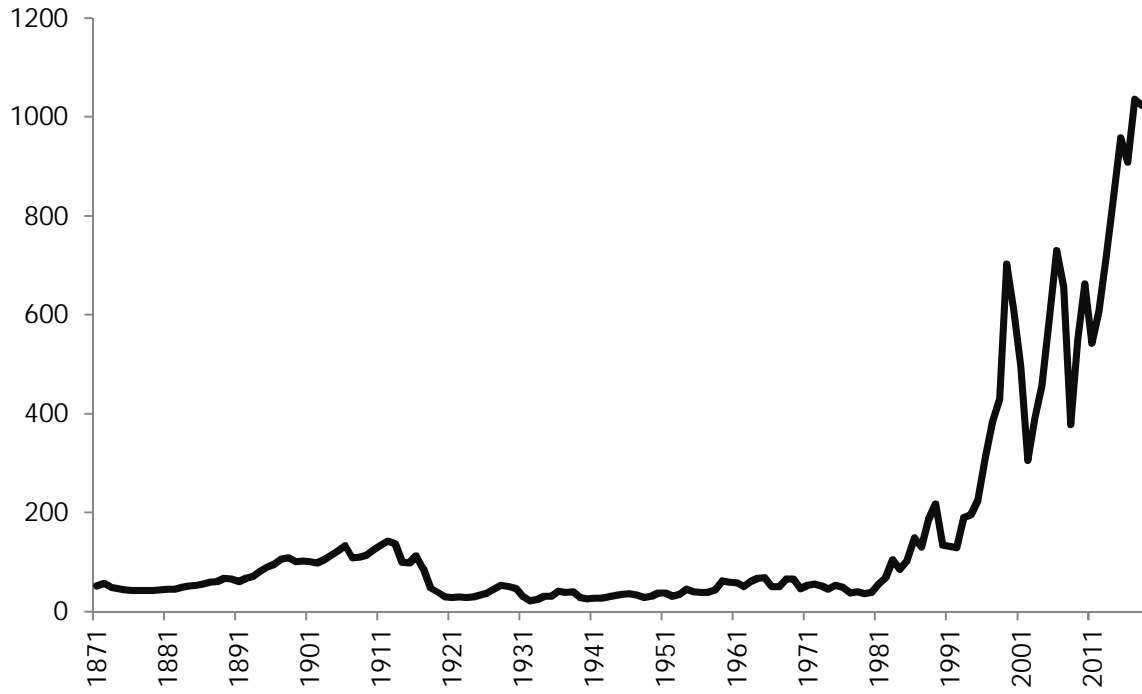
Source: See Jonung (2017).

Figure 5. Real house prices in Stockholm 1875-2018. Index 100 for 1875.



Source: See Jonung (2017).

Figure 6. Real stock price index, 1875-2018. Index 100 in 1901.



Source: See Jonung (2017).