



The euro in the history of the international monetary system

The international monetary system has alternated between periods with several cohabiting currencies, such as the dollar and pound sterling in the 1920s, and periods with one dominant currency, such as the dollar since 1945. Despite the political decision not to push for the euro's internationalisation, and the decline in its role after the 2008 crisis, the single currency ranks second in the international monetary system, well ahead of those currencies behind it in the rankings, but still far behind the US dollar. The internationalisation of the renminbi remains limited at present due to the controls on China's capital account. While the crises have confirmed the pre-eminence of the dollar, the policies currently being pursued by the United States, as well as recent technological developments, could provide an opportunity to promote the euro's role, provided appropriate policies are put in place to safeguard the euro area's resilience.

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JEL codes
E42, F31,
F4, G15,
N24

1973

demise of the Bretton Woods system

1978

creation of the European Monetary System

1999

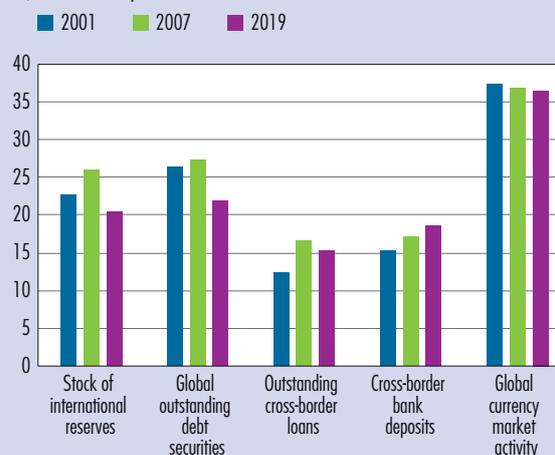
adoption of the euro in non-physical form by 11 European Union Member States

19 countries

have the euro as their currency in 2020 and 25 countries have pegged their currency to the euro

The internationalisation of the euro

(% of total global outstandings/flows; at constant exchange rates, Q4 2019)



Source: ECB, *The International Role of the Euro* (2020).



The euro is a young currency in the international monetary system (IMS). It has numerous advantages that make it well-suited to being an international currency: the euro area is a leading economic area; its economy, at least until the Covid-19 crisis, was committed to being financially and commercially open; its macroeconomic and financial stability are guaranteed by the Eurosystem.

Nonetheless, network and inertia effects are often highlighted as the main explanatory factors behind international currency dynamics. As in the case of IT standards, network effects refer to the use of a currency by a large enough number of individuals to facilitate its circulation and reduce transaction costs. These network effects in turn create inertia, whereby a dominant currency tends to retain its status.

The history of the IMS can also provide some insights into the prospects of the euro as an international currency, and the importance of network and inertia effects. There have been numerous periods where several currencies have shared international status, indicating that network effects do not necessarily lead to total dominance by a single currency. Moreover, once appropriate policies had been put in place, the rise of the dollar proved rapid, demonstrating that there are limits to inertia effects. Modern e-payment technology can reduce these effects even further, as it allows individuals to switch easily from one currency to another.

Despite a policy of neutrality on its international role, the euro has risen to become a major international currency, ranking second in importance in the IMS. However, it still lags far behind the dollar.

Today, the future of the euro as an international currency needs to be assessed in light of the policy of internationalisation of the renminbi, the decline in the relative size of the euro area economy, and the two recent crises – the 2008 crisis and Covid-19.

1 The international monetary system has alternated between periods with one dominant currency and periods with several coexisting currencies

Prior to the Second World War, there were two periods when several currencies shared international status within the IMS – one before the First World War, which was particularly stable, and the other in the interwar period, which was much more unstable.

After the pound sterling dominated the 19th century as part of a gold standard system, the French franc and the Deutsche Mark both rose to take on international status, alongside sterling. At the time, given the high costs associated with managing gold, central banks began to diversify their reserves into currencies that were convertible into gold. Moreover, diplomatic factors, coupled with strong growth in French and German international trade, meant that both countries were able to foster the internationalisation of their currencies. In 1913, while sterling still accounted for 48% of known reserves, the franc had risen to account for 31% and the Deutsche Mark 15% (Lindert, 1969).

Following the First World War, sterling's dominance was rapidly undermined by the sharp rise in the dollar. In terms of GDP, the US economy had quickly caught up with the United Kingdom in the mid-19th century. However, without a central bank liquidity guarantee, the dollar was unable to gain international status prior to the First World War. This changed with the Federal Reserve Act of 1913. Over the course of the 1920s, and thanks to an active policy on the part of the Federal Reserve (Fed), the dollar became increasingly important as a reserve, transaction and borrowing currency. In 1929 it accounted for 56% of global reserves, compared with 41% for sterling (Eichengreen et al., 2018). The Fed's active management of export credits led to a rapid rise in the role of the dollar as an international transaction currency, whereas in 1912 sterling had

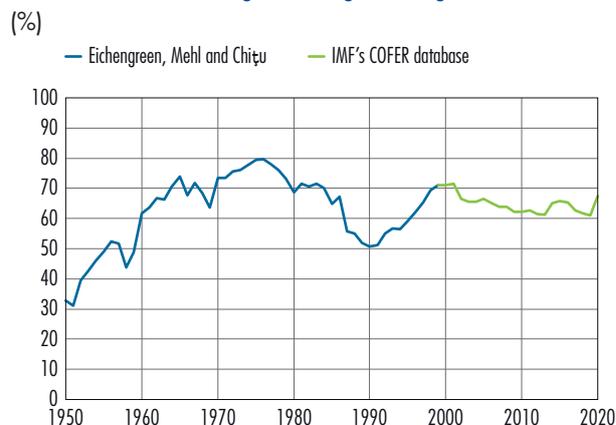


been almost completely dominant (Eichengreen and Flandreau, 2010). The dollar also expanded its role as a currency of denomination for international debt issuance, and was used in particular by France. With the onset of the 1929 crisis and virtual disappearance of all foreign exchange reserves, the use of the dollar diminished while sterling retained its status thanks to the support of the Commonwealth. Nonetheless, the dollar and pound sterling co-existed as international currencies for around a decade, and the expansion of the dollar proved particularly rapid, indicating that inertia effects within the IMS can be relatively limited. Indeed, they were largely offset by a policy of active management, as in the case of US export credits, as well as by the size of the US economy and the increase in the depth of its financial markets.

Following the Second World War, sterling quickly lost out to the dollar as the leading international currency. The wartime economy and the Commonwealth initially helped to bolster its role, and in 1945 it still accounted for 80% of global reserves. However, with the weakening of the British economy, and above all the introduction of the Bretton Woods system, the dollar became the *de facto* and then *de jure* dominant currency for the entire postwar period. Bretton Woods was designed to correct the main problems in the interwar monetary system: competitive devaluations and protectionism, disorderly capital flows and unstable exchange rates (Bordo, 2017). It introduced a system of fixed but adjustable exchange rates, made the US dollar the only currency convertible into gold (at a fixed rate of USD 35 per ounce) and set up the International Monetary Fund (IMF) which would inject liquidity to bridge temporary balance of payments difficulties.

The system worked thanks to capital controls and strong economic growth which prevented conflicts over the distribution of value added. Yet it ran into severe problems with the implementation of expansionary monetary and fiscal policies, and the wave of US inflation in the 1960s (Bordo and Eichengreen, 2008). Robert Triffin (1960) highlighted the fundamental dilemma at the heart of the system: in order to finance growth in global trade, the United States had to provide the necessary liquidity by running an increasingly large balance of payments

C1 Share of the dollar in global foreign exchange reserves



Source: Eichengreen et al. (2018); IMF's COFER database.

deficit, which increased US external debt beyond the value of the nation's gold holdings. When the United States' official external debt exceeded its gold holdings in 1964, trust in the US dollar's convertibility deteriorated, leading to the suspension of its formal convertibility into gold in 1971 and the disappearance of the fixed exchange rate system in 1973.

The collapse of the Bretton Woods system did not mark the end of the dollar's dominance – quite the contrary. Neither Germany (see Section 2) nor Japan wanted their currencies to take on a major international role. Japan, which was the world's second-largest economy at the start of the 1980s, only liberalised its capital account and promoted the yen much later on, when it was feeling the effects of the financial crisis. As a result, when the euro was launched in 1999, the dollar was still the leading international currency for all uses (see Chart 1 for its role as a reserve currency).

2 The arrival of the euro

The announcement in August 1971 that the Federal Reserve was closing its gold window came as a huge shock, even more so because there had been no advance warning and it breached the rules of the IMF and of the General Agreement on Tariffs and Trade (GATT). Presented with this fait accompli, European countries, whose currencies were left in free float, rapidly tried to recreate the same conditions as Bretton Woods. It was from this European impetus that the euro would be born.



On 22 March 1972, European countries created the European “snake in the tunnel”, a system designed to limit fluctuations in exchange rates (maximum variation of $\pm 2.25\%$) between participating countries in order to facilitate trade. But the 1970s proved turbulent (oil crisis, weakness of the dollar), and the economic and political divergences were so great that most of the system’s members were unable to maintain their exchange rate.

In 1978, the snake in the tunnel was replaced by the European Monetary System (EMS). The basic idea was the same, but the EMS was more flexible and introduced a new unit of account, the European Currency Unit or ECU, which was defined as the weighted average of a basket of different European currencies, and used as the reference exchange rate.

The EMS held up fairly well during the second oil shock of 1979. It helped Europe to combat the subsequent wave of inflation and brought European economic policies closer together. However, its medium-term benefits proved to be limited compared with the possibilities offered by a single currency. As a result, in January 1999, the EMS was replaced by a single currency, the euro, and the exchange rates of the “old” national currencies were locked at fixed rates against each other.

The implicitly neutral stance on the euro’s internationalisation: a prudent choice

The creation of the single currency was designed to meet two objectives. The first was to complete the Single Market. By eliminating exchange rate risk and competitive devaluations, a shared currency would facilitate trade and create a level playing field between trading partners. The other, more symbolic objective was to further the process of integration envisaged by the founding fathers of Europe, and thus foster a political union. This process shares some similarities with German unification, which occurred rapidly in the 19th century and followed a comparable path (monetary union first, then economic union and finally political union).

Although the single currency was not initially a German idea, the political compromise underpinning the creation of the euro resulted in the ECB being largely modelled on

the Bundesbank. This was mainly because the preparatory work on the design of the ECB was carried out by the Committee of Governors of the Central Banks of the Member States of the European Economic Community (EEC), and the ordoliberal principles of its dominant central bank were incorporated into European federalist theories (Le Héron, 2015).

In his inaugural speech of 14 January 1999, Wim Duisenberg, the founding President of the ECB, said: “The Eurosystem will accept the international role of the euro as it develops as a result of market forces”. This prudent neutrality on the international ambitions of the fledgling currency reflected a compromise between those who were open to promoting the euro area’s geopolitical internationalisation, and those, such as the Germans, who were worried about the potential costs of internationalisation and preferred to let market forces decide.

These reservations were largely informed by the unfortunate experience of the Deutsche Mark at the start of the 1970s, following the collapse of the Bretton Woods system. At the time, the German currency attracted massive capital inflows, and, in a departure from their usual principles, the authorities had to introduce urgent capital controls to slow the currency’s appreciation and prevent it from hurting exporters. This experience strongly influenced the position of the ECB’s pioneers, who adopted the following principle: “pursuing exchange rate targets is not an advisable approach for the ECB since it would considerably constrain its ability to pursue the primary objective of maintaining price stability [...]. Moreover, it may become a source of moral hazard, since market participants might not hedge their positions any more” (Hartmann and Issing, 2002).

The ECB thus decided to adopt a neutral stance and leave market agents to determine the international role of the euro: “Since the internationalisation of the euro, as such, is not a policy objective, it will be neither fostered nor hindered by the Eurosystem” (ECB, 1999). At the time, it was considered inappropriate to take an unequivocal stance given the newness of the euro and the risk that it might prompt speculation. It was also a prudent choice given the uncertainties over whether the single currency



would prove a success with investors. However, the ECB would continue to keep a close eye on the evolution of the euro's international status, and has published a report on the subject every year since 1999.

The first years of the euro: a mixed take-up

The first years saw a surge in the young currency's international status, but without the euro taking a pre-eminent position. It nonetheless has several undeniable advantages as an international currency: the emphasis placed on price stability in the euro area makes the European currency a reliable and efficient anchor for third-party countries. The euro area also has a larger population than the United States and a comparable level of GDP. Finally, for many investors, the euro offers an attractive investment opportunity compared with the dollar.

As we have also pointed out in the first article in this series,¹ the euro rapidly became the second most widely used international currency, but without posing a threat to the hegemony of the dollar (Mehl, 2015). Already in 2001, it was the currency of denomination for nearly half of all trade exchanges with non-euro area countries, 26% of outstanding international bonds, 12.5% of loans, 15.5% of non-euro area cross-border bank deposits

and 23% of global currency reserves (see Chart 2). The financial crisis and subsequent debt crisis did not significantly alter the respective roles of the euro and the dollar, although they did lead to a temporary decline in the euro's international presence.

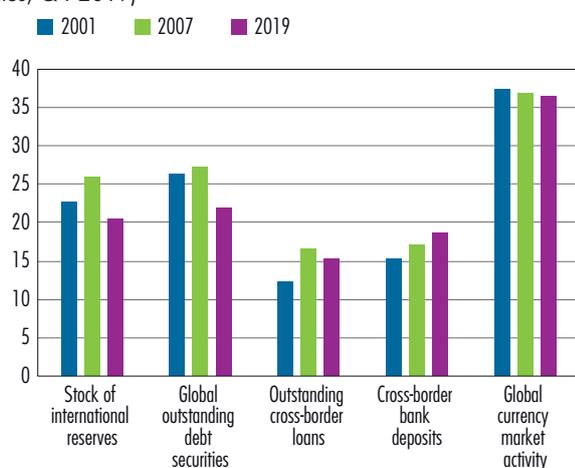
Ultimately, the euro did not establish itself as a global currency, but rather as a means for international investors to diversify their currency exposure, and as a regional transaction and borrowing currency for neighbouring countries.

Indeed, very soon after its creation, the euro quickly began to be used significantly and increasingly in neighbouring regions, first as a transaction currency and then in cross-border securities and lending markets. Certain countries in the region even made the radical decision to use the euro either as their official or *de facto* currency. In territories such as Kosovo or Montenegro, the official, unilateral adoption of the euro (sometimes called euroisation) may have helped to stabilise the macroeconomic environment rapidly after a serious political or economic crisis (Desécures and Pouvelle, 2007). Today, a significant share of bank deposits and loans in central, eastern and south-eastern Europe are denominated in euro (51% of deposits in Croatia, close to 30% in Bulgaria and Romania, 16% in Hungary and 8% in Poland, and more or less comparable shares of loans). Demand for euro banknotes and coins outside the euro area also rose steadily as of 2001, and has stabilised at around EUR 170 billion over recent years. According to a 2018 survey by the Bank of Austria, 36% of respondents in central, eastern and south-eastern European countries said they held euro cash.

Throughout the life of the young currency, numerous authors have examined the reasons why the euro has become the second most important currency in the IMS, well ahead of other currencies, but far behind the dollar (see "Why and How to Develop the International Role of the Euro?", Bussière et al., June 2020, in this series of Bulletins). One fundamental reason is the lack of a shared budget in the euro area and therefore of a European equivalent to US Treasury Bonds, which are a safe asset with a deep and liquid market, and thus particularly

C2 Internationalisation of the euro

(% of total global outstandings/flows; at constant exchange rates, Q4 2019)



Source: ECB, *The International Role of the Euro* (2020).

¹ Goulard (S.), "The International Role of the Euro", *Banque de France Bulletin*, No. 229/5, May-June 2020.



attractive for investors. There is still a clear separation within the Economic and Monetary Union between monetary policy and integrated bank supervision on the one hand, and the decentralised economic policies conducted by individual states on the other. The 2008 financial crisis and the subsequent sovereign debt crisis brutally exposed these institutional vulnerabilities and prompted a series of reforms: the European Stability Mechanism (ESM) in 2012, the Banking Union in 2014 and the project for a Capital Markets Union.² The latter, which is still underway, clearly shows the extent to which the euro area has failed to develop integrated capital markets, or a financial centre equivalent to London or New York. As a result, there is a scarcity of securities not just in the sovereign markets but also in private bond and equity markets. All these factors explain why the euro has struggled to achieve international primacy.

The Covid-19 health crisis comes at a time when the European Economic and Monetary Union is still far from being completed. Certain authors have suggested that Europe's declining geopolitical influence will weigh on the euro's international status. Moreover, with the future of finance intimately linked to new technologies, Europe's lag in this area relative to the United States and China is also a limitation (Ilzetzki et al., 2020).

3 The recent evolution of the IMS: China's drive to internationalise the renminbi and a multipolar system

The very gradual internationalisation of the renminbi

Since the start of the decade, the increasing use of the renminbi outside Chinese borders marks a new development, although for the time being it does not pose a challenge to the existing system. For the Chinese authorities, the motives for fostering the renminbi's international status are both commercial and strategic. The process is long, and will require a profound transformation of the financial system, which is still extremely rigid. The liberalisation of China's capital account, which is a requirement for the renminbi to

be used by non-residents, has only been taking place very gradually. Since 2015, it has been interspersed with significant capital outflows and bouts of increased exchange rate volatility, for which economic agents were doubtless unprepared.

Between 2010 and 2014, the introduction of various reforms (the QFII or Qualified Foreign Institutional Investors framework and the QDII or Qualified Domestic Institutional Investors framework) led to China recording net private capital inflows. These exerted strong upward pressure on the renminbi and prompted a significant build-up of foreign exchange reserves (USD 3.8 trillion in 2014, or 40% of GDP). However, stock market turbulences, following the bursting of various "neo-investor" speculative bubbles, as well as growing fears of a "hard landing" in economic growth, helped to reverse pressure on the renminbi. Against this backdrop, the unexpected move by the People's Bank of China to make its exchange rate more flexible via a new adjustment mechanism, triggered a historic devaluation of the renminbi and a rapid capital flight. Between 2015 and 2017, despite China's use of a quarter of its foreign exchange reserves, the renminbi lost some 15% of its value, and around USD 1 trillion of private capital left the country, mainly via banking flows. The authorities reacted by suspending the liberalisation of the capital account and tightening capital controls. The liberalisation of the currency nonetheless prompted the IMF to include the renminbi in its basket of SDR³ currencies in November 2015. Once conditions had stabilised again at the end of 2017, the Chinese authorities eased their regulations slightly to allow greater volumes of foreign investment. Although the financial account deficit has since largely been reabsorbed, capital outflows remain high, particularly during episodes of stress such as the 2018 and 2019 trade war with the United States.

In general, despite the international recognition of the Chinese currency that came with the IMF's decision in 2015, use of the renminbi at the international level remains marginal (around 2% of SWIFT payments and 2% of foreign exchange reserves, according to the IMF's

² Bussière (M.), Lecat (R.) and Vidon (É.), "Why and How to Develop the International Role of the Euro?", *Banque de France Bulletin*, No. 229/7, May-June 2020.

³ Since 2016, the value of an SDR has been based on a basket of five currencies, weighted as follows: the US dollar (41.73%), the euro (30.93%), the renminbi (10.92%), the yen (8.33%) and the pound sterling (8.09%).



COFER database). However, beyond these financial aspects, there is still a strong desire to internationalise the renminbi, and a political strategy to promote its development. Chinese authorities have set up numerous bilateral currency swap lines and have been increasingly making strategic foreign investments under the Belt and Road Initiative. As a result, some countries now see China as an alternative option in the event of financial tensions (issuance of “panda bonds” in Argentina, loan to Pakistan as part of the latest IMF programme, recent swap agreements with African countries).

Is the dollar still at the heart of the international monetary system?

The rise of the euro has had very little impact on the status of the dollar, which continued to bolster its role as the dominant currency in the 2000s and 2010s. With globalisation came the emergence of new international trade players, primarily China, coupled with the widespread development of global value chains. These new trading countries tend to run current account surpluses which are largely denominated in dollars, both in the official sector (notably reserves) and in the private sector. This demand for safe dollar-denominated assets has increased as emerging economies have grown in size, and is generating a new Triffin dilemma (see Bussière et al., 2020). Moreover, the dollar is widely used in international transactions due to the existence of dollar-denominated benchmark indices, especially in the oil market, and dollar-denominated value chains, such as in the aeronautics industry.⁴ The dollar’s role in international transactions generates high volumes of spot and hedging activity in foreign exchange markets. Exchanges between two currencies are thus often carried out via the dollar, owing to the US currency’s liquidity. For example, an exchange of euro into Swiss francs may be carried out in two stages (“triangulation”), with the euro being converted first into dollars, and then the dollars into Swiss francs. The use of the dollar as a transaction currency and unit of account also creates a need for the dollar as a reserve currency. The dollar thus accounts for more than 60% of foreign exchange reserves and international debt, more than 50% of international loans

C3 US dollar nominal effective exchange rate during the 2008 and 2020 crises

(start of each crisis = 100)



Source: Bank for International Settlements (BIS).

Note: X-axis: number of weeks since the start of the crisis.

and deposits, and more than 40% respectively of the total value of currency market transactions and the total value of payments, according to SWIFT.⁵

The 2008 and Covid-19 crises also served to bolster the dollar’s primacy. In both cases, the US currency was regarded as a safe-haven currency amidst the global turmoil, as demonstrated by its appreciation in value (see Chart 3): in nominal effective terms, it gained more than 10% in the ten weeks following the Lehman Brothers collapse, and has risen by 6% since the start of March 2020. This is all the more a testament to the dollar’s status given that the US economy was in both cases severely affected – in the 2008 financial crisis, which originated in the United States, and in the 2020 financial and economic crisis linked to Covid-19. Crucially, the dollar’s position was supported by the actions of the Fed, which ensured that dollars kept flowing around the world. During both crises, the Fed set up currency swap agreements with the major central banks, including those in emerging economies: in the case of the Covid-19 crisis, which created tensions in dollar-denominated financing, these swap agreements, some of which had already been set up in the previous crisis, covered the ECB, and the central banks of Canada, the United Kingdom, Japan, Switzerland, Australia, Brazil, Denmark, South Korea, Mexico, New Zealand,

⁴ These factors have been highlighted by the European Commission’s consultations on the use of the euro in these sectors.

⁵ *The International Role of the Euro*, ECB (2019).



Norway, Singapore and Sweden. In 2008-09, the swap agreements amounted to nearly USD 600 billion, while in the current crisis they amount to around USD 450 billion. In response to the Covid-19 crisis, and alongside these swap agreements, the Fed has also set up a repo facility which is open to all central banks holding an account with the Federal Reserve Bank of New York (the FIMA Repo Facility).

However, current US foreign and trade policies are not conducive to supporting the dollar's international role. Donald Trump's protectionism is reducing the country's trade openness, which is one of the main determining factors behind a currency's international status. Moreover, the use of extraterritorial sanctions or compliance rules, based in part on the role of the dollar, has led some central banks to diversify their foreign

exchange reserves and boost their euro holdings. The Covid-19 crisis could also call into question other factors on which the dollar's primacy is based, such as the importance of global value chains. In addition, technological developments tend to reduce the benefits of network effects, and make it cheaper to use more than one currency for transactions and investment. Even though its weight in the global economy is likely to decline, the euro area could take advantage of its attachment to multilateralism, and its trade and financial openness to develop the international role of the euro. This could facilitate the transition to a more diversified, multipolar international monetary system. However, achieving this will require the implementation of appropriate policies (see also "Why and how to develop the international role of the euro?", Bussière et al., June 2020).

References

Bénassy Quéré (A.) and Cœuré (B.) (2010)

"Le rôle international de l'euro : chronique d'une décennie", *Revue d'économie politique*, Vol. 120, No. 2, pp. 355-377.

Bordo (M. D.) (2017)

"The Operation and Demise of the Bretton Woods System: 1958 to 1971", *NBER Working Paper*, No. 23189, February.

Bordo (M. D.) and Eichengreen (B.) (2008)

"Bretton Woods and the Great Inflation", *NBER Working Paper*, No. 14532, December.

Bussière (M.), Lecat (R.) and Vidon (É.) (2020).

"Why and How to Develop the International Role of the Euro?", *Banque de France Bulletin*, No. 229/7, May-June.

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Desécures (M.) and Pouvelle (C.) (2007)

"Les enjeux de l'euroisation dans les régions voisines de la zone euro", *Banque de France Bulletin*, No. 160, April.

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Eichengreen (B.) and Flandreau (M.) (2010)

"The Federal Reserve, the Bank of England and the Rise of the Dollar as an International Currency, 1914-1939", *BIS Working Paper*, No. 328.

Eichengreen (B.), Mehl (A.) and Chițu (L.) (2018)

How Global Currencies Work: Past, Present, and Future, Princeton University Press.

European Central Bank (ECB) (2002)

The International Role of the Euro, August.



ECB (2019)

The International Role of the Euro, June.

Goulard (S.) (2020)

"The International Role of the Euro", *Banque de France Bulletin*, No. 229/5, May-June.

[Download the document](#)

Hartmann (P.) and Issing (O.) (2002)

"The International Role of the Euro", *Journal of Policy Modeling*, Vol. 24, No. 4, pp. 315-345.

Ilzetzki (E.), Reinhart (C.) and Rogoff (K.) (2020)

"Why is the Euro Punching Below its Weight?", *NBER Working Paper*, No. 26760, February.

Lamy (P.), Desmettre (S.) and Busson (H.) (2012)

"Pourquoi l'euro ?", *Regards croisés sur l'économie*, No. 11, pp. 12-22.

Le Héron (E.) (2015)

"L'euro, une monnaie incomplète : retour sur les ambiguïtés du compromis historique, politique et idéologique lors de la création de la BCE", *Économie et institutions*, No. 22.

Lindert (P. H.) (1969)

Key Currencies and Gold, 1900-1913, Princeton University Press, Department of Economics, "Princeton Studies in International Finance", No. 24.

Mehl (A.) (2015)

"L'euro sur la scène internationale après la crise financière et celle de la dette", *Revue d'économie financière*, Vol. 3, No. 119, pp. 55-68.

Triffin (R.) (1960)

Gold and the Dollar Crisis, New Haven, Yale University Press.

Published by
Banque de France

Managing Editor
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ISSN 1952-4382

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