Can the Capital Markets Union deliver?

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Summary: Compared to the U.S., the euro area has been underperforming in the wake of the Great Financial Crisis (GFC). This holds especially true for peripheral euro area economies. Whereas the U.S. is characterised by a financial system dominated by arms' length (capital-market oriented) interaction between providers and users of funds, in Europe, in many cases, bank intermediation dominates. However, fragile, capital-constrained banks also meant a curtailed supply of funds, an issue especially for bank-dependent small or medium-sized firms (SMEs). Hence, it appears more than evident that easing the access to capital markets (in particular through securitization) should support medium-run growth perspectives, especially in peripheral euro area economies, those worst hit. There might, however, be structural (economic) reasons why SMEs prefer (local) bank relationships. Given substantial underlying idiosyncrasies, placing SME debt, in collateralised form, on capital markets has proven difficult. Finally, the strong emphasis put in the CMU project on disintermediation comes with side-effects. National systems of finance are often part and parcel of an institutional landscape with internal coherence. Reengineering finance is therefore more than a parametric adjustment, calling for political debate.

Zusammenfassung: Die Eurozone hat sich langsamer von der Finanzkrise erholt als die USA. Dies gilt insbesondere für die Volkswirtschaften am Rande des Währungsgebiets. Während die Vereinigten Staaten ein Finanzsystem haben, in dem sich Investoren und Geldgeber überwiegend auf anonymen Kapitalmärkten koordinieren, dominiert in Europa die Koordination von Sparern und Kreditnehmern über Banken. Sind Banken allerdings angeschlagen und kapitalarm, können sie nur eingeschränkt Finanzierungen anbieten. Dies stellt insbesondere für bankabhängige kleine und mittlere Unternehmen (KMU) ein Problem dar. Um die mittelfristigen Wachstumsperspektiven, insbesondere in den am stärksten von der Krise betroffenen Peripheriestaaten des Euroraums, zu fördern, scheint es folglich naheliegend, den direkten Zugang zu den Kapitalmärkten (insbesondere durch Verbriefungen) für Unternehmen und Sparerinnen und Sparer zu erleichtern. Dabei wird

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allerdings übersehen, dass es handfeste wirtschaftliche Gründe sind, die KMU dazu veranlassen, ihre Finanzgeschäfte über (lokale) Banken abzuwickeln, anstatt anonyme Kapitalmärkte zu nutzen. Beispielsweise hat sich die Platzierung von KMU-Schulden in besicherter Form auf den Kapitalmärkten als schwierig erwiesen. Zu groß sind die Eigenheiten dieser Unternehmenskategorie und zu wenig standardisierbar ihre Schulden. Die im Zuge der Kapitalmarkunion angestrebte Disintermediation hat Nebenwirkungen. Nationale Finanzierungssysteme sind oft Teil einer institutionellen Gesamtstruktur mit interner Kohärenz. Die beabsichtigte Umgestaltung der Finanzsysteme ist daher viel mehr als nur eine parametrische Anpassung. Die politische Debatte darüber ist längst überfällig.

1 Capital Markets Union: a long-term EU desideratum

A deeper integration of the (still) 28 EU capital markets and, most importantly, a stronger emphasis on capital-market based funding are chief objectives of the attempts at creating a Capital Markets Union. The 'union' notion is not meant to be symbolic, a mere qualifier. Instead, it stands for the cross-border, market integration dimension. It also builds on – complements – efforts at making Europe's financial architecture more resilient. A prime example is, of course, the banking union. This union was also a lesson drawn from the fall-out of the Great Financial Crisis and, even more blatantly, the European peripheral debt crisis. These crises led bare – memoranda of understanding and committees (of European Bank Supervisors) notwithstanding—substantial cross-border coordination problems. Initial efforts at redesigning the institutional landscape, creating a network of European Supervisory Authorities, based on the de Larosière Report, had proven insufficient. It needed however an existential threat to the Eurosystem to advance. Banking union, though not yet completed, has at least europeanised the supervision of the euro area's large banks.[1]

Hence, one could understand CMU as a logical next step in the attempts at completing the euro area, buttressing in particular its monetary union which would undoubtedly benefit from less institutional heterogeneity. Moreover, the ultimate objective of the CMU endeavor—supporting the access of SMEs to external funds in order to boost growth and employment—, of course, deserves support. An enlarged opportunity space for ultimate savers should allow for better allocation of funds, a more robust diversification of risks as well as higher, risk-adjusted returns.

Still, the CMU project raises a number of questions: Is the Green paper's diagnosis (EU Commission 2015a) correct according to which the euro area has been lagging behind the U.S. in the wake of the crisis mainly as an upshot of its too strong reliance on bank intermediation? Would, more specifically, an environment characterised by more arms' length finance ameliorate access problems of small and medium-sized firms? What additional consequences would such a redesigning of Europe's financial landscape engender? Ultimately: Will a stronger emphasis on capital markets deliver on its promises?

Interestingly, in the late 1990s, we had a similar debate around the Financial Services Action Plan. And, of course, ever since the Treaty of Rome of 1957, the integration of Europe's capital

1 Still under construction or in a build-up phase is the Single Resolution Mechanism and particularly contested is the third leg, the European Deposit Insurance System. Both leave, of course, the door wide open for uncertainties about the de-coupling of sovereign from bank risks, a core objective of this effort.

markets has been a chief objective of economic policy. In 1966, the Segré Report anticipated to a large degree subsequent (de-)regulatory initiatives which finally ushered in the White Paper approach of 1985. And, over time, the orientation on the U.S. model became a Brussel's North Star. For example, when deliberating in 2003 on the Transparency Directive (one of the 42 Directives launched with the FSAP), the EU Commission suggested in an explanatory note submitted to the European Parliament to pursue "the overall goal [of] moving towards more capital market oriented thinking".

It would be easy to multiply examples documenting this long-standing preference for a reorientation of Europe's financial systems. Of course, one does not have to find fault with this per se. Rather generally, market completion should be welfare enhancing. What is important, however, is to understand whether real financial markets—defined by externalities, asymmetric information and the attendant agency issues as well as market power—do perform in the way supposed, in particular when compared to functional substitutes.[2]

Our brief note is organised along the following line. First, we briefly summarize the CMU diagnosis as well as proposals derived from there. Then we discuss how far securitisation—a preferred tool of CMU—can contribute to a better access of SMEs to external finance, this includes pondering its structural limits. Implicit in the CMU perspective is a binary characterisation of financial markets and institutions—being either bank- or capital market-oriented. In reality, however, banks are of course deeply intertwined with markets. And capital markets crucially rely on institutions. Direct—non-intermediated—matching between final savers and ultimate users of funds is, obviously, a rare phenomenon. Still the CMU project shows a strong preference for fewer institutions and more markets. Finally, we raise the issue of complementarity between financial and other societal systems. From a political economy perspective, such institutional inter-linkages are important. They also point at trade-offs which more homogeneity (less institutional variety) might imply.

2 CMU: diagnosis and remedies

Reducing barriers to the cross-border flow of funds is, of course, a longstanding objective of the Europe Community (Union). Market integration should bring substantial (static and dynamic) benefits for households as well as non-financial firms. The former should gain from more attractive investment (and financing) opportunities at lower cost and with broadly diversified risk. The latter, concurrently, should also have an improved access to funds, be it debt or equity, also at lower cost. This would imply reduced hurdle rates and higher capital expenditures.

A wider market spells more intense competition. It also means economies of scale which translate into decreasing average costs. This should reduce intermediation margins, the wedge between what ultimate savers receive and final investors (in real capital, equipment and structures)

2 Quite obviously, after the GFC numerous economists have come to a less benign assessment. Luigi Zingales (2015), for example, writes of "an inflated view of benefits of finance" and Benjamin Friedman (2010), who always had a sober view of vaunted benefits of financial innovations, calls for a fundamental reassessment, including "trading activity that absorb large amounts of resources, and expose the economy to serious risks, but clearly serve little economic function".

pay. More specifically, in the case of financial markets, they should become deeper and broader, that is, liquidity should improve.

2.1 The Commission's stock taking

Most importantly, the CMU should "unlock investment in Europe's companies and infrastructures ... But to strengthen investment for the long term we need to build a true single market for capital" (EU Commission 2015a: 3). Ultimately, this should serve the Commission's priority—supporting jobs and growth.

Against this background, it is evident that the CMU project is a "key initiative in the work program of the European Commission" (EU Commission 2015b: 7). It should in particular address a major shortcoming of EU's financial system (as diagnosed by the Commission)—a too strong reliance on bank-intermediated finance. The financial crisis has shown, according to the Commission, that this reliance has been "impeding growth and holding back recovery" (EU Commission 2015b: 9).[3] In the same vein, households (savers) should be encouraged to make more use of equity products and as well as giving up on their home bias when investing.

In a comprehensive Staff Discussion Document (EU Commission 2015b: 9) the background analysis to these proposals are detailed. The preference given to a stronger market-based orientation arises from three main observations: While no unambiguous causal relation between financial system and growth could be established, high volumes of outstanding credit relative to GDP put a damper on growth. Credit bubbles are also a major source of financial instability (EU Commission 2015b: 9). Secondly, market-based systems appear to recover more swiftly from crises, in particular when they are touched off by a banking crisis. It often takes longer to work out non-performing loans. Banks have an incentive to evergreen loans which are not correctly served. And, finally, at higher stages of economic development, the "optimal financial structure shifts towards capital markets".

2.2 ... and challenges, as seen by the Commission

The objective is to "move the EU closer towards a situation where, for example, SMEs can raise financing as easily as large companies; costs of investing and access to investment products converge across the EU; obtaining finance through capital markets is increasingly straightforward; and seeking funding in another Member State is not impeded by unnecessary legal or supervisory barriers" (EU Commission 2015a: 4).

Those are purposes it is hard to take issue with. Who could oppose deeper integration, unimpeded by barriers? Or how could one justify "unnecessary" legal barriers?

In its Green Paper, the Commission lists challenges as they arise from "historical, cultural, economic and legal factors, some of which are deep-rooted and difficult to overcome". They include "... the historical preference by business for certain means of financing, the characteristics of pension provision, the application of prudential regulations and administrative hurdles, aspects

3 Obviously, this does not hold for "bank-based" Germany. And Germany is not a sample of one. A number of euro area economies performed alike, all bank-based (more or less). There must be compounding variables with a significant impact.

of corporate governance and company law, data gaps and features of many tax systems, as well as inefficient market structures" (EU Commission 2015a: 9).

Quite obviously, as this list shows, those are by no means innocuous frictions or minor details. While they imply potentially differential costs in terms of access to funds, they belong to the defining characteristics of nation states (think of corporate governance, Mitbestimmung, for example).[4] Reflecting historical compromises between conflicting interest groups, they will show persistence.

The Commission mentions three priorities for early action: improved access to risk capital, in particular for SMEs; boosting flows of institutional and retail investors into capital markets and deepening the integration of these markets.[5] Again, these are apparently points which can rightfully garner broad support. But then one wonders why subsequent to the GFC fragmentation came about and why reduced level of integration (when measured in terms of volumes of cross-border flows) has to be assessed, unequivocally, as a welfare loss.

The Commission documents in EU Commission (2017a) that a major part of this dis-integration can be explained by reduced activity in interbank money markets within the euro area. Thus, what we see here, is reduced cross-border (intra euro area) activity in non-collateralised interbank lending which before the crisis used to fund predominantly investments in real estate (and other non-tradeables), a root cause of the malaise some euro area peripheral nation states still are struggling with. The new level of integration could just as well be interpreted as a new assessment of risks, probably justified by the current state of EMU (its incompleteness). The integration of money markets we had seen before was, at least ex post, only possible with a significant under-appreciation of credit risk as well as an insufficient differentiation of risk premia.

3 CMU challenges

As already mentioned, the Commission addresses a number of potential challenges to their project. Here we focus on two which we deem important. First, we discuss reasons why SMEs are reluctant to use capital markets or why investors do not find investing in SME equity or debt, even when used as collateral, attractive. Secondly, we raise questions with regard to the proposal that households should participate more actively in capital markets and provision for retirement should rely less on pay-as-you-go and more on capital funding. Obviously, these are debates with a long history. We just want to illustrate that these factors are indeed deep-rooted and potentially for good reasons in place.

4 Hall and Soskice (2001) have launched the highly instructive literature on "varieties of capitalism", demonstrating complementarities in organisational modes between societal sub-systems. They distinguish between coordinated market economies and liberal market economies. In the latter, vocational training schemes do not exist. They do not easily fit with a financial system dominated by capital market prerogatives, i. e. focused on private benefits exclusively. At the same time, one of the root causes of Germany's comparative success has been found in its way of accumulating human capital. Therefore, reengineering capital market is more than—redesigning the financial landscape.

5 In its mid-term review of the CMU project (EU Commission 2017: 11–12), the Commission documents with the help of price and quantity-based indicators how integration decreased subsequent to the financial crisis.

3.1 SME financing is special

SMEs are opaque, highly information-impacted. They are also highly idiosyncratic. This comes with substantial information issues. Information about a particular SME is unevenly distributed. "Credit is highly individual, and the information relevant for providing the credit highly specific ... indeed most of the information is not easily transferable or 'marketable'. It is hard to codify, often tacit in nature" (Greenwald and Stiglitz 2003: 30). Lenders are therefore at an informational disadvantage. Ex ante, they might choose an unattractive prospect or have, ex post, difficulties in controlling a debtor's behavior (with covenants). Given that banks accumulate knowledge and experience in dealing with adverse selection and moral hazard, they economize on costs of screening and monitoring, relative to anonymous markets. Banks can be seen as "social accountants" (Stiglitz and Weiss 1990), assessing as well as investing in claims against information-intense debtors.[6]

These information issues thus imply that SMEs almost never sell bonds in capital markets. An important reason is of course that, given the fixed cost of issuing (think of fees in investment banking) and the relatively small amounts of funds demanded, such bonds would be too expensive. For the same reason they would also be very illiquid. Assets where prospective investors face the risk being taken advantage of since they lack information, fetch high liquidity risk premia. "What is required for liquidity is symmetric information about the pay-off ... so that adverse selection does not impair the market" (Holmström 2015: 5).

To be liquid, debt markets hence require what Holmström calls a "blissful state of symmetric ignorance". For mortgages, with largely standardised features, this is not difficult to engineer. Pfandbriefe and covered bond markets (also with dual recourse and backed by largely homogenous assets with a secondary market) testify to this. However, a bundle of ("sliced and diced") credit claims against SMEs, as collateral for asset-backed securities, is much more difficult to assess. Information asymmetries are abound, especially in less beneficial economic circumstances ("bad states"). Under such circumstances, these assets abruptly become illiquid, whatever amount of purported over-collateralisation existed beforehand.

Pre-GFC, there appeared to be almost no limits to securitisation. And baskets of risky bank loans or high-risk bonds (Collateralised Debt Obligations) seemed irresistibly attractive. Meanwhile, however, some of these CDOs go under the name "toxic waste". Securitisation can only go so far. It finds its limits in the difficulties of standardisation, the pertinence of private information and issues of moral hazard which are abound in a sliced-up intermediation chain, since that is what securitisation is all about: a deconstruction of the lending and funding function (Greenbaum et al. 2016, Kotz 2005).

3.2 Emphasis on capital markets in lieu of banks

The CMU's basic orientation is to put an emphasis on the more direct intermediation between ultimate savers and final investors, tilting the balance away from banks. This debate is characterised by a certain amount of fads and cycles. In the late 1980s/early 1990s—in the face of a lackluster productivity performance in the U.S. economy—U.S. analysts pondered the question about ways

6 See for an excellent overview, Martin Hellwig (1992).

how to import continental European financial market institutions. In fact, the "operation of the entire capital investment system" was perceived as a "capital disadvantage", leading U.S. companies to "invest at a lower rate with a shorter time horizon than German or Japanese competitors" (see Porter 1992: 65 and 67).

Anyways, from a comparative institution perspective, an emphasis on capital markets, would only enhance general welfare if markets were, on average, better than intermediaries (see for example Allen and Gale 2000). This is not a given. Clearly, capital markets do not seem to be always working in a functionally efficient way, i. e. reflecting fundamental values. Indeed, there is a voluminous literature making us aware of all sorts of anomalies—as seen from the perspective of weakly efficient markets (see for example Shleifer 2001).

As concerns the vaunted search for liquidity: An optimal market allows for trading in an environment generating accurate prices at low cost. And the ability to buy and sell into a market without moving the price, that is: (market) liquidity, is a defining attribute of such a good market. However, while for those being in the business of competing for order flow, the maximum volume of trading is just the optimal one, we actually do not have a solid theory which would allow us to tell, from a societal/welfare economic point of view, what the optimal amount of liquidity is.

Most importantly, from a functional perspective, markets should be informationally efficient, thus reflect pertinent knowledge about the expected trajectory of the asset traded. A well-functioning capital market thrives on four requirements: an accurate information basis, a broad base of investors, a robust protection of their rights and, finally, deep and liquid secondary markets (see D'Avolio et al. 2001). (Incidentally, here it becomes immediately obvious that those are high hurdles for SME debt.)

Unfortunately, however, these four prerequisites, while being sufficient for delivering technical efficiency, do not guarantee that markets are performing in a functionally appropriate way (see on this James Tobin 1984). Basically, the purpose of financial markets (and functional substitutes like credit institutions) is (a) to mobilize savings and channel them to their most productive uses as well as (b) to pool risks and thus provide for an insurance function—both at lowest cost possible. Their capacity to serve those purposes is what Tobin called functional (as opposed to technical) efficiency.

3.3 … is equivalent with more non-bank banking

CMU, if successful, will also mean an increased share of nonbank banks in intermediating between savers and investors.[7] Banking can be performed in many guises (see for the following Kotz 2017). And these activities are regularly performed in those environments which are regulatory less intrusive. Those are habitats were profitability is higher. And much of financial innovation is exactly about this search for the least burdensome environment—an activity with doubtful social usefulness (van Horne 1985).

7 Banks are information processors discharging a role as social accountants (Stiglitz and Weiss 1990). Rating agencies perform a similar role, however, with a lower degree of commitment. They do not invest in their assessments. And they are regularly challenged in crises times (see Kotz and Schäfer 2013).

Therefore, ideally, financial market regulation should be focused on functions, the ultimate source of externalities which give reason to interfere. This would amount to an activity-focused, institution-neutral regulation. The CMU project, starting from the diagnosis of over-banking, however intends to tilt the playing field against a particular institution. Nonbank banks—or shadow banks—are often engaged just in plain banking, however, often less regulated and supervised. This is the reason for their comparative attractiveness to their users. They regularly do not account for potential social costs. As a result, a gap between private and social benefits might arise.

These institutions or markets (think of repo markets) also do not have access to central bank liquidity backstop facilities. This feature makes them vulnerable to sudden, massive withdrawals; runs in this wholesale space take the form of not rolling-over. Insured depositors have no reason to invest in assessing banks' creditworthiness. At the same time, this backstop (or put option) is a systematic incentive for banks to take larger risk exposures. Therefore, institutions—i. e. banks—with access to such backstop options should be regulated and these rules need to be properly enforced (see for example Freixas and Rochet 1998 or Greenbaum, Thakor, and Boot 2016).

Much of the reform efforts ever since the GFC therefore focused on securitisation and repo funding. Nonbank banks had proven vulnerable to runs, generating contagious negative externalities across the financial industry. The guiding idea was to have comprehensive regulation—with the same perimeter as the market failure to be mitigated.

CMU, a bit counterintuitively, wants to install a bias in favor of more nonbank banking. Admittedly, the Commission is aware of this, insisting that its approach is about creating a "sustainable EU high quality securitisation market relying on simple, transparent and standardised securitisation instruments" (EU Commission 2015a: 10).

3.4 Pensions and the development of a European capital market

Finally, to emphasising a capital markets orientation in Europe, the reorientation of the funding of Europe's pension systems is required. This is a point the EU Commission stresses again (as it has often done, long before the debates about CMU). Without a stronger involvement of households in capital markets, Europe will be lagging behind, so the argument goes.

Now, the ultimate purpose of pension funding is a reliable funding of retirement income, not developing European capital markets. Only insofar as capital markets contribute to this ultimate objective, future retirees might take an—indirect—interest in their development. It is, however, not at all clear, whether a funded retirement system, relying on investments in stocks and bonds, is dominating the pay-as-you go system. In fact, when comparing the two systems from a theoretical angle, one ends up with equivalence theorems and, therefore, arguments for a diversified system.

The return on a (mature) pay-as-you-go system equals, as Paul Samuelson has shown in 1958, the growth in employment plus the gain in real wages, which, over the long haul, should equal the trend growth of GDP. The return on investments, on the other hand, equals roughly the real rate of interest, which cannot evolve too far away from the growth of real output either. In both systems, therefore, future retirees hold an option: a claim on a future GDP, yet to be generated. "Financial Archeology", as practiced by Philippe Jorion and William Goetzmann, documents that between 1921 and 1996 the best performing market—the U.S. stock market—produced a

4.3 percent annualised return.[8] This was a bit more than a pay-as-you-go system could deliver; it was not, however, dramatically higher. On the other hand, and most importantly, collective insurance schemes have been more stable. (And, from an investor's, and, in particular, a retiree's perspective, it is risk-adjusted returns that count.)

The actual outcome of a retirement savings plan, as a result of the variability of financial market returns, is largely driven by the time period during which one invests—that is, by luck. A defined-contribution plan carries a substantial shortfall risk. The return is dependent on the moment one disinvests. That is exactly the major advantage of a pay-as-you-go system, because it makes it possible to spread risk over a larger population as well as over time. Through a "generational contract" it allows for time diversification, something that is beyond the individual capacities of us mortals. In a similar vein, Burtless (2000) has shown that financial market risks in a funded system are possibly too large to assume privately. Replacement ratios of investment plans, simulated by Burtless against the trajectory of the U.S. market, were largely dependent on the timing.[9] While achieving, on average, a replacement ratio of slightly less than 50 percent, the lowest ratio was 20 percent, whereas the most-lucky (virtual) generation (retiring in the mid-1960s) achieved a pension that amounted to a bit more than earnings before retirement.

4 Conclusion

As Gary Burtless writes "… the main issues dividing supporters and opponents of privatisation (of the retirement system) hinge on political rather than economic considerations." This holds true for many of the challenges to CMU which the EU Commission lists. They are not innocuous technical details, frictions. They come with unavoidable side effects which imply societal losses.

In other words, there are trade-offs which have to be acknowledged.

Does this mean that we are back to square one? Not really; developments in financial markets are not the mechanical upshot of technological change. Of course, such factors have an impact. At the same time, politics is arguably an important driver. Thus, to end in a rather old-fashioned mode, any large scale reengineering project with societal consequences should be exposed to an enlightened public debate.

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8 See Jorion and Goetzmann (1999). Their central result is that one falls prey to a selection bias if one does not account for the evolution of other markets, much less favorable.

9 According to this plan workers save 6 percent of income for forty years, reinvesting all intermittent investment income (dividends or interest payments) and convert the accumulated savings upon retirement into a fair annuity. See Burtless (2000); see also Diamond (2000).

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