

BBVA's position on the 'evaluation of the effects of financial regulatory reforms on infrastructure'

Madrid, August 2018

General messages

The BBVA Group welcomes the opportunity to respond to the consultative request document on 'Evaluation of the effects of financial regulatory reforms on infrastructure finance' from The Financial Stability Board (FSB).

Argentinian G20 presidency prioritizes the private infrastructure finance ("IF") development by improving the environment for infrastructure projects. This is very important for economic growth, especially for developing countries. Accordingly, the Banking regulatory architecture could impact the ability of Financial Institutions to engage in infrastructure finance.

The FSB Report offers a comprehensive review of these issues and provides a good base for better understanding trends in the financing of IF regulatory constraints.

BBVA **generally supports the FSB's position and provides** ideas that could complement and enrich the document.

1. The document takes a too general approach to the IF sector, taking into account only two compact markets (AE and EMDE). Although developed and developing countries may have certain elements in common within each group, each country has its own specific characteristics. In our experience, the local law of each specific country highly impacts IF development. This issue has been barely touched in the study and it has a tremendous impact in terms of many EMDEs' ability to implement major infrastructure projects.
2. Regulatory reform is a necessary but insufficient condition for boosting private infrastructure financing. Other factors need to be taken into account for financing solutions.
 - Separate demand risk projects from availability projects
 - Separate greenfield projects (i.e. construction) versus brownfields (i.e. either refinancing or existing projects privatized/tendered by the State)
 - Soft contractual and legal structure
 - When it comes to projects in EMDEs, whether the project is structured in hard currency (i.e. USD or Euro) or in the local currency is a most relevant factor,
 - Currency volatility and illiquid capital markets, which create challenges in the hedging of currency risks.
 - Political risks

3. We disagree with certain general conclusions of the study.
 - The document seems to point out that there is a pipeline of infrastructure projects that cannot be implemented due to the absence of adequate financial solutions. Our experience shows that the current situation is dominated by an insufficient number of **good projects** (in particular, greenfield) coming to the market to quench the appetite of the financial markets (particularly in AEs).
 - The document does not seem to fully take into account the pace of regulation implementation in each country and, therefore, how each market is reacting to specific regulation.
4. Search for yield has been one of the main drivers of the IF in recent years both for banks and institutional investors; If infrastructure assets have high yields, it could compensate financial players (i.e. banks or investors) with regard to regulatory constraints, i.e. higher capital charges, complexity of monitoring deals and the relative illiquidity of the product. Other factors to be taken in account are the ability of IF to provide maturities capable of matching the duration of their liabilities (i.e. Insurance Companies and Pension Funds), stable and safe credit risk, etc.
5. The implementation of the IFRS9 accounting rule will have an impact on financial institutions' investments in infrastructure projects, as these investments increase the volatility of the P&L account.
 - Firstly, in the new impairment model, the classification of the investment as sub-performing (based on a forward-looking assessment) implies the recognition of expected credit losses at all times, which particularly impacts long-term investments.
 - Secondly, the classification and measurement approach, which determines that instruments that do not pass the SPPI (solely payments of principal and interest) test have to be measured at fair value through P&L.
 - Impact on IF from Solvency II comes from two main points; (i) the capital requirement for credit spreads depend on the maturity of the instrument, and (ii) Solvency II (after the amendment on June 2017) recognizes only the low risk profile of certain infrastructure projects (that meet the requirement for qualifying infrastructure corporate investments).
6. We believe consideration should also be given to the effect of global banking groups subsidiaries in third countries. When applying capital requirements at a consolidated level, the prevalence of the parent country's rules can create a competitive disadvantage for subsidiaries in third countries regarding their local peers.
7. In our opinion, it would be helpful to have a detailed analysis on the adequacy of capital requirements on IF in the Basel framework regarding the risk profile of these financial instruments. This analysis may be important for the EU to decide on the introduction of an adjustment to capital requirements for credit risk on certain specialized lending exposures, as included in the proposal for the amendment of the CRR by the European Commission. For insurers and pension funds, where capital requirements are not aligned to a global framework, a more detailed analysis of the impact of the different national regulations on IF would help analyze the impact of regulation on the capacity of insurers and pension funds for investing in infrastructure-related financial instruments.

BBVA's Position

IF trends

The objective of this note is to estimate the shortfall of MREL for a sample of European banks under different the countercyclical buffer (the Commission included this as part of the MREL Guidance, which was not a mandatory requisite).

In order to estimate the maximum impact, we have not applied any downwards adjustments to the recapitalization part of MREL. Although these continue to be allowed under the Council and the Parliament texts we assume they will not be significant for the banks under our sample.

Finally, we have assumed that banks will have to comply with their Pillar 2 Guidance (P2G) with CET1. For those that do not disclose that figure (the majority of them) we have assumed that P2G is equal to 1% of their RWAs.

1. Coverage: Does the document accurately describe the characteristics of IF provided by the financial system, including the key participants and financing instruments? Is there any aspect of IF that merits additional analysis?

We believe that the document is very comprehensive in its approach and methodology and, indeed, we have found the reading of the whole document most enlightening.

However, we feel that the document takes a too general approach to the IF sector as if there were only two compact markets (AE and EMDE), which is far from being the case.

- In our experience, gained over more than 20 years structuring infrastructure projects both in AE and EMDEs, there are other factors that need to be taken into account as they may have more than a material impact on the financing solutions needed for the IF to be successfully implemented:
- Separate demand risk projects from availability projects
- Separate greenfield projects (i.e. construction) versus brownfields (i.e. refinancing or existing projects privatized/tendered by the State)
- Soft contractual and legal structure
- When it comes to projects in EMDEs, whether the project is structured in hard currency (i.e. USD or Euro) or in the local currency is a most relevant factor,
- Currency volatility and illiquid capital markets, which create challenges for the hedging of currency risks.
- Political and regulatory risks

More generally, we disagree somewhat with some of the general conclusions of the study

- The whole document seems to be written on the basis that there is a raft of infrastructure projects that cannot be implemented due to the absence of an adequate financial solution.
- We honestly do not believe this to be the case. In our day to day experience on the ground, the current situation is dominated by an absence of sufficient projects (especially new greenfield projects) coming to the market to quench the appetite of the financial markets (particularly in AEs).

The report takes a hard view on the effects of new regulations but it does not seem to fully take into account the pace of regulation implementation in each different country and, therefore, how each market is reacting to specific regulation.

This may be partially set off by the market participants' anticipation of the inevitability of the regulation eventually occurring, but one should be careful to differentiate AEs and EMDEs as the anticipation factor is played out much more strongly on the former than on the latter.

2. Trends: Are the trends in IF presented in this report comprehensive? Are there other important trends that should be considered for inclusion?

This report analyses economic and social infrastructure assets that are fully or partially financed by the financial sector. The analysis focuses on new infrastructure debt financing (loans and bonds) in six different sectors and distinguishes between project and corporate finance. Section 2.3 and the data provided in Appendix A show a fairly comprehensive picture of recent developments in the various aspects of infrastructure financing market trends.

The following comments are subject to the availability of information:

1) To understand the information, there are a number of graphs (e.g. 2B, 4B, 5, 6, A6, etc.) with many lines that make it difficult to appreciate the trends being shown. Perhaps it would be good to group the information or show only the most relevant.

2) In general terms, the information contained in the charts is mostly shown in absolute terms (USD Billions). It would be interesting to have more information in relative terms (in percentage). The idea would be to answer questions such as:

- the weight of private infrastructure financing in relation to the total and how it has evolved.
- the weight of private infrastructure financing in dollars in relation to the total for other currencies and how it has evolved.
- the weight of loans in infrastructure financing in relation to other financing instruments and how it has evolved.

3) Although the paper presents the various regulatory frameworks affecting other Institutional Investors, it offers little information about them and their trends. One important issue is how they have related to the banking sector and multilateral banks in IF.

3. Project finance versus corporate finance: What have been the main factors that explain the recent growth in corporate relative to project finance in IF?

As usual in the project finance world, it is not easy to pin-point a clear reason for growth in corporate relative to project finance IF.

Having said that we believe that one main driver for such growth has been the high levels of liquidity we have experienced, leading to more than enough appetite for corporate deals at attractive prices and sufficiently long tenors in a market that has not penalized the implicit refinancing risk typically involved in such corporate-type deals.

In such a market, there has been less interest in project finance structures which, by definition, entail a higher level of contract and performance constraints.

Our main assumption is that there will be growth in project finance IF transactions, which should be in line with the regularization of the monetary policy in more developed economies.

4. Search for yield: How important has the global search for yield been as a determinant of the growth in IF in recent years? Has search for yield behavior been more apparent in specific sectors or regions?

Search for yield has been one of the main drivers of the IF in recent years both for banks and institutional investors. In the latter case combined with IF's ability to provide maturities capable of matching the duration of their liabilities (i.e. insurance companies and pension funds).

But even disregarding the long duration factor, there is no doubt that IF's ability to offer a stable and safe credit risk coupled with a rich premium over Government Bonds has more than compensated financial players (i.e. banks or investors) for higher capital charges, the complexity of monitoring the deals and the relative illiquidity of the product.

Actually, when looking at the Spanish market we observe an increase in the financial players' appetite for IF by the reduction in the yield of Spanish Government bonds. While many other factors different from yield may have influenced the growth in IF, the surge in interest has been so significant that it is difficult to oversee the fact, especially when considering that Spain did not lose its IG status at any time (as opposed to Portugal, which, coincidentally, is experiencing quite a similar case now that the country has regained its IG status with Government yields in steep decline).

As for sectorial or regional differences when it comes to yield search, macroeconomic and financial conditions impact IF. For example, the monetary environment has been highly accommodative in certain countries and some countries may have materially rebalanced their infrastructure activities on fiscal policy grounds. Moreover, given low risk-free rates and the compression of risk premium across the investable universe, infrastructure assets are seen as attractive (particularly in EMDEs).

There is no denying that we should not forget IF's ability to offer diversification and higher yields than more traditional asset classes, and insurance companies, pension funds and asset managers have adjusted their strategic asset allocation in their search for yield. All these shifts and changes could impact AEs and EMDEs in different ways.

5. Trends for IF in AEs vs EMDEs: Has the trend in IF volumes been more muted in EMDEs than in AEs since the global financial crisis? If so, what are the main reasons for different trends across regions, and where (if anywhere) does financial regulation feature as a reason?

As stated above, we strongly believe there is no clear case to be made for a simplified categorization of IF into AE and EMDE as there are stark differences between countries in both groups that belie the case of a simplified division of the world into two separate camps.

In our opinion the search for IF by sponsor and financier alike is well documented across all regions. The differences in levels of activity which, as you rightly point out, may be significant, can be attributed to a number of different factors such as:

- Local regulation regarding the concession agreement and respect for contractual rights
- Availability of financing in the relevant currency (i.e. frequently in local currency although it is not always the case)
- Relevant capabilities of local players in the public and private sectors to execute and implement complex contractual structures such as those need for successful IF to take place
- Political and regulatory risks

- Empowerment of public administrations to implement the legislation needed for IF which, as per our Latin American Experience, should not be taken for granted

In short, one can argue that, in absolute terms, AEs have been more active in the market (i.e. they started from a higher base) but not in relative terms (i.e. we have seen a roughly equivalent surge in the interest of sponsors and financiers in EMDEs). On the other hand, there is no denying that the much-vented catch-up of EMDEs with AEs has not taken place, with very limited exceptions (i.e. Middle East, India and, in Latin America, Chile).

All in all, as we have said above, the last few years have been more a story of missed opportunities regarding the Public Administration's ability to launch a new project which has, partially but not completely, been compensated by the refinancing of existing projects to take advantage of favorable market conditions in terms of tenors and pricing.

Financial regulations

6. Regulation vs other factors: How do the financial reforms rank relative to other factors (e.g. macroeconomic and financial conditions, political risks, institutional impediments) in terms of their influence on IF?

We somehow believe that trying to come up with a clear-cut separation of the effects attributed to each of the factors defined above may go beyond the reach of any market participant in IF.

The truth is that the market is very diverse (not only in terms of different sectors and countries, but also in terms of different projects belonging to the same country and sector) and therefore it is not possible to track down the particular effect of each factor.

Despite this, our opinion is that the effect of regulation which, is bound to be material in the long run, is being muted by the imbalance between supply and demand (i.e. there is much more interest from sponsors and financiers to participate in the infra market than actual projects to be financed, whether greenfield or brownfield).

The report has rightly mentioned a few results of the regulation (shorter maturities, lower participation of banks versus market-based financing) and we anticipate that such effects will tend to accelerate over time even if new regulations are now introduced.

7. Relevant reforms: Are Basel III and OTC derivatives market reforms the most relevant G20 reforms for IF? Which other reforms may also be relevant for the purposes of the evaluation? Please elaborate.

The implementation of the IFRS9 accounting rule will have an impact on financial institutions' investments in infrastructure projects, as these investments increase the volatility of the P&L account.

Two provisions of the IFRS9 rule provokes this increase in P&L volatility: Firstly, in the new impairment model, the classification of the investment as sub-performing (based on a forward-looking assessment) implies the recognition of expected credit losses at all times, which particularly impacts long-term investments. Secondly, the classification and measurement approach, which determines that instruments that do not pass the SPPI (solely payments of principal and interest) test have to be measured at fair value through P&L.

Another piece of regulation that has had an impact on IF is Solvency II. The impact comes from two main areas; (i) the capital requirement for credit spreads depends on the maturity of the instrument, and (ii) Solvency II (after the amendment of June 2017) recognizes only the low risk profile of certain infrastructure projects (that meet the requirement for qualifying infrastructure corporate investments).

8. Transmission channels: Are there any major transmission channels in terms of the effects of financial regulation on IF that the evaluation has not considered?

We understand all major transmission channels have been considered in the analysis, which therefore makes it very comprehensive.

A possible extension of the exercise would be to include the interaction of the banking sector with the public sector, which is one of the main agents in the infrastructure market. Aspects such as the regulation of the banking holdings of sovereign debt or the development of Sovereign Bond Backed Securities could affect the availability of funds for the public sector and, therefore, its ability to participate in the infrastructure sector.

Additionally, one of the transmission channels considered, the regulation of the OTC market, could change in a very substantial way in the near future as a result of Brexit. The London Clearing House (LCH) leads several key markets. For example, regarding interest rate swaps according to Clarus as of December 2017, LCH SwapClear had >90% share in CAD, EUR, GBP and USD. The impact of Brexit depends on the final agreement: (1) an equivalence regime for UK clearing houses seems out of the table, which would cause higher capital requirements as assets would be treated as exposures to corporates and banks would be in breach of the mandatory clearing obligation for certain derivatives (2) an enhanced supervision by EU authorities is still being discussed and (3) a forced relocation to EU clearing houses would be extremely costly and difficult to execute in the short term and the liquidity in said clearing houses would probably be lower.

Evaluation approach

9. Methodology: Is the analytical approach used to evaluate the effect of reforms appropriate? Are there other approaches to consider for this or future evaluations?

We welcome and share the objectives of the analysis of the effects of regulatory reforms. Over the last 10 years, the global financial system has faced a major regulatory reform which will surely have different effects on entities and activities. We agree with the final aim to analyze whether new regulations have achieved the targets set and to identify potential inconsistencies or unintended effects of the new rules.

In this sense, we welcome the approach followed by the FSB. Nevertheless, we consider that there are some issues that should be taken into account:

- As expressed by the FSB in its report, there has not been a concrete reform targeted at Infrastructure Financing. From our point of view, this complicates the task of analyzing the effects of the regulatory reform on this activity as there is no specific target whose achievement can be analyzed.
- To analyze the evolution of trends in IF, we need to take into account the whole review of the regulatory framework, not only certain activities that may have a direct impact on the financing of infrastructure projects. In some cases, the magnitude of the regulatory reform has meant a reorganization of lines of business in entities that in some cases have left riskier or more capital consuming activities in favor of other kind of operations. These movements do not always respond to any one regulation that might have an effect on specific banking activities but to the interaction between all the different regulatory pieces.
- Regarding the difference-indifference approach used in the report, we agree that it is necessary to differentiate between entities involved in IF that are constrained by financial regulations and those that are not. However, we consider that the analysis must be widened. It is also necessary to consider how Infrastructure is financed in different jurisdictions. While in some countries there is an active market for IF with different participants, in other countries (in particular, in emerging countries), the financing of these projects is closely linked to the banking sector. Accordingly, the effect of regulation on IF is going to be different in jurisdictions where there is

a choice for infrastructure financing with regard to those where these projects can only be financed by the banking sector.

- Moreover, as it is also correctly acknowledged in the report, the regulatory reform was designed globally but applied locally, which means that not all jurisdictions are going to transpose the exact same regulations, and these will have different effects in different countries. Thus, we consider it necessary to also take into account the effect for global banking groups with subsidiaries in third countries. When applying capital requirements at consolidated level, the prevalence of the parent country rules can create a competitive disadvantage for subsidiaries in third countries with regard to their local peers. This kind of regulatory effect should also be taken into account when analyzing trends in IF.

10. Cost-benefit considerations: Do you have any comments on the approaches used in the report to assess the social costs and benefits of the reforms on IF? Are there other types of costs or benefits that should be considered by the evaluation?

We are broadly in agreement with the methodology adopted throughout the study in relation to the cost-benefit considerations of the adopted regulation.

Our main concern is more related to the timing issue of the whole analysis in the sense that we fear there has not been a sufficiently long time span to properly assess the main effects and, more specifically, the side-effects of the many measures adopted within the general frame of “regulation”.

The foregoing note of caution as to drawing final conclusions on the subject should be read taking into consideration:

- Whether they are structured as corporate or project deals, it needs to be considered on a case-by-case basis as each undertaking is somewhat unique and shows the intricacies of the sector, country of investment, local regulation, construction complexity and, in general, the underlying strength of each project.
- Albeit with clear differences depending on whether we are talking of AE or EMDE, we have all been living in an environment of high liquidity in which there has been a clear shortage of investment opportunities. We fear this may have led to a somewhat skewed outcome that will necessarily be affected when the current ultra-loose monetary stance is gradually reversed.

Effects of reforms

11. IF versus other types of finance: The evaluation’s results suggest that financial reforms have not had a disproportionate effect on IF compared to other types of finance. Is this consistent with your view of the market?

True. This statement would be in keeping with our experience. In general terms, we believe the IF market has not been single-handedly more affected by the newly adopted regulation than other financing sectors covered by the reforms.

As IF is usually a long-term financing market, one could argue that some of the reforms may have indirectly had a more direct impact on IF as a result of the restrictions imposed on long-term financing under new capital regulations.

There is certainly some truth in such assessment but we would qualify it more as a side-effect and therefore would not reverse our former opinion regarding the absence of a specific impact on IF versus other types of financing.

Nevertheless, there is a clear change in the market derived from financial reforms, i.e. the substitution in recent years of bank financing by market-based financing in AEs, particularly during later stages of the investment life cycle.

12. Effects of G20 reforms on IF volumes, spreads and maturities: For the G20 reforms covered in this report (particularly Basel III and OTC derivatives), is there any additional information to support (or contradict) the results on the effects of these reforms on volumes, spreads and maturities of IF?

We believe that the methodology of the study is comprehensive and has been well developed, with the only caveat regarding the need for additional time to ensure a proper validation of the results of the study with actual data from different deals, duly covering all sectors and countries, etc.

Furthermore, the finalization of the Basel III framework and certain requirements of the OTC derivatives reform (margin requirements, mandatory clearing) are not yet fully implemented. The impact on IF will be seen over the next years.

13. Effects on EMDEs vs AEs: Is regulation having a differential effect on the provision of IF to EMDEs vs AEs – if so, how? Are there other differences in terms of regulatory impact that should be considered by the evaluation?

We agree with the analysis regarding differences between AEs and EMDEs included in the report. However, we insist on the particularities of each country. IF is still highly dependent on bank financing, not only in emerging countries but also in certain advanced economies. Nevertheless, the lack of development of capital markets in EMDEs makes this dependence higher. Moreover, it is also true that there is a significant presence of third-country banking groups in EMDEs, which are sometimes constrained by the regulation applied in the country of their head office, at least at consolidated level.

Even if the report finds that the G20 regulatory reform is not a driver of the recent trend in IF, we consider that we should also take into account:

- The presence of third-country banking groups in EMDEs through subsidiaries can lead to a situation of competitive disadvantage for said subsidiaries due to the application of capital requirements (among others) at consolidated level.
- Moreover, the report does not take into account the newest Basel standards, which will have to be implemented in the next few years. Even though the Basel Committee on Banking Supervision has found that these new standards will not imply a significant increase in capital requirements, we will have to wait until the local transposition of the rules to really know their effects.

14. Effect on substitution of bank financing by other financing: Has there been a partial substitution of bank financing by market-based financing and, if so, to what extent have the reforms contributed to this trend? Is there other information on substitution that should be considered by the evaluation?

There has definitely been a substitution effect of bank financing by other financing. The question remains regarding the pace of such substitution and, more to the point, the reasons behind such growth.

Bank lending has seen a fairly flat trend in recent years, especially for project finance, following a drop around the time of the crisis. Bond issuance has increased in recent years, mainly in AEs, although the increase is

predominantly related to corporate finance of companies involved in infrastructure projects. Other than bonds, IF provided by non-bank financing sources has also increased compared to pre-crisis levels in AEs, but volumes remain relatively low in absolute terms.

Obviously, the foregoing needs to be understood within the ample range of differences between different regions, with USA taking the lead in terms of capital market usage, Europe lagging behind and most EMDE being in the middle with a capital market penetration rate directly related to the degree of development of the private pension fund sector.

Therefore, although the rate of substitution of bank financing by other types of financing has been faster in the USA and Europe, the starting point has been so low versus other regions that, despite the progress made in the last decade, it is still highly dependent on the bank finance market... and in our view, it will probably continue to be so in the future.

15. Effects of G20 reforms on hedging of risks in IF transactions: Have the G20 reforms covered in this report (particularly Basel III and OTC derivatives) affected the availability or cost of hedging the risks (credit, interest rate, currency etc.) inherent in IF transactions – if so, how? In what ways do these effects differ for AEs vs EMDEs and why?

There has certainly been a strong impact on the derivative markets as a result of the new regulations that have been adopted.

While we have not seen any shortage of hedging availability for long-term IF, it is undeniable that the derivative market seems to be more regulated than in the past in the sense that there is a more stringent and, in particular, more evenly applied regulation when it comes to long-term hedges and required minimum capital requirements.

As for potential differences between AEs and EMDEs, we would like to point out the much more prevalent use of derivatives in the AEs versus EMDEs, which we believe is directly related to the absence of a sufficiently large number of players in the market and the lower level of sophistication characteristic of local currency markets in most EMDEs, with the corresponding impact in terms of liquidity (always a material feature of any regulated market). Other barriers are currency volatility and illiquid capital markets, which create challenges for the hedging of currency risks.

Some of the measures of the G20 reforms are not yet fully implemented and will presumably have an impact on the cost and availability of hedging transactions:

- The new SA-CRR and CVA approaches in the Basel framework will increase capital requirements for derivatives
- The eventual abolition of CVA capital exemptions for non-financial counterparties in the EU CRR may substantially increase the cost of capital on IF hedging transactions with banks subject to EU capital rules at consolidated level
- Margin requirements, especially initial margin requirements, yet to impact all jurisdictions and all financial institutions

The impact of the full implementation of these measures will be correlated with the maturity of the transaction and the credit quality of the counterparty.

16. Effects of other reforms: G20 reforms that are at an earlier implementation stage as well as national and regional regulations that apply to insurers and pension funds have only been examined qualitatively. For these regulations, is there further relevant information about their impact on IF that should be considered by this evaluation?

In our opinion, a detailed analysis of the adequacy of capital requirements on IF in the Basel framework with regard to the risk profile of these financial instruments would be particularly helpful. This analysis may be important for the EU to decide on the introduction of an adjustment on the capital requirements for credit risk in certain specialized lending exposures, as included in the proposal for the amendment of the CRR by the European Commission.

For insurers and pension funds, where capital requirements are not aligned to a global framework, a more detailed analysis of the impact of the different national regulations on IF would help analyze the impact of regulation on the capacity of insurers and pension funds to invest in infrastructure-related financial instruments.

Additional considerations

17. Other issues: Are there any other issues or relevant factors that should be considered as part of the evaluation?

We would like to highlight the importance of regulation. This is an item that has been amply discussed throughout the whole study, but almost always related to “bank regulation” and its corresponding effect on the IF.

Our experience suggests that we may be leaving the fundamental impact of local regulation out of the equation insofar as how the local law of each specific country may impact the IF development.

In our opinion, this issue, which has been hardly touched in the study, may have a tremendous impact in terms of EMDEs’ ability to implement and finance major infrastructure projects.

This is not to say that there are no improvements to be considered for AEs in relation to “local regulation”; however, as far as we have been able to learn on the ground with our IF experience in Latam, the margin of improvement in most EMDEs is definitely a major factor that would merit further interest in the study.

DISCLAIMER

This document has been prepared by BBVA Research Department, it is provided for information purposes only and expresses data, opinions or estimations regarding the date of issue of the report, prepared by BBVA or obtained from or based on sources we consider to be reliable, and have not been independently verified by BBVA. Therefore, BBVA offers no warranty, either express or implicit, regarding its accuracy, integrity or correctness.

Estimations this document may contain have been undertaken according to generally accepted methodologies and should be considered as forecasts or projections. Results obtained in the past, either positive or negative, are no guarantee of future performance.

This document and its contents are subject to changes without prior notice depending on variables such as the economic context or market fluctuations. BBVA is not responsible for updating these contents or for giving notice of such changes.

BBVA accepts no liability for any loss, direct or indirect, that may result from the use of this document or its contents.

This document and its contents do not constitute an offer, invitation or solicitation to purchase, divest or enter into any interest in financial assets or instruments. Neither shall this document nor its contents form the basis of any contract, commitment or decision of any kind.

In regard to investment in financial assets related to economic variables this document may cover, readers should be aware that under no circumstances should they base their investment decisions in the information contained in this document. Those persons or entities offering investment products to these potential investors are legally required to provide the information needed for them to take an appropriate investment decision.

The content of this document is protected by intellectual property laws. It is forbidden its reproduction, transformation, distribution, public communication, making available, extraction, reuse, forwarding or use of any nature by any means or process, except in cases where it is legally permitted or expressly authorized by BBVA

CONTACT DETAILS:

BBVA Research: Azul Street. 4. La Vela Building – 4th and 5th floor. 28050 Madrid (Spain). Tel.: +34 91 374 60 00 and +34 91 537 70 00 / Fax: +34 91 374 30 25 - bbvaresearch@bbva.com www.bbvaresearch.com