

Thematic Review on consistency in implementation of Money Market Funds reforms

Final Report



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1. EXECUTIVE SUMMARY

This report sets out the findings of the Thematic Review (Review) by the International Organization of Securities Commissions (IOSCO) of the implementation by nine IOSCO member jurisdictions, representing the largest Money Market Fund domiciles, of selected key Policy Recommendations out of 15 set out in *Policy Recommendations for Money Market Funds* (2012 Report)¹. The Policy Recommendations were intended to strengthen the resilience of Money Market Funds (MMFs) globally and reduce their susceptibility to runs, with a focus on MMFs that feature a constant net asset value (CNAV).

A Review Team representing five IOSCO member jurisdictions and the IOSCO Secretariat (Review Team or RT) developed and applied a standardized review process (see Section 3) to assess the consistency of implemented measures against each of the 7 Policy Recommendations. In September 2015, IOSCO published *Peer Review of Regulation of Money Market Funds: Final Report* (2015 Report)², followed by two limited-scope reviews (Update Reviews) conducted in 2017³ and 2019⁴. The 2015 Peer Review was a Level I or Adoption Monitoring review to measure implementation progress of participating jurisdictions against Reform Areas⁵. This consistency, or Level II review considered how IOSCO members have implemented the 7 assessed Policy Recommendations by assessing the consistency of the contents of the legal and regulatory framework adopted in the nine assessed jurisdictions with the assessed Policy Recommendations. It does not seek to measure the effectiveness of the reforms.

During the first quarter of 2020, some non-public debt MMFs in certain jurisdictions experienced material stress as a consequence of the Covid-19 crisis. During this period, these non-public debt MMFs experienced significant redemptions while public debt MMFs received increased subscriptions. As central banks intervened to restore market confidence in money markets, some of these interventions appear to have – directly or indirectly depending on the type of intervention – benefitted MMFs. While the purpose of this Peer Review is to assess consistency of the jurisdictional reforms adopted in relation to the 2012 recommendations, IOSCO carried out a separate exercise focusing on the effects of the market dislocations related to the COVID-19 events on MMFs and seeking to characterize the behavior of MMFs of varying types of currencies across the main MMF jurisdictions.⁶

The assessment under this review is based on a review of the legislative, regulatory and policy measures reported as being in place by participating jurisdictions (based generally on information as of end of August 2019). The participating jurisdictions were Brazil, China,

¹ Policy Recommendations for Money Market Funds, IOSCO, October 2012, available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD392.pdf>

² Peer Review of Regulation of Money Market Funds: Final Report, IOSCO, September 2015, available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD502.pdf>

³ Update to the IOSCO Peer Review of Regulation of Money Market Funds, IOSCO, November 2017, available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD583.pdf>

⁴ Update to the IOSCO Peer Review of Regulation of Money Market Funds, IOSCO, October 2019, available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD640.pdf>

⁵ The Reform Areas were: (a) Definition of MMF; (b) Limitations to asset types and risks taken; (c) Valuation; (d) Liquidity Management; (e) MMFs that offer a stable NAV; (f) Use of ratings; (g) Disclosure to investors; and (h) Repos.

⁶ Money Market Funds during the March-April Episode, IOSCO, November 2020 available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD666.pdf>

France, India, Ireland, Japan, Luxembourg, UK and US. They together represent approximately 95% of the total net assets (TNA⁷) managed by MMFs worldwide. The 7 recommendations assessed are related to the issues of Valuation (Recommendations 4 and 5); Liquidity Management (Recommendations 6, 7, 8 and 9) and MMFs that offer a stable Net Asset Value (Recommendation 10).

The Review Team analyzed responses and conducted follow-up discussions with Participating Jurisdictions until end of April 2020. Participating Jurisdictions were given an opportunity to fact-check their responses and how these have been reflected in the report.

Key findings (see Section 5 which includes Table 3 on Participating Jurisdictions' Consistency of Implementation) and observations from this Review include:

- Participating Jurisdictions have generally implemented policy reforms in relation to the reform areas to strengthen the frameworks applicable to MMFs; policy measures are generally in line with the assessed Policy Recommendations;
- There is no uniform definition of what constitutes a “Money Market Fund” in the assessed jurisdictions (the 2012 Policy Recommendations do not, as such, impose a definition of a Money Market Fund, but Policy Recommendation 1 states that 'money market funds should be explicitly defined in CIS regulation')⁸. Although Recommendation 1 was not as such part of the review⁹, MMFs are not homogeneous and as such demonstrate a range of characteristics dependent on their structure. Consequently, there appears to be an important diversity of types of MMFs in the assessed jurisdictions. For example, when comparing the different markets, it can be noted that MMFs can be very different from one jurisdiction to another based on the nature of the product, its role in the financial ecosystem, the types of clients they serve and/or the currency in which they are denominated. As a matter of example, Money Reserve Funds (MRFs) in Japan can be subscribed to only by retail investors and are exclusively used by securities companies (broker dealers) for the purpose of settlement and pooling of cash.
- Since the publication of the Policy Recommendations, the MMF markets have continued to grow, in some instances significantly in some large jurisdictions (US and China) and in a more limited manner in others (EU). In the EU for instance, growth was relatively limited given the low interest rate environment. Growth of the MMF industry in China has been such that China has emerged as the second largest market after the

⁷ The concepts of TNA (total net assets) and AuM (assets under management) used are equivalent measures for the purposes of this report.

⁸ The means of implementation under Recommendation 1 states that “(...) As a basis, and although definitions may slightly vary from jurisdiction to jurisdiction, money market funds may generally be defined as investment funds that seek to preserve capital and provide daily liquidity, while offering returns in line with money market rates”.

The definition should ensure that all CIS which present the characteristics of a MMF or which are presented to investors or potential investors as having similar investment objectives are captured by the appropriate regulation even when they are not marketed as a “MMF” (e.g. “liquid” funds, “cash” funds).”

⁹ The review is not designed to assess if all funds that exist in a jurisdiction and that do potentially or eventually display MMF features are all captured by the MMF regime in place. There was consequently no assessment of the regime applicable to those funds that operate outside of the domestic MMF regime of the assessed jurisdictions for any reasons.

US in only a few years' time (although the growth rates have slowed down in more recent times).

- Since the publication of the 2012 Report, there have been material changes in the industry, driven by different factors. Some of the changes have been driven by the post 2012 reforms that have been introduced in various markets. For example, in the EU, the MMF Regulation has introduced three types of MMF – constant net asset value (CVNAV), low volatility net asset value (LVNAV) and variable net asset value (VNAV) MMFs. In the US most MMFs were CNAVs¹⁰ prior to October 2016. The reforms operated in 2014 have introduced a clear split between notably prime and tax-exempt institutional MMFs (required to operate as VNAV MMFs) and government MMFs as well as retail MMFs (permitted to operate as CNAV MMFs). Following the implementation period, there was a subsequent significant shift in assets away from prime MMFs, into government and Treasury funds. Other changes in the MMFs market have been driven by external factors, such as a prolonged low interest rate environment.
- In relation to the requirement for MMFs to hold a minimum amount of liquid assets to strengthen their ability to face redemptions and prevent fire sales (Recommendation 7), and although this aspect was not as such part of the Review, it appears from the review that there is a large variety of definitions of the instruments each jurisdiction deems to be liquid.
- Policy Recommendation 10 focuses on the risks associated with CNAV funds and provides that MMFs that offer a CNAV to be subject to measures designed to reduce the specific risks associated with the stable NAV features and to internalize the costs arising from those risks. Further, Recommendation 10 provides that regulators should require, where workable, a conversion to VNAV. Alternatively, Recommendation 10 provides that safeguards should be introduced to reinforce stable NAV MMFs' resilience and ability to face significant redemptions. It appears that most jurisdictions have introduced specific safeguards to contain the risks associated with CNAVs rather than requiring the conversion to floating NAV with the notable exception of the US market, which has required its prime institutional MMF to float their NAV.

Main findings by Recommendation

Recommendation 4 – Use of fair value and amortized cost method

The Review Team assessed that three out of the nine Participating Jurisdictions are 'Fully Consistent'. The participating EU jurisdictions and Japan have been rated as 'Broadly Consistent' and China is assessed as 'Partly Consistent', due to the gaps identified notably in relation to the use of amortised cost accounting (ACA) at the individual portfolio instrument level.

Recommendation 5 – Third parties to review MMFs' valuation practices

For Recommendation 5, eight out of the nine participating jurisdictions have been rated as 'Fully Consistent'. The RT rated Brazil as 'Broadly Consistent' as its regime appears to not require 'prompt remedial action' when weaknesses in valuation practices are identified.

¹⁰ As a result of the 2014 reforms, MMFs were given a two-year compliance date for MMFs to implement the floating NAV reform.

For Recommendation 5, eight out of the nine participating jurisdictions have been rated as 'Fully Consistent'. The RT rated Brazil as 'Broadly Consistent' as its regime appears to not require 'prompt remedial action' when weaknesses in valuation practices are identified.

Recommendation 6 – MMFs' policies and procedures to know their investors

The Review Team assessed that eight out of nine Participating Jurisdictions are 'Fully Consistent'. Due to the gaps identified regarding knowing the investors of MMFs, China has been rated as 'Broadly Consistent'.

Recommendation 7 – Minimum level of liquid assets

Eight out of nine of the participating jurisdictions have been rated as 'Fully Consistent'. They all provide for liquidity requirements in line with the recommendation even if the type of eligible assets and the amount can vary significantly. However, India has been rated "Broadly Consistent" as its rules for Liquid Funds came into force nine months after the cut-off date of the Review and another category of MMFs does not have a specific liquidity requirement.

Recommendation 8 – Stress testing

The Review Team has rated all nine participating jurisdictions as 'Fully Consistent'. The use of stress tests is systematically required in all jurisdictions except for Overnight Funds in India which corresponds to a subset of the Indian MMF range and for which stress tests are considered as irrelevant as they only invest in overnight securities.

Recommendation 9 – Tools to deal with exceptional market conditions & substantial redemption pressure

The RT has rated all nine jurisdictions as 'Fully Consistent' as they all allow for the use of liquidity management tools and require specific pre or post sale disclosures to investors regarding the use of these tools.

Recommendation 10 – Safeguards towards stable NAV MMF or conversion to variable NAV

Brazil and India were rated 'Fully Consistent' on the basis that their regimes do not allow stable NAV. The other seven participating jurisdictions which have frameworks allowing stable NAV MMFs have been rated as 'Fully Consistent' as it appears that their regimes have put in place safeguards for their stable NAV MMFs that are consistent with the 2012 Policy Recommendations.

2. BACKGROUND

On 9 October 2012, the IOSCO Board published Policy Recommendations for Money Market Funds.

The 2012 Report contains 15 key policy recommendations relating to the following eight reform areas:

- (1) Scope of the regulatory reform (explicit definition of MMFs and appropriate inclusion of other investment products presenting features and investment objectives similar to MMFs);
- (2) Limitations to the types of assets of, and risks taken by, MMFs;
- (3) Valuation;

- (4) Liquidity management;
- (5) MMFs that offer a stable Net Asset Value (NAV);
- (6) Use of ratings;
- (7) Disclosure to investors and
- (8) Repos.

In September 2013, the G20 Leaders in St Petersburg called for IOSCO to launch a peer review and to report on progress regarding implementation of MMF regulatory reforms in late 2014. IOSCO, through its Assessment Committee, undertook a Thematic Review on the progress of 31 jurisdictions' efforts in adopting legislation, regulation, and other policies in relation to MMFs.

In September 2015, IOSCO published the final report of its Peer Review of Regulation of Money Market Funds (2015 Report). The 2015 Report reviewed the progress of 31 jurisdictions in adopting legislation, regulation and other policies in relation to 8 reform areas of the 2012 IOSCO Recommendations. Key findings from the 2015 Report, as approved by the IOSCO Board, were provided to the Financial Stability Board (FSB) for inclusion in their report to the G20 Implementation and the effects of the G20 financial regulatory reforms. Since 2016, as part of IOSCO's commitment to monitor G20 priority reforms, the Assessment Committee has conducted annual limited-scope reviews (Update Reviews) to identify progress by IOSCO members in FSB jurisdictions in implementing IOSCO reforms regarding the regulation of MMF. The scope of the Update Reviews was limited to participation by IOSCO members from FSB jurisdictions and included only three of the eight reform areas (being Valuation; Liquidity management; and MMFs that offer a stable NAV). The results of IOSCO's monitoring efforts for 2017 and 2019 are published in the Update to the IOSCO Peer Review of Regulation of Money Market Funds¹¹.

The 2015 Report mentioned that a separate recommendation regarding an Implementation Monitoring or Level 2 Review will be made by the Assessment Committee to the Board at an appropriate time.

In November 2015, the G20 Leaders in Antalya called for IOSCO to consider developing a plan for regular monitoring and reporting on timeliness, consistency and effects of these reforms. Accordingly, the FSB's July 2017 report *Assessment of shadow banking activities risks and the adequacy of post-crisis policy tools to address financial stability concerns*¹² states that "IOSCO will conduct follow-up Level 1 and Level 2 peer reviews of national implementation status with regard to its recommendations on MMFs after relevant regulations are adopted in remaining major jurisdictions and will report its findings to the FSB".

The MMF Update Reviews of the three reform areas showed that regulatory reforms have been implemented in a number of jurisdictions including three of the largest MMF markets (US, China and the EU). EU member jurisdictions had also reported that a new EU Regulation on MMFs, published in June 2017, came into force in July 2018, which contributes towards more

¹¹ Update to the IOSCO Peer Review of Regulation of Money Market Funds, IOSCO, November 2017, available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD583.pdf> and Update to the IOSCO Peer Review of Regulation of Money Market Funds, IOSCO, October 2019, available at <https://www.iosco.org/library/pubdocs/pdf/IOSCOPD640.pdf>

¹² Assessment of shadow banking activities risks and the adequacy of post-crisis policy tools to address financial stability concerns, FSB, July 2017 available at <https://www.fsb.org/wp-content/uploads/P300617-1.pdf>

complete implementation of IOSCO's recommendations. Implementing measures (i.e., level II provisions) in relation to the EU MMF Regulation have been in place for EU jurisdictions since April 2018.

In light of the above developments, a Project Specifications document for this Level II Thematic Review, defining the scope in terms of jurisdictions covered and reform areas to be assessed, was approved by the IOSCO Board in May 2018.

In March 2019, the Review Team was formed to draft the Assessment Methodology and conduct the Review. Subsequently, in June 2019, the Assessment Committee approved this Assessment Methodology and Questionnaire.

Objectives of this Thematic Review

This Review assesses the consistency of implementation of 7 (out of 15) Policy Recommendations included in the 2012 Report and describes the legislative, regulatory and policy measures that have been taken. Those 7 recommendations are:

- Valuation (Recommendations 4 and 5);
- Liquidity Management (Recommendations 6, 7, 8 and 9); and
- MMFs that offer a stable Net Asset Value (Recommendation 10).

This Review covers the following jurisdictions: Brazil, China, France, India, Ireland, Japan, Luxembourg, UK and US, which as at the end of Q2 2019 all together represent approximately 94% of the MMF TNA worldwide.

Jurisdictions were assessed on the 7 recommendations that were covered in the previous Update Reviews. However, in order to provide fuller context of each jurisdiction's MMF regulatory framework, jurisdictions were asked to provide additional background information on their respective MMF markets.

For the purposes of this review, the Policy Recommendations are understood to apply as defined by the 2012 report.

In terms of the scope of this Level II review, the 2012 Policy Recommendations do not define MMFs. Recommendation 1 from the 2012 IOSCO Report nevertheless provides that '*money market funds should be explicitly defined in CIS regulation*'. On this basis, jurisdictions were asked to report on the specific regime they have in place for MMFs. Due to the absence of a common agreed definition, the review is not designed to assess if all funds that exist in a jurisdiction which potentially or eventually display MMF features are all captured by the MMF regime in place. There was consequently no assessment of the regime applicable to those funds that operate outside of the domestic MMF regime of the assessed jurisdictions.

For the purpose of this review, the following applies:

- "Participating Jurisdictions" refers to the nine jurisdictions identified for this review who have participated in this review answering the "Questionnaire" in Annex A below.
- "Money Market Funds" refers to the Collective Investment Schemes (CIS) established in a given jurisdictions that are subject to the MMFs regime in relation to which each one of the assessed jurisdictions has answered the above referred to "Questionnaire".

- Only those legal and regulatory provisions which were in place by the date of the reply to the questionnaire (i.e., 9 August 2019) have been considered for the purpose of this Review.

When responding to this questionnaire, Participating Jurisdictions referred to the legal and regulatory provisions applicable under their domestic MMF regime. Legal and regulatory provisions applicable also to MMFs although not originating from that specific domestic MMF regime were referred to, to the extent relevant to the answer of the question at stake and to the extent applicable in addition to the legal and regulatory provisions related to the specific MMF regime (i.e., legal and regulatory provisions generally applicable to all open-ended CISs in a given jurisdiction, including MMFs subject to the specific MMF regime).

3. METHODOLOGY

The Assessment Methodology was developed to facilitate the assessment of the consistency of implementation of the 7 Policy Recommendations by Participating Jurisdictions and the description of the legislative, regulatory and policy measures that have been taken. Where appropriate, it also facilitated the Review Team’s determination as to whether further policy and/or monitoring work was necessary.

The Assessment Methodology included the Questionnaire which Participating Jurisdictions were asked to complete. The Questionnaire was supported by:

- The text of each of the 7 Policy Recommendations; and
- Questions designed by the Review Team to assess the consistency of implementation against the Means of Implementation (MoI) and the Policy Recommendations.

When assessing the responses received and proceeding with the rating according to the rating scale defined hereafter, the Review Team took into account the nature (e.g. mandatory versus optional/recommended) of the different MoI in relation to each one of the Policy Recommendations assessed and reflected through the different questions in the Questionnaire. In this regard, the Review Team recognized that not every item in the MoI and in the Questionnaire for a particular Policy Recommendation must be met for a jurisdiction to be rated as ‘Fully Consistent’ for the applicable Policy Recommendation. For this purpose, the Review Team established an assessment matrix covering each of the MoI of the 7 Policy Recommendations that were being assessed.

Under the Assessment Methodology, Participating Jurisdictions’ consistency of implementation was assessed and rated for each of the 7 individual Policy Recommendations. However, no overall rating for a Participating Jurisdiction’s implementation of the Policy Recommendations as an integrated whole has been assigned, given that this Review only covers certain Policy Recommendations and reform areas.

Approach to Assessing Progress — Implemented and Planned Policies and Practices

Overview

This is a **consistency review** of implementation of the Policy Recommendations. That means the objective for the Review Team was to assess the extent to which relevant measures in force in each jurisdiction are “*consistent with the relevant Policy Recommendations*”.

The Review Team recognizes that jurisdictions can take and have taken different routes to achieve the regulatory objectives underlying the Policy Recommendations, and the review team approached the assessment accordingly.

Participating Jurisdictions were asked to respond to the questions set out in each part of the Questionnaire about implementation measures taken. Respondents were asked to provide enough detail to allow the Review Team to validate their response.

Participating Jurisdictions were also asked to describe (using the reporting scale described in Table 1 below) their own assessment of the consistency of their implementation measures against each of the 7 Policy Recommendations as of **9 August 2019**.

Participating Jurisdictions were invited to provide any relevant additional information that supports their self-assessment of consistency of implementation.

The Review Team considered these self-assessments as part of the information it considered when it prepared its assessment of the Participating Jurisdictions' consistency in implementing legislative, regulatory and policy measures for each individual Recommendation.

Table 1 - Reporting Scale

In addition to answering the Questionnaire respondents were asked to self-assess their jurisdiction's own regulatory regime using the following scale:

Fully Consistent	The jurisdiction's regulatory framework is fully consistent with the Policy Recommendation. The assessment has identified no gaps or shortcomings , or only a few gaps/shortcomings that have no material impact on the intended outcomes of the Policy Recommendation.
Broadly Consistent	The jurisdiction's regulatory framework is broadly consistent with the Policy Recommendation. The assessment has identified gaps/shortcomings that only have a minor impact on the intended outcomes of the Policy Recommendation.
Partly Consistent	The jurisdiction's regulatory framework is partly consistent with the Policy Recommendation. The assessment has identified gaps/shortcomings that have a significant impact on the intended outcomes of the Policy Recommendation.
Not Consistent	The jurisdiction's regulatory framework is not consistent with the Policy Recommendation. The assessment has identified that the jurisdiction's regulatory framework does not achieve the intended outcomes of the Policy Recommendation.

Not Applicable	No implementation measures needed given the nature of the securities market and/or relevant structural, legal and institutional considerations. This status corresponds to the case where there is no market or activity in the jurisdiction that falls within the scope of the Policy Recommendation.
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The respondents were also asked to note instances where the consistency of implementation in relation to a particular Recommendation could not be adequately assessed and explain why.

3.1. Review Team

The Review was conducted by a team comprised of the following staff from the following national authorities: Natasha Cazenave and Simon Jordan-Meille (Autorité des Marchés Financiers, France), Hrudra Ranjan Sahoo and Pankaj Bhageria (Securities and Exchange Board of India), Satoshi Izumihara (Financial Services Agency, Japan), Laurent van Burik (Commission de Surveillance du Secteur Financier, Luxembourg), Judy T. Lee (Securities and Exchange Commission, U.S.), Raluca Tircoci-Craciun and Hemla Deenanath (IOSCO General Secretariat) (Review Team or RT).

The Review Team was led by Laurent van Burik.

3.2. Participating Jurisdictions

This Review covers the following jurisdictions: Brazil, China, France, India, Ireland, Japan, Luxembourg, UK and US. MMFs in those nine jurisdictions account for approximately 94% of the global total net assets (TNA) of the global world-wide MMF as at the end of Q2 2019.

3.3. Review Process

The Review was a desk-based exercise, using responses provided by the Participating Jurisdictions to a questionnaire designed and developed by the Review Team. The questionnaire was circulated on 1 July 2019, with responses due on 9 August 2019. Respondents were given the opportunity to update their questionnaire responses based on any further implementation progress. In addition, the Review Team sought additional information to clarify or verify aspects of responses from all Participating Jurisdictions.

4. BRIEF DESCRIPTION OF THE MONEY MARKET FUNDS MARKET, RECENT TRENDS AND KEY FIGURES

The following sections 4.1., 4.2., and 4.3. provide some general background information of the MMF markets globally and in relation to the nine assessed jurisdictions more specifically, including information on the general market data and market specificities (section 4.1), the investor base of the MMFs in those markets (section 4.2.) and a general description of the changes and developments observed in those markets since the 2012 reforms (section 4.3.).

4.1. General market data and market specificities

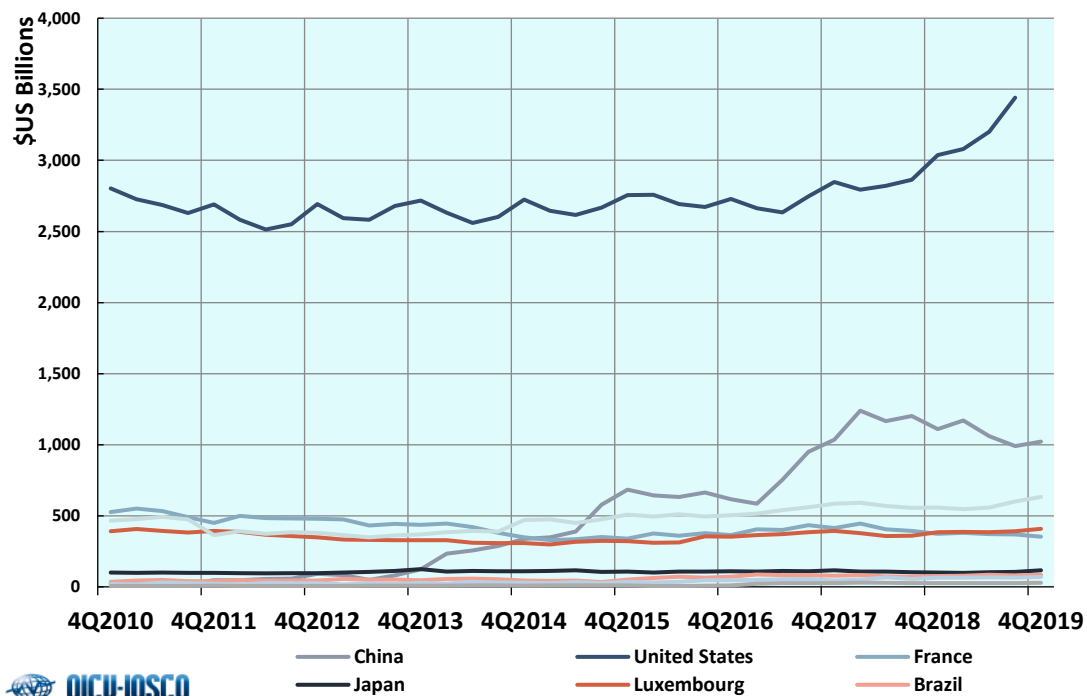
The MMF industry is significant in size, with total net assets (TNA)¹³ of worldwide MMFs totalling USD 6,936,926 million at the end of Q4/2019¹⁴. This number represents a considerable increase compared to the TNA of worldwide MMFs nine years earlier at the end of Q4/2010, which amounted to USD 5,080,042 million.

A shift has been observed in terms of the relative TNA attributable to the nine assessed jurisdictions over the nine-year period ranging from Q4/2010 to Q4/2019. At the end of Q4/2010, the major MMF domiciles in terms of TNA were the US (55.19% of the global MMF TNA), France (10.38% of the global MMF TNA), Ireland (9.14% of the global MMF TNA) Luxembourg (7.70% of the global MMF TNA) and Japan (2.0% of the global MMF TNA). The other 4 jurisdictions individually represented less than 2% of the global MMF TNA.

At the end of Q4/2019 figures show that the global MMF industry was still dominated by the US (55.12% of the global MMF TNA), but China (13.34% of the global MMF TNA) and Ireland (9.35% of the global MMF TNA) had by then increased to the second and third largest shares, whereas the relative size of Luxembourg (6.13% of the global MMF TNA) and France (5.63% of the global MMF TNA) had declined in Q4/2019 compared to the Q4/2010 figures. The other 4 assessed jurisdictions have remained relatively stable in terms of their respective MMF shares.

Table 2, Figures 1 and 2 provide a graphical overview of the MMF market size of the participating jurisdictions¹⁵.

Table 2 – Evolution of MMF market size from 2010 to 2019 (TNA of Total Funds)



¹³ The concepts of TNA (total net assets) and AuM (assets under management) used are equivalent measures for the purposes of this report

¹⁴ Data from the Investment Company Institute, as of the end of Q4/2019.

¹⁵ Data from the Investment Company Institute, as of the end of Q4/2019.

Figure 1 - Distribution of Global Money Market Funds by Jurisdictions

(% of Total Net Asset, Q4 2010)

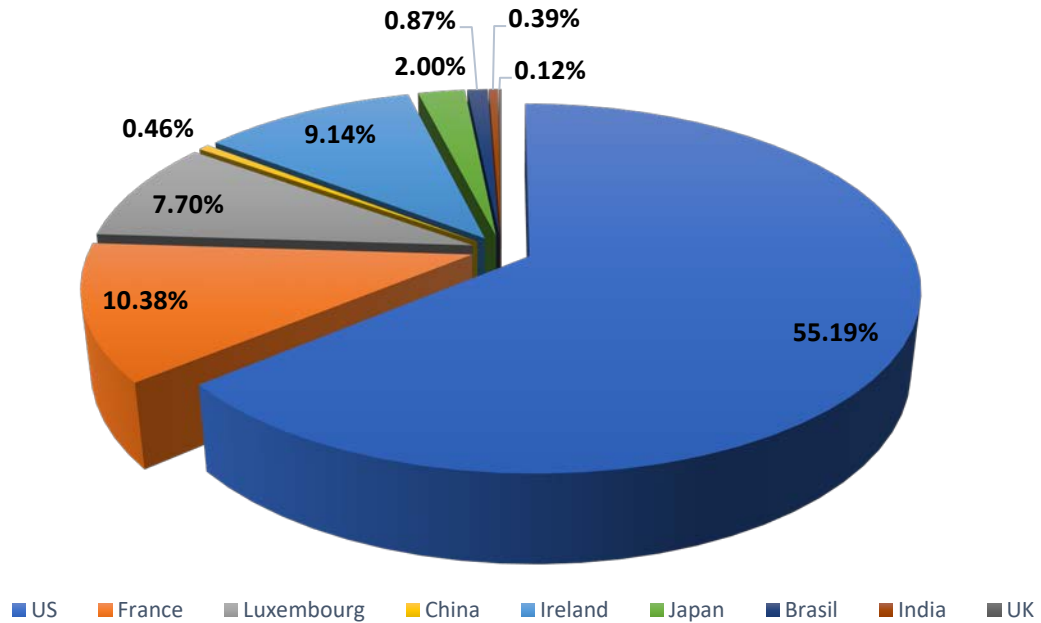
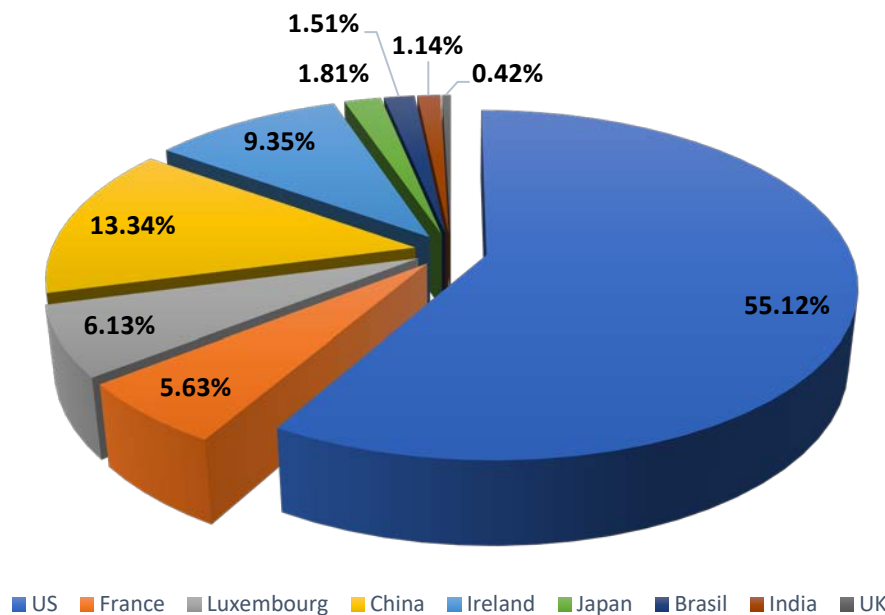


Figure 2 - Distribution of Global Money Market Funds by Jurisdictions

(% of Total Net Asset, Q4 2019)



Source - Investment Company Institute

As to the relative TNA of the MMFs in the assessed jurisdictions compared to the mutual fund assets under management in each one of the assessed jurisdictions, changes can also be observed. On a worldwide level, MMFs globally represent 12.6% of the worldwide¹⁶ TNA of public funds. Whereas such relative TNA is rather low in some jurisdictions, i.e., 9% of the public funds for Japan, 7.5% in Brazil, 7.20% in Luxembourg, 2% in the UK, and 13.45% in the US, such relative TNA is substantially higher for China with 54.33%, India with 21.49%, Ireland with 17.7% and 17.4%¹⁷ in France as of Q2/Q3 2019.

4.2. Market specificities – investor profiles

It is interesting to note that there are also material differences in relation to the investor base of the MMFs in the assessed jurisdictions.

European MMFs are in principle open to retail as well as to institutional investors. In practice it appears that MMFs are to a large majority invested in by institutional investors. For example, in France, 98% of MMF TNA are held mainly by corporate and institutional investors (retail investors can invest in MMFs via specific types of UCITS or AIF such as employee savings funds, but the proportion of retail investment is relatively limited overall). In the UK approximately 90% of MMF TNA are held by institutional investors and in Luxembourg around 83% of the MMFs assets are held by institutional investors (based on a sample of the main MMFs representing 76% of the TNA of MMFs). In Ireland the majority of MMFs are also held by institutional investors. The same phenomenon can be observed in India where 85% of the AuM of Liquid Funds and MMFs are held by institutional investors.

In Japan on the other hand, Money Reserve Funds (MRFs) can be subscribed by retail investors only. In China, where MMFs are open to retail and institutional investors, the majority, 57% of the MMF units, are held by retail investors (as of September 2019).

In the USA, MMFs are held by both retail and institutional investors, with some MMFs specifically designed for retail investors (i.e., “retail MMFs”¹⁸). The same applies for Brazil where MMFs are allowed to be marketed to retail as well as to institutional investors, noting that in Brazil all MMFs are variable NAV MMFs.

4.3. Characteristics, changes and evolutions observed in the different markets since the 2012 reforms

One of the main observations of this Review is that the MMF markets of each of the nine participating jurisdictions are different in nature. This section attempts to give a brief overview of the characteristics of these markets and their evolution in the last decade based on the information received from the participating jurisdictions. This should ideally be read in conjunction with the more detailed description available at Annex D.

¹⁶ Based on data from the Investment Company Institute, as of the end of Q2/2019.

¹⁶ Worldwide Regulated Open-ended Fund Assets and Flows: Trends in the Third Quarter of 2019, European Fund and Asset Management Association, Third quarter 2019, available at: <https://www.efama.org/Publications/Statistics/International/Quarterly%20%20International/191219IntlStatisticalReleaseQ32019.pdf>

¹⁸ “Retail money market fund” means a MMF that has policies and procedures reasonably designed to limit all beneficial owners of the fund to natural persons. 17 CFR 270.2a-7(a)(21).

The U.S.

MMFs have existed as a type of registered investment company in the U.S. for over 35 years. Historically, most investors invested in prime MMFs, which generally hold a variety of taxable short-term obligations issued by corporations and banks, as well as repurchase agreements and asset-backed commercial papers. Government MMFs principally hold obligations of the U.S. government, including obligations of the U.S. Treasury and federal agencies and instrumentalities, as well as repurchase agreements collateralized by government securities. Prior to 14 October 2016, a majority of U.S. MMFs were CNAV¹⁹. As a result of the 2014 reforms, only government²⁰ MMFs and retail MMFs are permitted to operate as CNAV funds. Institutional prime and institutional municipal (or tax-exempt) MMFs are required to operate as VNAV funds. As data shows, following the 2014 reforms, there was a significant shift in assets away from institutional prime MMFs and into government and Treasury funds, which was mirrored in retail MMFs, but to a lesser degree.

China

China's MMF market has experienced rapid growth since its inception in 2003, with at certain times significant growth of its AuM, especially after the second half of 2013 due to the reform of interest rate liberalization and the sales extension achieved by using internet platform. The MMF market was initially driven by institutional investors, although the MMF sector is today mostly retail-based. All China MMFs were historically CNAV MMFs. Following the 2014 reforms, a first (out of 6) pilot VNAV MMF in China was established in August 2019. The bulk of the assets is managed by a limited number of key market players, making the MMF industry in China quite concentrated. At the end of 2014, the largest five MMF asset managers held 51% of overall Chinese MMF assets. Among these, Tian Hong Zeng Li Bao fund, the MMF linked to Alibaba's online investment fund (Yu'e Bao) and created in June 2013 quickly grew to become the largest Chinese MMF accounting for more than 26% of the market in China.

Europe

In the EU, the Money Market Funds Regulation²¹ entered into force as of 21 July 2017. This regime introduced three types of MMFs: a variable net asset value MMF or "VNAV"; a public debt constant net asset value MMF or public debt CNAV; and a low volatility net asset value MMF or LVNAV MMF. VNAV can either be set up as short-term MMF or standard MMF which are subject to different portfolio rules, whereas public debt CNAV MMF and LVNAV MMF may only be set up as short-term MMF. The MMFR comes on top of the UCITS or the AIFMD rules, depending on the wrapper chosen for the MMF. In relation to the main European MMF markets, different developments have been observed in relation to the continuation of the display of a stable NAV by MMF in the different markets post-MMFR. The four EU jurisdictions evaluated in this review present the following characteristics:

¹⁹ As a result of the 2014 reforms, MMFs were given a two-year compliance date for MMFs to implement the floating NAV reform.

²⁰ "Government money market fund" means a MMF that invests 99.5% or more of its assets in cash, government securities, and/or repos that are "collateralized fully" by cash and government securities. 17 CFR 270.2a-7(a)(17). Some government MMFs limit their holdings to only U.S. Treasury obligations or repurchase agreements collateralized by U.S. Treasury securities and are called "Treasury money market funds."

²¹ Regulation (Eu) 2017/1131 Of the European Parliament and of the Council of 14 June 2017 on money market funds, Official Journal of the European Union available at [Money Market Funds Regulation](#)

- The **French market** is made up of 200 MMFs, all VNAV funds representing 20% of AuM in France for an amount²² of EUR 338 billion²³. They are mostly sold to French clients and invest primarily in French and European assets. French MMFs are predominantly denominated in EUR. The market is very concentrated with one fund representing 14% of the market, and the top 20 funds constituting 72% of the market. While all French domiciled MMFs have historically been structured as VNAV funds, since the entry into force of the EU MMF regulation, stable NAV fund can be launched in France (either as an LVNAV MMF or a Public Debt CNAV).
- The **Luxembourg market** is mainly composed of LVNAV MMFs (50%) and to a lesser extent of Public debt CNAV MMFs (15%) representing together 65% of MMFs AUM. The 5 biggest managers represent about 75% of the market share of MMFs in terms of net assets. MMF managers of Luxembourg MMFs are mainly part of banking groups originating from the US (50%). 50% of the overall assets are invested in USD-denominated MMFs and the rest is split mainly between EUR-denominated MMFs (25%) and GBP-denominated MMFs (20%). In terms of investors, institutional investors typically use MMFs for their treasury management purposes.
- The **Irish market** is composed of the three categories of MMFs. In terms of AuM value of funds, the Irish market is made up of 12,72% of public debt CNAV and 82,76% of LVNAV MMFs. VNAV funds represent 4,52% of Irish MMFs (as at end June 2019)²⁴.
- In the **British market**, MMFs represent 2% of funds domiciled. The market is composed of 19 MMF which are either LVNAV representing 30% of total assets and the rest is composed of VNAV MMFs. Institutional investors represent 90% of AuM, the rest is composed of retail investors.

Japan

There have been two categories of MMF-type products under the Japanese regime, namely the “Money Management Fund” (**JMMF**) launched in 1992 and the “Money Reserve Fund” (**MRF**) launched in 1997. JMMFs and MRFs are investment trusts which mainly invest in money market financial instruments as well as government and corporate bonds with limited maturities according to the relevant legal provisions. In terms of AuM, JMMFs historically represented approximately one third of the combined MRF and JMMF TNA in 2010. JMMF have nevertheless progressively reduced in size and market share. Since May 2017, no more fund managed in Japan is classified as JMMF. MRFs are products which securities companies (broker dealers) in Japan have been using for the purpose of settlement and pooling of cash, given mainly that those broker dealers are not allowed to accept deposits. Given this specific purpose, MRFs are as such structured as CNAV funds.

India

As per the SEBI (Mutual Funds) Regulations, 1996 (MF Regulations), Money market instruments include commercial papers, commercial bills, treasury bills, Government securities having an unexpired maturity up to one year, call or notice money, certificates of deposit, usance bills, and any other like instruments as specified by the Reserve Bank of India (RBI) from time to time. The following three fund categories share features of funds that are covered

²² Data from Autorité des marchés financiers, France

²³ *Efama statistics third quarter of 2019*

²⁴ Data from Central Bank of Ireland

in the context of the current review: Money Market fund; Liquid Fund; and Overnight Fund. All mutual funds in India are required to compute NAV daily based on the principle of fair valuation and mutual funds with stable NAV are not permitted under its jurisdiction. Accordingly, all mutual funds in India are with VNAV. In India, Money Market Mutual Funds (MMMFs) were introduced in April 1991 by the RBI to provide an additional short-term investment avenue to investors and to bring money market instruments within the reach of individuals. Subsequently, MMMFs became more attractive to banks and financial institutions. MMMFs have continued to grow to constitute a significant proportion of the total assets managed by the mutual funds in India. Corporates in India started to park their surplus monies on daily basis in these funds to get better yields which has led to the growth of these funds. As at September 30, 2019, MMMFs contributed around 19.92 % of total AuM of the Indian mutual fund industry. The promoters of these funds are from varied backgrounds consisting of Indian banks (both public sector and private sector), international financial institutions, Indian financial institutions, Indian conglomerates and Indian companies. Clients of these funds are corporates, banks/financial institutions, Foreign Portfolio Investors, high networth individuals (HNIs) and retail investors, out of which corporates are the major investors in these funds followed by HNIs. Base currency of these funds is INR.

Brazil

MMF funds in Brazil were initially created to provide solutions to cash management needs for investors, both retail and institutional (including other funds, which made use of those to put in place liquidity buffers). During the 80s and 90s, in view of the hyperinflationary environment in the Brazilian economy, MMFs were of critical importance as an instrument to preserve the value of the currency, when investors had to invest mainly in overnight financial investments. However, MMFs do not have, and never had, a vocation to someday be a major instrument to the industry. In Brazil, banks have historically been the major providers of MMFs, even though some MMFs are also provided by independent asset managers. With the reduction of domestic interest rates, the issue of costs has become increasingly relevant, and thus, one evolution in this segment was the reduction of management fees. Today it is common for MMFs to operate on a zero rate, given that profitability, squeezed by liquidity needs, is affected by any rate fees and costs.

5. FINDINGS AND OBSERVATIONS

5.1. Overview of Consistency by Recommendation

The Review determined, as already noted to some extent by the related level I reviews, that all Participating Jurisdictions have implemented measures designed to ensure a certain degree of compliance with the IOSCO Policy Recommendations. Given that the Review focuses on seven (out of 15) Policy Recommendations included in the 2012 Report, the below table summarizes the ratings of the Review in terms of consistency to each one of the Policy Recommendations individually, i.e., no overall rating of consistency of a given jurisdiction with the different Policy Recommendations globally has been made (see above Objectives of the Review section).

Table 3 sets out the Review Team’s assessment of each Participating Jurisdiction’s consistency with each of the seven assessed Policy Recommendations.

Jurisdiction	Policy Recommendation						
	4 Fair value	5 Valuation practices	6 KY Investors	7 Liquid assets	8 Stress testing	9 Specific tools	10 CNAV
Brazil							x
China							
France							
India							x
Ireland							
Japan							
Luxembourg							
United Kingdom							
United States							

x: Rated as Fully Consistent in relation to Policy Recommendation 10 since no CNAV permitted.

Legend

	Fully Consistent
	Broadly Consistent
	Partly Consistent
	Not Consistent
	Not Applicable

The Review’s main findings by Recommendation are:

Recommendation 4 – Use of fair value and amortized cost method

The Review Team assessed that three out of the nine Participating Jurisdictions are ‘Fully Consistent’. Due to gaps identified by the RT, the participating EU jurisdictions and Japan have been rated as ‘Broadly Consistent’ and China has been assessed as ‘Partly Consistent’ due to the gaps identified notably in relation to the use of ACA at the individual portfolio instrument level.

Recommendation 5 – Third parties to review MMFs’ valuation practices

For Recommendation 5, eight out of the nine participating jurisdictions have been rated as ‘Fully Consistent’. The RT rated Brazil as ‘Broadly Consistent’ as its regime appears to not require ‘prompt remedial action’ when weaknesses in valuation practices are identified.

Recommendation 6 – MMFs’ policies and procedures to know their investors

The Review Team assessed that eight out of nine Participating Jurisdictions are ‘Fully Consistent’. Due to the gaps identified regarding knowing the investors of MMFs, the Chinese jurisdiction is rated as ‘Broadly Consistent’.

Recommendation 7 – Minimum level of liquid assets

Eight out of the nine participating jurisdictions have been rated as ‘Fully Consistent’. All of the participating jurisdictions foresee liquidity requirements in line with the recommendation even if the type of eligible assets and the amount can vary significantly. However, India has been rated ‘Broadly Consistent’ as its rules for Liquid Funds came into force nine months after the cut-off date of the Review and another category of MMFs does not have a specific liquidity requirement.

Recommendation 8 – Stress testing

The Review Team has rated all nine participating jurisdictions as ‘Fully Consistent’. The use of stress tests is systematically required in all jurisdictions except for Overnight Funds in India which corresponds to a subset of the Indian MMF range and for which stress test are considered as irrelevant as they only invest in overnight securities.

Recommendation 9 – Tools to deal with exceptional market conditions & substantial redemption pressure

The RT has rated all nine jurisdictions as “Fully Consistent” as they all allow for the use of liquidity management tools and require specific pre or post sale disclosures to investors regarding the use of these tools.

Recommendation 10 – Safeguards towards stable NAV MMF or conversion to variable NAV

Brazil and India were rated ‘Fully Consistent’ on the basis that their regimes do not allow stable NAV. The rest of the seven participating jurisdictions which have frameworks allowing stable NAV MMFs have been rated as ‘Fully Consistent’ as it appears that their regimes have put in place safeguards consistent with the 2012 Policy Recommendations regarding stable NAV MMFs.

5.2. Recommendation-by-Recommendation Analysis

Recommendation 4: *Money market funds should comply with the general principle of fair value when valuing the securities held in their portfolios. Amortized cost method should only be used in limited circumstances.*

Recommendation 4 provides that MMFs should value AuM in accordance with the general valuation principle of fair value, while recognizing the possible use of amortized cost method under limited circumstances. The Means of Implementation (MoI) further clarify that mark-to-market valuation should be used if market prices are available, reliable and up-to-date; and if such prices are not available or reliable, mark-to-model method could be used. With respect to the use of amortized cost accounting (ACA), IOSCO recommends that the use of this valuation method be subject to strict conditions and monitoring, recognizing that the “risk of mispricing increases with longer term underlying assets”. As such, IOSCO recommends the following specific conditions for using ACA: (1) ACA should only be used when it is deemed to allow for an appropriate approximation of the price of the instrument; (2) it is restricted to instruments with low residual maturity and in the absence of any particular sensitivity of the

instruments to market factors; (3) it has a residual maturity of no more than 90 days; and (4) there are materiality thresholds and escalation procedures in place to ensure corrective actions are promptly taken when ACA no longer provides a reliable approximation of the price of the instruments.

Participating jurisdictions reported their implementation progress based on the following questions:

- Does the regulatory framework define the rules applicable to valuation of assets of MMFs?
- Where the fair value principle is permitted for MMFs, please briefly discuss the applicable valuation method and the related conditions.
- Where ACA is permitted for MMFs, please briefly discuss the specific type of conditions applicable to the use of this valuation method.

Participating Jurisdictions which require MMFs to value their AuM following the requirements mentioned in the recommendation and MoI would be assessed as ‘Fully Consistent’. If gaps are identified, the RT assessed the extent of such shortcomings and evaluated whether and to what extent such shortcomings cause impacts on the intended outcomes, taking the relevant mitigants into account.

Fair value principle

All the Participating Jurisdictions set out fair value as the fundamental principle for valuation. All jurisdictions except for China set out a “waterfall” structure of valuation methods that requires MMFs to use mark-to-market principally, and where it is not available or reliable, allows to use mark-to-model or other alternative methods. While China stipulates that “sound and appropriate accounting and valuation methods” should be employed, it is not entirely clear whether there is a basic principle to use market price where available and reliable.

Conditions for the use of ACA

Contrary to the responses with regard to the fair value principle, the RT observed difficulties to impose all the conditions recommended in the MoI for the use of ACA. All the jurisdictions where the use of amortized cost method is permitted set out certain types of conditions including limit on eligible instruments, materiality thresholds for escalation and maturity limits. However, with regard to the 90 days maturity limits at instruments level, EU jurisdictions (regarding public debt CNAV funds), Japan and China allow using the amortized cost method for the valuation of individual assets whose residual maturity is more than 90 days. While these jurisdictions set out several safeguards as described in Table 4 below, including maximum average residual maturities (weighted average maturity or WAM or weighted average life or WAL) at the portfolio level, such arrangements still allow the use of ACA to value all the instruments comprising the portfolio.

Table 4 – Maturity Limits and Other Mitigants

	Maturity limit (instruments)	Maturity limit (portfolio)	Other mitigants
EU (public debt CNAV)	<397 days	WAM<60 days WAL<120 days	Portfolio level materiality threshold – 20 bps (LVNAV MMFs) Only public debt instruments are eligible or are even mandatory for CNAV MMFs

Japan	<= 1 year	WAM<60 days WAL<90 days	Portfolio level materiality threshold - 25 bps and 50 bps Public debt instruments and bond instruments with certain level of creditworthiness are eligible
China	<= 1 year (Bank deposits, bond repo, CB bills and NCDs) <=397 days (Bonds, debt financing instruments of non-financial enterprises and ABS)	WAM<120 days	Portfolio level materiality threshold – 25 and 50 bps Investment limit (see left)

The Review Team observes that Brazil prohibits MMFs from using ACA. India also has adopted a strict measure that limits the use of ACA for those instruments for which a market price is not available and where the residual maturity is up to 30 days; there is also a materiality threshold that allows MMFs to use ACA only if the amortized cost price is within a threshold of +/- 0.025% of the prices of the instruments provided by the valuation agencies appointed by the MMF. The US limits the use of ACA in all funds for instruments whose residual maturity is greater than 60 days²⁵. For CNAV MMFs, the US sets out 2 tier materiality thresholds: if the shadow NAV deviates downward from the intended stable price by more than 0.25%, the MMF is required to file Form N-CR with the SEC (to increase MMFs’ transparency and permit investors to better understand MMFs’ risks); if the market based price per share and the amortized cost price deviate by more than 0.5%, the funds’ board must promptly consider what action, if any, should be initiated by the board ²⁶.

Conclusion

The RT observed and welcomed the efforts taken by the participating jurisdictions to improve the transparency of the value of individual assets under management. While some jurisdictions maintain the possibility of the use of ACA for evaluating individual assets whose residual maturity is more than 90 days, these jurisdictions also set out several safeguards to mitigate the risk of mispricing.

²⁵ See Money Market Fund Reform: Amendments to Form PF, Investment Company Act Release No. 31166 (July 23, 2014) [79 FR 47736 (Aug. 14, 2014)] (“2014 Adopting Release”), at 280, available at: <https://www.sec.gov/rules/final/2014/33-9616.pdf>.

²⁶ 17 CFR 270.2a-7(g)(1)(i)(B). Regardless of the extent of the deviation, rule 2a-7 imposes on the board of a MMF a duty to take appropriate action whenever the board believes the extent of any deviation may result in material dilution or other unfair results to investors or current shareholders.

It should be noted that Recommendation 4 aims to address the risk of mispricing at individual asset level. Regarding the vulnerabilities arising from the discrepancy between the published stable price and the actual net asset value at portfolio level, Recommendation 10 proposes several additional safeguards.

Based on the information provided, the Review Team assessed that Brazil, India and the US are ‘Fully Consistent’. Due to the gaps identified above notably in relation to the use of ACA at the individual portfolio instrument level, the EU jurisdictions and Japan are rated as ‘Broadly Consistent’, while China’s framework is assessed as ‘Partly Consistent’ due to the lack of clear reference to market prices as a basic principle.

Jurisdictions	Rating proposed
Brazil	Fully Consistent
China	Partly Consistent
EU (France, Ireland, Luxembourg & UK)	Broadly Consistent
India	Fully Consistent
Japan	Broadly Consistent
USA	Fully Consistent

Recommendation 5: *MMF valuation practices should be reviewed by a third party as part of their periodic reviews of the funds accounts.*

Recommendation 5 requires that third parties should review the overall appropriateness of the valuation process of the MMF. The MoI requires that the Review should include: the sourcing of prices for valuing assets and, where ACA is used, the conditions for its use and the processes for calculating shadow NAV. Once weaknesses in valuation practices are identified, prompt remedial actions should be ensured (noting that the MoI do not prescribe any specific types of remedial actions).

Participating jurisdictions reported their implementation progress based on the following questions:

- Does the regulatory system require the review of the valuation procedures (including the sourcing of prices for valuing assets of MMFs) in place by a third party as part of their periodic review of the MMFs accounts?
- Does the regulatory system require the review of the conditions for the use of amortized cost accounting and the processes for calculating shadow NAV by MMFs?
- Does the regulatory system require responsible entities to take prompt remedial action when weaknesses in valuation practices are identified?

To be rated as ‘Fully Consistent’ the jurisdiction must require (1) the review of the overall valuation process by third parties, including the specified items above; and (2) prompt remedial actions be taken when weaknesses in valuation are identified.

For purposes of this Recommendation, the RT decided that a “third party” does not include, for instance, a board member of the MMF, but it is not required for the third-party to be an “independent” third party.

Third party review

The participating jurisdictions use two broad types of methods to comply with Recommendation 5, namely: (1) by establishing specific rules for MMFs with regard to the third party review of valuation practices; and (2) by ensuring that a review of valuation processes would be conducted based on the applicable auditing standards. Some jurisdictions employ both methods.

When conducting its assessment, the Review Team considered that “third party” necessarily refers to an external party (e.g. an internal body of the fund structure, such as the board of directors of a company by shares would not qualify as an external party), without necessarily requiring that such external party should be independent.

All the participating jurisdictions require external auditors to review valuation practices of MMFs. On this basis, all nine participating jurisdictions appeared to meet this aspect of Recommendation 5. Some jurisdictions prescribe additional specific requirements regarding third party review in the rules applicable to MMF. For instance, the EU UCITS and AIFM Directives task depositaries, including those of MMFs, with the duty to ensure that the value of the units of the MMF is calculated in accordance with the applicable requirements. The participating jurisdictions that allow using ACA set out the conditions for use as explained in the assessment of Recommendation 4 above. Given the existence of such conditions, a third party review of valuation practice would reasonably cover whether the practice would conform to the applicable conditions.

Prompt remedial action by responsible entities

To assess whether prompt remedial actions would be taken by responsible entities, the RT focused on the communication process from third party reviewers who identified weaknesses to responsible entities. Given that the fair value principle and related valuation rules are adopted by the participating jurisdictions as mentioned above, the information regarding the weaknesses in the valuation practices identified by third parties would reasonably lead the responsible entity to rectify the weaknesses by strengthening the robustness of valuation practices.

In this regard, almost all the participating jurisdictions appear to have adopted frameworks to require external auditors, depositaries or custodians to communicate with responsible entities so that the issues identified would be addressed; some jurisdictions set out a process to ensure that a reporting would be made to the authorities. Where the use of ACA is permitted, the participating jurisdictions set out numerical thresholds to gauge the deviation of the price calculated by ACA from the shadow NAV; and require MMFs to take corrective actions when the deviation reaches the threshold.

However, it should be noted that Brazil gives a 60 day period for fiduciary administrators of MMFs to amend the information provided to investors after the external auditor delivered the opinion to the authority; this appears to fall short of ‘prompt remedial action’.

Conclusion

The Review Team assessed that all jurisdictions appear to meet the requirement of the third-party review of the MMFs valuation procedures, but that shortfalls have been identified in relation to one with respect to the requirement under Recommendation 5 regarding the prompt remedial action to be taken by responsible entities once weaknesses in valuation procedures have been identified.

Jurisdictions	Rating proposed
Brazil	Broadly Consistent
China	Fully Consistent
EU (France, Ireland, Luxembourg & UK)	Fully Consistent
India	Fully Consistent
Japan	Fully Consistent
USA	Fully Consistent

Recommendation 6: *Money market funds should establish sound policies and procedures to know their investors.*

Recommendation 6 focuses on the aspect of regulatory frameworks requiring MMFs to put in place sound policies and procedures to know their investors, to identify patterns in investors' cash needs, their sophistication, their risk aversion, as well as to assess the concentration of the investor base and the MMF's ability to meet redemptions in case of concurrent redemptions by several investors.

Participating jurisdictions reported their implementation progress based on the following questions:

- Does the regulatory system require MMFs to put in place policies and procedures to know their investors?
- Do these MMF policies and procedures allow MMFs to identify material redemptions from both a single investor as well as concurrent redemptions of several investors and have MMFs to consider the effect of those material redemptions?
- What specific safeguards are available in relation to potential significant and unexpected redemption requests?
- Does the regulatory system allow for omnibus investor accounts in the context of MMFs?
- What MMFs investor related disclosure requirements at the time of subscriptions are applicable in relation to the specific safeguards on significant and unexpected redemption requests?

In that context, the RT determined that a 'Fully Consistent' rating requires MMFs to have policies and procedures to know investors, to identify material redemptions and its effect, to have safeguards for unexpected redemption requests, and to have disclosure requirements at the time of subscriptions on significant and unexpected redemption requests.

As the 2012 Report noted, practical impediments may restrict MMFs' ability to monitor its investors and the concentration of its investor base, particularly with respect to omnibus accounts. Accordingly, the RT decided that it would collect information about the use of omnibus accounts in each jurisdiction but that it would not be deemed an essential element for

purposes of rating on Recommendation 6. Table 5 below describes how the different elements of Recommendation 6 are included in each of the participating jurisdictions' regulatory framework.

Table 5 - Key elements of Recommendation 6

Jurisdictions	Regulatory framework to know the investors	Policies & Procedures to identify material redemptions	Specific safeguards for potential significant and unexpected redemption requests	Regulatory framework for omnibus investor accounts	Disclosure requirements at the time of subscription
Brazil	Yes	Yes	Yes	Yes	Yes
China	Yes	Yes	Yes	Not sufficient, as it does not appear to require managers to obtain relevant information other than investor concentration	Yes
EU (France, Ireland, Luxembourg and UK)	Yes	Yes	Yes	Yes	Yes
India	Yes India has mandatory Know Your Client (KYC) requirements for investors before they can start investing in MMFs	Yes	Yes	Omnibus accounts do not exist	Yes
Japan	Yes	Yes	Yes	Yes	Yes
US	Yes	Yes	Yes	Yes	Yes

Regulatory framework to know investors

Overall, all participating jurisdictions appear to have adopted regulatory frameworks which seek to allow managers of MMFs to know the investors of MMFs, although there are still major impediments to the ability of managers in some jurisdictions to have a full understanding of their investor base either directly or through their distributors. In Brazil, fund administrators are required to put in place an arrangement with their distributors to record the identification of investors. For China, the Review Team understands that the management institutions which sell MMFs to investors are required to obtain the investor details at the time of the initial subscription. There is however no clear evidence as to how managers of MMFs would be able to obtain up-to-date information with regard to investors of MMFs from the business institution. Know your client (KYC) procedures before investing in MMFs is a mandatory legal requirement in India. Furthermore, India imposes policies to identify material redemptions and to put in place safeguards to deal with the effects of material redemptions. In Japan, management companies are required to monitor money flows as well as potential events that could lead to large redemptions in collaboration with distributors. Under the EU MMF Regulation applicable to the EU participating jurisdictions and the UK, managers of MMFs should establish procedures with a view to anticipating the effect of concurrent redemption by investors, taking into account at least the type of investor, the number of units or shares in the fund owned by a single investor and the evolution of inflows and outflows. In the US, MMFs are required to adopt policies and procedures to consider the factors which could affect the MMF's liquidity needs such as characteristics of investors and their likely redemptions.

Policies & Procedures to identify material redemptions and safeguards for potential significant and unexpected redemption requests

As noted above, all participating jurisdictions appear to have policies to identify or to be able to anticipate material redemptions and to put in place safeguards to deal with the effects of material redemptions. Jurisdictions have different ways of dealing with the issue of material redemptions such as: stress tests to take into account redemption pressures; defining limits for material redemptions; limits on redemption from single investors; establishing a framework for evaluating redemption related risks on a periodic basis; adopting mechanisms to deter the occurrence of material redemptions; redemptions associated with particular events; postponing other remaining applications in case of breach of a particular threshold (i.e., gating); and suspension of redemptions. Further, in the event of material liquidity issues arising out of unexpected redemptions, Brazil has provision for the creation of side pockets. In the event of a material liquidity issue arising, apart from suspending subscriptions and redemptions, the Brazilian regime also provides for replacement of the fiduciary administrator and/or the asset manager; redemption in kind creation of a side pocket; and the liquidation of the fund.

Regulatory framework for omnibus investor accounts

All participating jurisdictions except India appear to have frameworks that allow for omnibus investor accounts. These frameworks allow participating jurisdictions to gather information on end-investors for liquidity risk management purposes (such as their type and the number of shares owned by a single investor, including in situations when investors invest in MMFs through omnibus accounts). Although it varies, all jurisdictions which have allowed omnibus investor accounts have frameworks for MMFs to know the underlying investor base of omnibus accounts. For instance, the rules in Brazil require administrators of MMFs to have updated information of each investor profile as well as the individual invested amount from the distributor. Managers in the EU participating jurisdictions, the UK, Japan and the US can establish arrangements with distributors, for example by contractual relationship, so that they could obtain information which is needed to fulfil the KYC requirement in each jurisdiction as

already mentioned above. In China, distributors are in charge of the fund registration process and managers would be able to obtain information regarding investor concentration. However, the Chinese regime does not appear to require managers to obtain other relevant information which is useful to identify potential material redemption requests from distributors.

Disclosure requirements at the time of subscription

All participating jurisdictions have disclosure requirements which MMFs at the time of subscription need to disclose to investors in documents such as: fund contract, prospectus, Key Investor Information Documents (KIID) or Key Information Documents (KID) in European jurisdictions, securities registration statement (initial disclosure), annual securities report (continuous disclosure) and other scheme related documents. The disclosure requirements broadly cover issues related to summary of risks, measure of liquidity risk management under the circumstance of material redemption, procedures for ensuring compliance with the liquidity thresholds, exit loads, restrictions on redemptions, usage of gates and others.

In India, regulatory provisions also require disclosure if there is a breach of the 25% limit by any investor over the quarter and a rebalancing period of one month would be allowed and thereafter the investor who is in breach of the rule will be given 15 days' notice to redeem his exposure over the 25% limit. Failure on the part of the said investor to redeem his exposure over the 25% limit within the aforesaid 15 days would lead to automatic redemption by the MMF on the applicable NAV on the fifteenth day of the notice period.

Conclusion

The Review Team assessed eight out of the nine Participating Jurisdictions as 'Fully Consistent'. Due to the gaps identified with regards to the requirement which obliges managers to obtain relevant information from distributors to identify potential material redemption where end investors are not visible directly from the manager, the Chinese framework has been rated as 'Broadly Consistent' for Recommendation 6.

Jurisdictions	Rating proposed
Brazil	Fully Consistent
China	Broadly Consistent
EU (France, Ireland, Luxembourg & UK)	Fully Consistent
India	Fully Consistent
Japan	Fully Consistent
USA	Fully Consistent

Recommendation 7: *Money market funds should hold a minimum amount of liquid assets to strengthen their ability to face redemptions and prevent fire sales.*

Recommendation 7 focuses specifically on the level of liquidity that MMFs should maintain. The aim is to ensure that funds have enough liquid assets to be able to sustain day-to-day activity and adverse market events. The Recommendation covers two key aspects regarding liquidity, which are:

- First, MMFs should hold a minimum level of liquid assets. This minimum has to be clearly defined in the regulatory framework. This can take various forms, for example a minimum amount to hold at any time, or daily and weekly liquidity ratios.

- Second, MMFs need to have the ability to adjust their pool of liquid assets if conditions change due to specific market developments, MMFs profile or their investor base.

Participating jurisdictions reported their implementation progress based on the following questions:

- Does the regulatory system define a minimum level of liquid assets that MMFs should hold?
- Are MMFs requested to adjust their holdings of liquid assets?

In that context, the Review Team (RT) determined that a ‘Fully Consistent’ regime is one that requires a minimum level of liquid asset that MMFs should hold and, requires the MMFs to adjust their level of liquid assets taking into account market conditions as well as funds specificities. Table 6 below summarises the answers provided by each jurisdiction:

Table 6 – Liquidity Requirements of each Participating Jurisdiction

Jurisdictions/ Requirements	Minimum level of liquid assets	Ability to adjust this level under specific circumstances
Brazil	Yes, Liquid assets = 95% of NAV	Yes
China	Yes, Liquid assets = 5% of NAV	Yes
EU	Yes, Daily ratio = 7.5 or 10% of NAV Weekly ratio = 15 or 30% of NAV	Yes
India	Yes, Liquid funds: liquid assets = 20% of NAV ²⁷ Overnight funds = only securities with 1 day maturity (100% of NAV) Money Market Funds = N/A	Yes
Japan	Yes, Liquid assets = 30% of NAV (assets with maturity of 5 days)	Yes
US	Yes, Daily ratio = 10% of total assets (for taxable MMFs) Weekly ratio = 30% of total assets (for all MMFs) Illiquid securities < 5% of total assets	Yes

²⁷ this requirement has only come into force after the cut-off date for the assessment

Minimum level of liquid assets

As described in the table, all jurisdictions have introduced a requirement for MMF to hold a minimum level of liquid assets. These thresholds vary however significantly between the assessed jurisdictions and may reflect market, fund or asset specificities. For instance, all jurisdictions, except Brazil, which has only one category of MMFs (Fixed Income Short-Term funds with VNAV) have several categories of MMFs²⁸ (see also section on description of each market under Annex D) and therefore have adopted different minimum levels of liquid assets for each of them.

For all jurisdictions except Japan, the liquidity requirements must be met on a continuous basis. The EU and the US went further by introducing daily and weekly liquidity ratios. As for Japan, the minimum liquidity requirement of 30% of the NAV has to be met every 5 days, which de facto makes it a weekly ratio.

With regards to the Indian framework, the RT has found that there were no requirement for liquidity buffers at the time of the Review. For the Money Market Funds category the Review Team found that the framework does not foresee a clear and specific threshold for this category of MMF. However it should be highlighted that a requirement has been introduced with regard to the Liquid Fund category where MMFs are required to hold an amount of liquid assets corresponding to a liquidity buffer of 20%²⁹ of the NAV since 1 April 2020. The rules for Overnight Funds require these funds to only invest in liquid assets (with maturity of maximum 1 day).

Although not part of the Review, it appears that the definition of the instruments each jurisdiction deems liquid for the purpose of this minimum threshold also varies significantly. The Review Team notes that the participating jurisdictions have also defined, with various degrees of details, categories of eligible and liquid assets in which MMFs can invest. In the EU, there is an explicit prohibition which imposes on MMFs not to undertake short sale of any of the following instruments: money market instruments, securitisations, asset-backed commercial papers and units or shares of other MMFs; taking direct or indirect exposure to equity or commodities; entering into securities lending agreements or securities borrowing agreements, or any other agreement that would encumber the assets of the MMF; borrowing and lending cash. In India, overnight funds cannot invest in instruments with maturity longer than 1 day. In addition, some jurisdictions explicitly prohibit funds to invest in certain types of assets (*e.g.*, EU³⁰, India³¹). The Indian regime also stipulates that Liquid and Overnight funds shall not invest in debt securities having structured obligations (SO rating) and/or credit enhancements (CE rating).

Adjustment of liquid asset level

All jurisdictions have provisions in their respective frameworks that give MMFs the ability to adjust their levels of liquid assets. In all the jurisdictions, the first and systematic requirement

²⁸ The EU has short-term (either CNAV, LVNAV or VNAV) and standard MMFs (which are only VNAV). The US has “Prime”, “Governmental”, “Treasury”, “Tax exempt” funds. Japan has Money Management (JMMF) and Money Reserve Funds (MRF). China has MMFs regulated by the CSRC that are CNAV and 6 pilot MMFs with VNAV. India has 3 types of MMFs: Money Market Mutual Funds, Liquid Funds and Overnight Funds. Brazil only has as MMF, so called Fixed Income Short-Term funds (ST).

³⁰ EU MMF Regulation: Article 9

³¹ Indian framework : Circular – September 20, 2019

is that when the MMFs liquidity falls below the prescribed levels or could deteriorate, MMF managers shall, as a priority objective, restore/increase liquidity levels.

These adjustments are based on various factors, such as market conditions, the MMF profile or investor base. Some jurisdictions have more detailed requirements than others and take into consideration additional factors such as concentration risks, credit risks, operational risks, moral hazard or counterparty credit risks. It is to be noted that jurisdictions often mentioned stress tests as a tool used by MMFs to adjust their liquidity levels.

Amongst the different jurisdictions, the RT also noted the following specificities:

- Although not in place at the time of the Review, the Chinese framework plans to implement changes designed to give particular attention to concentration risks with several requirements using as a metric the level of concentration by the 10 top shareholders (in effect on 1 April 2020). For instance, if the top 10 shareholders hold more than 20% or 50% of a fund's units, the MMF would have to adapt the maturity (WAM) of its assets.
- The Brazilian regime uses two main metrics, which are the level of Liquid Assets (LA) and the Predicted Cash Outflow (PCO). When PCO is more than LA, funds are required to take action.

Conclusion

Overall, Recommendation 7 has been implemented by all participating jurisdictions with various degrees of specificity which generally reflect the diversity of MMF types and the purposes they serve. Differences exist in both the minimum amount of liquid assets MMFs are required to hold and the tailoring of this provision. Indeed, some jurisdictions have a single threshold while others have designed a more detailed approach with different and multiple thresholds depending on the type of funds or risks. Concerning the ability to adjust asset holdings, almost all jurisdictions request MMF to adjust their level(s) of liquid assets if these fall under the predefined threshold, but also other criteria are to be taken into account such as market conditions and MMF characteristics.

Regarding the Indian framework, its liquidity requirements for Liquid Funds came into force as of 1 April 2020 which is nine months after the cut-off date for the review. Furthermore, its Money Market Funds category does not appear to have specific liquidity requirements³².

It can also be noted that, while the IOSCO Recommendations do not contain a definition of liquid and eligible assets, jurisdictions have tried to define these categories with more specificity and even prohibit MMFs from investing in certain asset classes.

On the basis of the above, eight out of nine jurisdictions have been rated as 'Fully Consistent'. The Indian framework has been rated 'Broadly Consistent'.

³² SEBI, has, vide circular dated 6 November 2020, mandated money market mutual funds to hold minimum 10% of their assets in liquid assets. Therefore, the current provisions relating to the minimum liquidity buffer for MMFs are as follows: a) Overnight Funds – Not applicable; b) Liquid Funds – 20% of net assets (effective as from July 01, 2020); and c) Money Market Mutual Funds – 10% of net assets (effective as from February 01, 2021)

Jurisdictions	Rating proposed
Brazil	Fully Consistent
China	Fully Consistent
EU (France, Ireland, Luxembourg & UK)	Fully Consistent
India	Broadly Consistent
Japan	Fully Consistent
USA	Fully Consistent

Recommendation 8: *Money Market Funds should periodically conduct appropriate stress testing.*

Recommendation 8 of the IOSCO framework states that MMFs should periodically conduct appropriate stress tests as part of their liquidity risk management processes. Their purpose is to identify weaknesses in order to allow MMFs to better anticipate the behaviour of funds under specific potentially stressed circumstances. In that context, stress tests can help strengthen the liquidity profile of a MMF and more broadly its risk management. The scenarios of these tests could be adapted to the targeted funds by considering their specificities, and calibrated based on events that can be hypothetical and/or historical. A large range of events can be used in these scenarios ranging from a rise in interest rates to an increase in shareholder redemptions and even a credit event. The intensity of these events can also vary depending on the scenario. Periodic stress tests are important as market conditions can change and different threats can arise over time. When stress tests reveal specific vulnerabilities, MMFs should undertake actions to reinforce robustness. In this context, a wide range of actions can be taken by MMFs to restore their liquidity profile or adjust their investment portfolio.

Participating jurisdictions reported their implementation progress based on the following questions:

- Are MMFs required to periodically test their portfolios?
- What is the frequency for MMFs to stress test their portfolios?
- Are there conditions or circumstances in which MMFs are required to conduct more frequent stress testing?
- Are responsible entities required to take action when stress tests reveal specific vulnerabilities?

To be rated ‘Fully Consistent’, the Review Team decided that a regime should require MMFs to stress test their portfolios at least twice a year so to meet the requirements of periodical stress testing. MMFs should also be required to increase the frequency of stress testing under certain conditions and circumstances. In cases where vulnerabilities arise, funds should be required to take corrective action. Table 7 below summarises the answers provided by participating jurisdictions:

Table 7 – Key elements of stress testing for the Participating Jurisdictions

<i>Jurisdictions</i>	Mandatory stress test based on various scenarios/events	Frequency of stress tests	Ability to increase the frequency of Stress Test	Requirements to take action if vulnerabilities identified

Brazil	Yes	Appropriate to the fund's characteristics	Yes	Yes
China	Yes	Periodically	No	Yes
EU (France, Ireland, Luxembourg and UK)	Yes	At least bi-annually	Yes	Yes
India	Yes	Monthly basis	Yes	Yes
Japan	Yes	Quarterly basis	No, but funds can conduct ad hoc stress tests	Yes
US	Yes	At such intervals the fund's board of directors determines appropriate and reasonable in light of the current market conditions.	Yes	Yes

Periodic stress testing

In all of the Participating jurisdictions, MMFs are required to test periodically the liquidity of their portfolios based on various types of scenarios including specific events. Overall, the Review Team noted that jurisdictions are using hypothetical³³ or historical³⁴ scenarios and sometimes both³⁵. However, the hypothetical or historical nature of the scenarios is not always clearly stated³⁶ in their frameworks. Among the types of stress events, often funds are considering the impact of an increase in interest rates, increase in shareholders redemptions, and downgrade of portfolio or assets. Sometimes these events can be combined in a single scenario. However, they can also take the form of macro systemic shocks affecting the whole economy rather than focusing on a specific type of event. Such an adverse scenario could correspond to a scenario in relation to the GDP, or managers could replicate historical macro shocks that affect the economy as a whole.

Most of the time, jurisdictions require stress testing to be tailored³⁷ to the MMF specificities and in that context, some are more prescriptive than others. For instance, the EU framework,

³³ China, US

³⁴ Brazil

³⁵ EU (France, Ireland, Luxembourg, UK)

³⁶ India

³⁷ China, US, EU, Japan, Brazil

in addition to the provision on stress testing in the EU MMF regulation³⁸, also contains guidelines on the stress test scenarios for MMF and on liquidity stress testing for funds³⁹ (UCITS and AIF). On the other side, the Japanese regime contains general principles, which cover wide categories of risks such as credit, market and liquidity risks, and focuses only on a limited number of scenarios. The Indian framework requires asset management companies (AMC) to stress test both liquid and money market funds. In addition, the AMC must have documented guidelines on how to deal with adverse situations effectively. The stress testing policy has to be reviewed at least on an annual basis. However, it is to be noted that for overnight funds, stress tests are not required.

Frequency

Recommendation 8 states that the stress tests should be carried out periodically without defining further the frequency itself. In this context, the Review Team has decided that “periodically” would mean at least twice a year (or more than on an annual basis, with the precise frequency to be defined taking into account the specific circumstances).

Six⁴⁰ out of nine jurisdictions have clear provisions in their respective frameworks regarding the frequency. For the EU, the stress test should be carried out at least bi-annually, while for India it is on a monthly basis and for Japan, on quarterly basis. For the other⁴¹ jurisdictions, the frequency depends on the fund’s characteristics or with such frequency as determined to be appropriate by the board of the fund in light of current market conditions.

Concerning the requirement to increase the frequency of the stress testing in certain conditions or circumstances, seven⁴² out of nine jurisdictions have such a provision. Japanese MMFs may launch *ad hoc* stress tests if appropriate while for China, no circumstances or conditions that would trigger additional or more frequent stress testing are as such defined in the applicable framework.

Requirements to address vulnerabilities

All the participating jurisdictions appear to have in their frameworks provisions which clearly stipulate that in case stress tests reveal vulnerabilities, managers should take actions in order to strengthen the robustness (e.g., reinforce liquidity profile, asset quality) of their funds. The different frameworks have provisions that mandate the fund managers to formulate a plan to address the vulnerabilities identified. It is worth noting that while for some jurisdictions, namely the EU, US and Brazil, frameworks are relatively detailed regarding the possible measures and processes to put in place, for Japan and India, the description of actions to take in order to address vulnerabilities is relatively short and consist only of a general requirement.

It is also worth noting that the evaluation of the ability to address vulnerabilities focused only on the existence of such provisions in the framework. Recommendation 8 does not specify the

³⁸ EU MMF regulation available at <https://eur-lex.europa.eu/eli/reg/2017/1131/oj>

³⁹ Guidelines on stress test scenarios under the MMF Regulation, Final Report, 19 July 2019 available at https://www.esma.europa.eu/sites/default/files/library/esma34-49-164_guidelines_mmf_stress_tests_draft_final_report.pdf

⁴⁰ France, India, Ireland, Luxembourg, Japan, UK

⁴¹ Brazil, China, US

⁴² Brazil, France, India, Ireland, Luxembourg, UK, US

measures that could be envisaged or the specific procedures to put in place to address the vulnerabilities.

Conclusion

The Review Team rated all nine jurisdictions as ‘Fully Consistent’. All frameworks foresee stress testing requirements. However, the granularity of provisions can vary significantly depending on the jurisdictions. Despite the absence of requirements to stress test Overnight Funds, the Review Team has rated the Indian framework as ‘Fully Consistent’. Due to the specificity of these funds, stress tests can be considered as irrelevant.

Jurisdictions	Rating proposed
Brazil	Fully Consistent
China	Fully Consistent
EU (France, Ireland, Luxembourg & UK)	Fully Consistent
India	Fully Consistent
Japan	Fully Consistent
USA	Fully Consistent

Recommendation 9: *Money market funds should have tools in place to deal with exceptional market conditions and substantial redemptions pressure.*

The MoI regarding Recommendation 9 provides that subject to the applicable legal and regulatory frameworks and the specificities of their client base, MMFs should be able to use liquidity management tools, such as temporary suspensions, gates and/or redemptions-in-kind, to manage substantial investor redemptions. In addition, these tools help to prevent contagion among MMFs and more broadly to the financial sector. To address this issue, regulators may be empowered to require MMFs to use such tools in exceptional circumstances when trouble experienced by one or several MMFs could have implications to the broader financial system.

The use of such tools in exceptional circumstances needs to be disclosed to investors. In Recommendation 7, it is stressed that investors should be informed of funds’ practices in relation to the applicable procedures in times of stress, but the specific issue of disclosure is dealt with in Recommendation 14 which is not assessed as part of this Review. Such disclosures can take various forms such as pre-sale information that can be found in the prospectus of the fund. It can also appear in ex-post documentation such as regular annual/semi-annual reports or more specific/frequent reporting.

Participating jurisdictions reported their implementation progress based on the following questions:

- Does the regulatory system allow for MMFs to use specific liquidity risk management tools, depending on the applicable legal and regulatory frameworks and on the specificities of the MMFs client base?
- Do regulators have the ability to request that MMFs use specific liquidity risk management tools in certain circumstances?
- Does the regulatory system require the disclosure of appropriate information to investors in pre-sale and ex-post documentation on the liquidity management tools available to the MMF and/or the regulator in case of exceptional circumstances?

In order to be rated as ‘Fully Consistent’, the Review Team decided that the jurisdiction should permit MMFs to use various types of tools to address exceptional market conditions and substantial redemption pressures, as well as requiring appropriate investor disclosures about those tools.

While the tools available to national regulators are discussed in this report, this aspect is not an essential element of Recommendation 9 and thus jurisdictions’ responses to this question were not assessed as part of this review.

Liquidity risk management tools

All jurisdictions allow their MMFs to use certain specific liquidity risk management tools to deal with exceptional market conditions and substantial redemption pressures. One jurisdiction⁴³ allows for a limited number of tools while the rest allow more tools. In general, the use of these tools is limited in duration and by the liquidity levels.

Suspension of redemption (either temporary or permanent) is the most frequent tool allowed by jurisdictions. The use of suspension varies in duration and circumstances for each jurisdiction. For instance, in the EU, for CNAV and LVNAV MMFs⁴⁴, this tool can be used either when the weekly liquidity threshold falls below 10% or 30% and in this case the suspension can only last up to 15 working days. In Brazil, suspension of redemption can only last 5 days and after such period, an extra-ordinary general meeting must be organised to decide on the actions to be taken.

Liquidity fees can be used in several jurisdictions namely China, the EU, and the US. In the US for instance, liquidity fees (up to 2%) can be applied by non-government MMFs⁴⁵ depending on the liquidity levels (below 10 or 30% of total assets), in addition to other requirements⁴⁶. In China, the framework allows the collection of short-term redemption fees. Finally, in the EU, MMFs or their managers are required to apply liquidity fees, gates or suspension when weekly assets fall below 30% and redemptions exceed 10% (but the MMF can also take no action) or to either impose liquidity fees or suspend when weekly assets fall below 10%.

Gates or temporary suspensions of redemptions restrictions exist in the EU, the US and India. In the EU, this tool can be used when the level of the weekly liquidity ratio of CNAV and LVNAV MMFs falls below 30%⁴⁷. In the US (for non-government MMFs⁴⁸), this tool can also be used when its weekly liquid assets fall below 30% of total assets and the board determines that doing so is in the fund’s best interest. The gates must be lifted within 10 business days and cannot be imposed for more than 10 total business days over a 90 day-period. In the Indian regime, gates can be used in case of systemic risks or severe constraints on market liquidity or

⁴³ Japan

⁴⁴ In the EU framework, only 3 types of MMF are allowed: public debt CNAV, LVNAV (Low volatility NAV) and VNAV MMFs.

⁴⁵ Non-government MMFs would be prime and tax-exempt MMFs.

⁴⁶ 17 CFR 270.2a-7c (2).

⁴⁷ Article 34 of the EU MMF regulation on specific requirements for public debt CNAV MMFs and LVNAV MMFs.

⁴⁸ Government funds may voluntarily adopt fees and gates if the fees and gates are previously disclosed to investors.

the efficient functioning of markets and cannot last more than 10 days over a 90-day period⁴⁹. Other liquidity risk management tools allowed by some of the participating jurisdictions include the borrowing of cash, the use of side pockets, redemptions-in-kind, and the segregation of portfolios⁵⁰.

Overall, the Review Team observed that for this requirement, the various regimes assessed have similar provisions when it comes to certain tools, both in terms of duration and specific situations, as listed in the table below.

Table 8 – Summary of the various liquidity risk management tools that exist in each participating jurisdiction

Countries	Liquidity risk management tools
Brazil	Suspension of redemption Redemption in kind Side pocket Liquidation Replacement of the fund manager
China	Suspension of redemption Postponing redemption Delaying payment of redemption Liquidity fees Suspension of funds valorisation Swing pricing
EU (France, Ireland, Luxembourg, UK)	Suspension of redemptions Liquidity fees on redemptions Redemption gates
Japan	Suspension/cancellation of redemption and subscription request Sponsor support
India	Restriction on redemption Temporary borrowing to meet liquidity requirements Segregated Portfolio Exit Load on short term redemption
US	Gates (temporary suspension of redemption) Suspension of redemptions upon SEC approval (exceeding time period permitted by gates) Liquidity fees Sponsor MMF to provide support to MMF (purchase of portfolio assets) ⁵¹

⁴⁹ 17 CFR 270.2a-7(2)(c)(i).

⁵⁰ India

⁵¹ Sponsors of MMFs may also voluntarily decide to provide financial support to their MMFs. Rule 17a-9 under the Investment Company Act permits affiliated persons to purchase portfolio securities from a

Powers of Regulators

Seven out of nine jurisdictions grant the authority the right to review and approve the use of one or several tools by MMFs in certain exceptional circumstances. However as mentioned in the introduction of this section, this specific element of the IOSCO Recommendation 9 was not assessed in the context of this Review.

Disclosure to investors

A MMF must provide disclosures to investors (both pre-sale and ex post) about the possibility of it using and or the effective use of liquidity risk management tools in exceptional circumstances.

Overall, all jurisdictions have provisions in their respective regimes which require MMFs to disclose information on the possibility of their use of liquidity tools in exceptional circumstances. As described in Table 9, the Review Team noted that some regimes have more detailed disclosure requirements.

Table 9 – Description of Disclosure Requirements in Participating Jurisdictions

Countries	Pre-sale	Post-sales
Brazil	Essential Information Document, Regulation; Demonstration of performance, Supplementary information form.	Monthly report (complete portfolio composition) Monthly summarising the main risks (monthly profile)
China	Fund prospectus and other related documents	Annual reports Bi-annual reports Interim announcement on specific events
EU (France, Ireland, Luxembourg, UK)	Fund rules or its instruments of incorporation, fund prospectus, key information investor document, previous annual and bi-annual reports	Annual reports Bi-annual reports Interim announcement on specific events
Japan	Securities Registration Statement Fund prospectus Detailed fund prospectus (delivered upon request)	Annual Securities report
India	Scheme Information Document (SID) / Fund Prospectus, Key Information Memorandum	Funds to notify SEBI when imposing restrictions,

MMF provided that the purchase price is paid in cash and its equal to the greater of the security's amortized cost or its market value, including accrued interest. See 17 CFR 270.17a-9.

	(KIM) and other related documents.	Periodic disclosures such as: annual report, half yearly report, Other announcements in relation with specific events.
US	Disclosure of operations of fees and gates: Registration statement (prospectuses and statement of additional information (SAI)). MMFs are expected to provide details to investors and/or the SEC, as applicable, on the impact of the tools. Historical disclosure on use of liquidity fees and gates in the last 10 years in the SAI.	Disclosure upon imposition of fees and gates: MMFs are required to disclose certain significant events to the SEC and investors, through filing publicly available reports with the SEC (Form N-CR) and providing website disclosures. Update of the registration form Additional daily website disclosures regarding liquidity assets (both daily and weekly), net shareholder flows, current NAV and sponsor support ⁵² .

In all of the participating jurisdictions, MMFs have to provide pre-sale disclosures to investors. These disclosures can be made via a prospectus but also other types of documents such as key information documents (KID) or key investor information document (KIID) in the European framework. A common characteristic of the latter is to provide easily accessible information (readable, understandable) to retail investors. However, it is to be noted that KIDs/KIIDs generally do not provide sufficient information on liquidity management tools. Some jurisdictions also provide investors with the prospectus of the fund as well as annual and bi-annual reports where information about liquidity management tools can be found. In the US, the prospectus and/or Statement of Additional Information (SAI) must also disclose the situations in which a MMF may impose certain tools. Similarly, in Japan, different types of prospectuses are allowed and should be adapted to a retail public.

Concerning the post-sale documents, all jurisdictions have periodic reporting (annual, bi - annual, monthly). In addition, funds can publish public interim/ad hoc reports/press releases to inform investors on specific developments. In the US regime, there are also requirements for website disclosures.

It is to be noted that for the Brazilian framework, there is no requirement for the asset manager to provide a fund prospectus.

Conclusion

The RT has rated all nine jurisdictions as ‘Fully Consistent’ as they all allow for the use of liquidity management tools and require, in various degrees, specific pre or post sale disclosures to investors regarding the use of these tools.

⁵² Rule 2a-7(h)(10).

Jurisdictions	Rating proposed
Brazil	Fully Consistent
China	Fully Consistent
EU (France, Ireland, Luxembourg & UK)	Fully Consistent
India	Fully Consistent
Japan	Fully Consistent
USA	Fully Consistent

Recommendation 10: *MMFs that offer a stable NAV should be subject to measures designed to reduce the specific risks associated with their stable NAV feature and to internalize the costs arising from these risks. Regulators should require, where workable, a conversion to floating/variable NAV. Alternatively, safeguards should be introduced to reinforce stable NAV MMFs’ resilience and ability to face significant redemptions.*

In the context of the 2012 Report, Recommendation 10 addresses the specific issues affecting stable NAV MMFs, such as run risks and first-mover advantage that could occur in times of a stress or crisis situation (such as a credit or a sudden interest rate event), that is when stable NAV MMFs would potentially “break the buck”. IOSCO recommends that stable NAV MMFs convert to floating “where such move is workable”, and where that is not the case, jurisdictions should develop additional safeguards to reinforce stable NAV MMFs’ resilience to losses and their ability to satisfy significant redemption requests. Other measures that can demonstrate to achieve the outcome of reducing run risk and addressing the first mover advantage also may be implemented to meet this recommendation.

Participating jurisdictions reported their implementation progress based on the following questions:

- Does the regulatory system allow for stable NAV Money Market Fund?
- Does the regulatory system require those stable NAV Money Market Fund to convert into floating NAV funds over time?
- Where stable NAV MMFs are permitted, does the regulatory system impose specific additional safeguards to reinforce resilience to losses (avoiding to “break the buck”)?
- Where stable NAV MMFs are permitted, does the regulatory system impose a specific stress-testing to be conducted so to ensure that the mechanisms under the previous question are sufficient?
- Where stable NAV MMFs are permitted, does the regulatory system impose a specific disclosure of the various safeguard mechanisms to investors, including but not limited to, where applicable, mechanisms affecting investor redemption right?
- Where stable NAV MMFs are permitted, are there any types of investors’ disclosure requirements applicable so as to differentiate MMF from guaranteed product?
- Does your regulatory system define criteria determining which funds fall in / out of scope of the regulation?

The three different scenarios under Recommendation 10

In its Review, the Review Team decided that a regime can be considered as ‘Fully Consistent’ when (i) stable NAV MMFs are not allowed; (ii) when a mandatory conversion of existing stable NAV MMFs has been put in place; or (iii) when stable NAV MMFs are allowed but that adequate safeguards to reinforce stable NAV MMFs resilience and ability to face significant redemptions are in place.

With respect to the assessed jurisdictions, the situation in relation to the above three scenarios is as follows. Two of the assessed jurisdictions have a regime where no stable NAV MMFs are permitted (Brazil and India). These jurisdictions are hence rated as ‘Fully Consistent’ in relation to Recommendation 10 without any further analysis. These jurisdictions only allowed variable NAV MMFs already prior to 2012, implying that this situation is therefore not as such the result of specific post-2012 policy measures that have been put in place.

In the case of the US market, prior to 14 October 2016, virtually all US MMFs were CNAV MMFs⁵³. As a result of the 2014 reforms, only government⁵⁴ MMFs and retail MMFs are permitted to operate as CNAV MMFs. Institutional prime and institutional municipal (or tax-exempt) MMFs are required to operate as VNAV funds.

In the other assessed jurisdictions, no jurisdiction has put in place a mandatory conversion to variable NAV MMFs. In China, all MMFs are historically CNAV MMFs, but six “pilot” VNAV were launched in August and September 2019. At the time of the review, those VNAV MMFs were still in the pilot phase and no information on the conditions and/or timing of a possible mandatory conversion of existing CNAV MMFs into VNAV MMFs were available to the Review Team at the time of this review. The European participating jurisdictions and the US⁵⁵ continue to allow certain types of MMFs to maintain a stable NAV, but the national measures put in place in those jurisdictions following the post-2012 reforms have introduced limitations and specific requirements to the national stable NAV MMF regimes. Japan and China also allow for stable NAV MMFs with the specificity that in those jurisdictions, all MMFs are necessarily stable NAV funds, whereas in the European participating jurisdictions and the US, stable and variable NAV MMFs co-exist.

In France the current situation is that the MMF market is composed exclusively of VNAV MMFs; there are no CNAV MMF in practice, even though since the entry into force of the EU MMF regulation, the legal framework in theory allows for CNAV MMFs to be launched (i.e., LVNAV and Public Debt CNAV MMFs).

Jurisdictions allowing for CNAV MMFs subject to safeguards and adequacy of the different safeguards in place

Based on the above, seven jurisdictions (all assessed jurisdictions except Brazil and India) have been analysed in view of the appropriateness of the safeguards put in place in relation to Recommendation 10 (that is scenario (iii) above).

On the basis of the wording of Recommendation 10, the assessment of those 7 jurisdictions aims at establishing if the different additional safeguard measures imposed by the regime applicable to stable NAV MMFs, which taken together are considered to allow for a reinforcement of the CNAV MMF’s resilience and ability to face significant redemptions. The

⁵³ As a result of the 2014 reforms, MMFs were given a two-year compliance date for MMFs to implement the floating NAV reform.

⁵⁴ “Government money market fund” means a MMF that invests 99.5% or more of its assets in cash, government securities, and/or repos that are “collateralized fully” by cash and government securities. 17 CFR 270.2a-7(a)(17). Some government MMFs limit their holdings to only U.S. Treasury obligations or repurchase agreements collateralized by U.S. Treasury securities and are called “Treasury money market funds.”

⁵⁵ In the US only Government MMFs (including Treasury MMFs) and Retail MMFs are allowed to display a stable NAV following the reforms introduced in 2014.

IOSCO Policy Recommendation refers in this context to the “*individual and collective effectiveness*” of those different safeguards.

Possible safeguards

Recommendation 10 does not provide a list of mandatory safeguards in relation to MMFs that continue to display a stable NAV in the post-2012 national MMF regimes. Policy Recommendation 10 rather provides some examples of possible safeguards (e.g. NAV buffers, sponsor commitment as well as liquidity fees or the MMF holding back a small portion of a shareholder’s investment).

All seven jurisdictions that do allow for CNAV MMFs to continue to exist have put in place a certain number of safeguards. As per the RT’s analysis, possible measures have been divided into two categories. A first category of measures relate to the functioning/management of the MMF and refer to measures which are designed to ensure that a stable NAV MMF is able to disclose a stable NAV in normal market circumstances as well as, to a certain extent, in a stress situation (including a credit stress situation). The second category of measures covers measures designed to address the consequences of a stress situation when such situation has actually occurred. Given the recommendation of collective effectiveness of the safeguards in place, the Review Team determined that ‘Fully Consistent’ means the national regimes should provide for safeguards of both categories.

The first category of measures which regulate the functioning of a given MMF are mainly prescriptive rules in relation to the type of eligible assets, rules on minimum liquidity ratios applicable to assets in a given portfolio, maturity requirements applicable to such portfolio assets, specific stress-test requirements and also rules in terms of eligible investors and disclosure requirements (pre-contractual or on-going disclosure to investors and/or the board of the stable NAV MMF). In relation to this category of measures it appears that the stable NAV MMF regimes in all 7 jurisdictions comprise of certain of those measures. In this context all 7 jurisdictions have, for example, quantitative and qualitative limits on eligible assets for stable NAV MMFs (such as defining the types of eligible assets, rules on maturity of individual assets as well as rules on maximum average maturity and duration of the portfolio as such through rules on weighted average maturities (WAM) and weighted average life (WAL)), thereby reducing potential interest rate, liquidity and credit risk exposures of stable NAV MMFs. Another common safeguard measure is liquidity buffer/threshold that is required in all participating jurisdictions as well as specific stress-testing requirements.

The second category of rules addresses large deviations between the constant NAV and the shadow NAV based on a full mark-to-market/model valuation and/or for large investor redemption requests, such as rules prescribing the calculation of a shadow NAV and a mandatory conversion to variable NAV under predefined circumstances, gating, optional/mandatory/temporary or permanent suspensions, sponsor guarantees or liquidity fees. In relation to this type of safeguards, the Review Team assessed that all 7 jurisdictions require one or more measures of this type. For example, all jurisdictions have specific provisions on possible temporary suspensions as well as in relation to gating of redemption requests. The Review Team further notes that all 7 jurisdictions except Japan mandate the calculation and publication of a shadow NAV⁵⁶.

⁵⁶ While Japanese regime does not require responsible entities to calculate a Shadow NAV at portfolio level, they are obliged to track the deviation between fair value of individual assets.

In relation to the various safeguard measures, IOSCO considers that those should be designed to reduce the run-risk and first-mover advantage, and to internalize the costs arising from the risks specific to stable NAV MMFs. The various measures of the first category that jurisdictions have put in place are generally specific to stable NAV MMFs. In line with IOSCO Recommendation 10, those measures are specific to stable NAV MMFs, in that they are specifically designed to support the MMFs’ ability to maintain a fixed NAV. The measures of the second category are not necessarily specific to stable NAV MMFs (e.g., temporary suspensions or gating), but appear to also contribute to what IOSCO considers the safeguards should be designed to ensure, that is avoiding a run risk of first mover advantage. On this basis the Review Team has considered both types of measures, that is those specific to stable NAV MMFs as well as those which are generally applicable to funds but which also enable achieving the recommended goals of IOSCO Recommendation 10.

Annex C outlines the different safeguards put in place by the participating jurisdictions and it appears that out of the jurisdictions that allow for stable NAV MMFs, all 7 jurisdictions have a regime where measures falling into both categories are imposed on stable NAV MMF.

In addition to including both categories of measures in the national MMF regimes, the Review Team noted that in some jurisdictions, the scope of stable NAV MMFs has been limited in the context of the post-2012 reforms. This is the case in relation to the US and Japan where certain MMFs are structured as stable NAV MMFs on the basis of taking into account their investor base. In those jurisdictions, MMFs addressed to retail investors (e.g., US Retail MMFs⁵⁷ and Japan Money Reserve Funds (MRFs)) are stable NAV MMFs as the run risk is deemed to be significantly lower in relation to retail investors (US) or to allow retail investors to benefit from a stable NAV (Japan). Japan has on this basis allowed sponsor support which is generally prohibited for other instruments in relation to Japan MRFs. In Europe, the types of stable NAV MMFs permissible, that is LVNAV or Public Debt CNAV MMF are subject to specific portfolio rules (different from the one generally applicable to MMFs) taking into account the fact that those MMFs display a stable NAV.

Conclusion

Given that all jurisdictions allowing stable NAV MMFs have put in place additional safeguards for their stable NAV MMFs which individually and collectively appear to be adequate and largely aligned between the different jurisdictions and taking into account considerations in relation to stable NAV MMFs in certain jurisdictions, the Review Team assessed all participating jurisdictions, including those that do not allow stable NAV MMFs as ‘Fully Consistent’.

Jurisdictions	Rating proposed
Brazil	Fully Consistent
China	Fully Consistent
EU (France, Ireland, Luxembourg & UK)	Fully Consistent
India	Fully Consistent
Japan	Fully Consistent
USA	Fully Consistent

⁵⁷ 17 CFR 270.2a-7(a)(21)

6. CONCLUSION

Reinforcing the safety of MMFs as well as reducing their potential to create or amplify systemic risks should continue to be a main driver of reforms in the MMF area in all jurisdictions. On the basis of their Review, the Review Team has taken note of the fact that in relation to the assessed jurisdictions and the IOSCO Recommendations assessed in the context of this Review, measures have been put in place in all jurisdictions that are designed to achieve these two general objectives. In relation to the Recommendations assessed in the context of the Review, the Review Team has not identified major deficiencies, but at the same time, this Review has further confirmed that the MMF markets in the different jurisdictions are very specific and different in nature and cannot, given the market specificities of each MMF jurisdiction, easily be compared with one another.

As explained in the Recommendation-by-Recommendation Analysis above, in some cases, the Review Team could not give ‘Fully Consistent’ ratings to some jurisdictions on certain IOSCO Recommendations. The Review Team encourages those jurisdictions to consider the existing requirements in light of the relevant IOSCO Recommendation.

Whereas the Review Team cannot espouse or offer recommendations on the specific aspects to any of the assessed jurisdictions, it encourages all jurisdictions to continue adapting their national frameworks on the specific non-‘Fully Consistent’ aspects identified as well as on the MMF regime generally, taking into account notably market specificities and evolutions in the role MMFs have as source of credit and liquidity.

In relation to the specific aspect of stable NAV MMFs, none of the jurisdictions that had stable NAV MMFs prior to 2012, had at the time of the Review put in place a mandatory move from VNAV for all CNAV MMFs. This being said, as a result of the 2014 reforms, US institutional prime and institutional municipal (or tax-exempt) MMFs are required to operate as VNAV funds, whereas China has indicated that it may mandate such conversion in the near future. Although the Review has confirmed that these jurisdictions have all put in place safeguards which take into account IOSCO Recommendation 10, the Review Team encourages jurisdictions to continue to monitor stable NAV MMFs.

ANNEX A – LIST OF PARTICIPATING JURISDICTIONS

1. Brazil
2. China
3. France
4. India
5. Ireland
6. Japan
7. Luxembourg
8. United Kingdom
9. United States of America

ANNEX B – ASSESSMENT METHODOLOGY AND QUESTIONNAIRE

Available at:

https://www.iosco.org/library/pubdocs/pdf/MMF_L2_TR_Assessment_Methodology_&_Questionnaire.pdf

ANNEX C – SAFEGUARDS IN PLACE IN JURISDICTIONS ALLOWING FOR STABLE NAV MMFs

	Safeguards to reinforce resilience to losses of stable NAV MMFs								
Jurisdiction	Brazil	China	France	India	Ireland	Japan	LU	UK	US
Restrictions for CNAV		-	X		X	-	X	X	X
Eligible investment rules		X	X		X	-	X	X	X
Maturity restrictions		X	X		X	X	X	X	X
WAM / WAL		X	X		X	X	X	X	X
Shadow NAV obligation		X	X ⁵⁸		X	X ⁵⁹	X	X	X
Mandatory VNAV conversion ⁶⁰			X		X	-	X	X	X ⁶¹
Compensation									
NAV buffers									
Accumulation returns									
Sponsor support		X	-. ⁶²		-. ⁵⁷	X	-. ⁵⁷	-. ⁵⁷	X
Liquidity fees		X	X		X		X	X	X
Liquidity buffer/threshold			X		X	X	X	X	X
Hold-back of portions		X							
Temporary suspensions		X	X		X	X	X	X	
Permanent suspensions									X
Gating		X	X		X		X	X	X
Redemptions in kind									X
Specific stress-testing			X		X	X	X	X	X
Investor disclosure			X		X	X	X	X	X

⁵⁸ Article 31(4) and 32(4) MMFR for European CNAV and LVNAV MMFs

⁵⁹ While Japanese regime does not require responsible entities to calculate a Shadow NAV at portfolio level, they are obliged to track the deviation between fair value of individual assets.

⁶⁰ For LVNAV funds only

⁶¹ As a result of the 2014 reforms, MMFs were given a two-year compliance date for MMFs to implement the floating NAV reform.

⁶² Under the European MMFR, article 35 in conjunction with recital 49 generally \$ prohibits external support

ANNEX D – MARKET DESCRIPTION OF THE PARTICIPATING JURISDICTIONS AND CHANGES OBSERVED IN THESE MARKETS

The US:

MMFs have existed as a type of registered investment company in the U.S. for over 35 years. US MMFs are a type of mutual fund registered under the Investment Company Act of 1940 (hereinafter, “Investment Company Act” or “Act”) and regulated by rule 2a-7 under the Act. A fund may not hold itself out as, or include in its name, “money market fund,” unless it complies with rule 2a-7. Rule 2a-7, adopted in 1983, has for many years addressed various aspects of the reform areas.

Different types of MMFs have been introduced in the U.S. to meet the varying needs of MMF investors. Historically, most investors have invested in “prime” MMFs, which generally hold a variety of taxable short-term obligations issued by corporations and banks, as well as repurchase agreements and asset-backed commercial papers. “Government” MMFs principally hold obligations of the US government, including obligations of the US Treasury and federal agencies and instrumentalities, as well as repurchase agreements collateralized by government securities. Some government MMFs limit their holdings to only U.S. Treasury obligations or repurchase agreements collateralized by US Treasury securities (referred to as “Treasury” MMFs). Compared to prime MMFs, government and U.S. Treasury MMFs generally offer greater safety of principal but historically have paid lower yields. “Tax-exempt” MMFs primarily hold obligations of state and local governments and their instrumentalities and pay interest that is generally exempt from federal or state income tax, as applicable.

Rule 2a-7 (together with other requirements applicable to mutual funds, including MMFs) addressed many of the reform areas before the SEC adopted significant amendments to rule 2a-7 and other rules and forms in 2010⁶³ and 2014.⁶⁴ The 2010 amendments were designed to make MMFs more resilient by reducing interest rate, credit and liquidity risks of MMF portfolios. In addition, the reforms increased the amount of information that MMFs are required to report to the Commission and the public (i.e., Form N-MFP, which includes monthly portfolio holdings). The 2010 amendments also required MMFs to undergo stress tests under the direction of their boards of directors on a periodic basis. The SEC’s 2014 amendments were designed to address MMFs’ susceptibility to heavy redemptions in times of stress, improve their ability to manage and mitigate potential contagion from such redemptions, and increase the transparency of their risks, while preserving as much as possible, their benefits. These amendments required a floating NAV for institutional prime money market funds and provide non-government money market fund boards new tools –liquidity fees and redemption gates—to address potential runs. In addition, the 2014 amendments were designed to make MMFs more resilient by increasing the diversification of their portfolios, enhancing their stress

⁶³ See Money Market Fund Reform, Investment Company Act Release No. 29132 (Feb. 23, 2010)[75 FR 10060 (Mar. 4, 2010)] (“2010 Adopting Release”), available here at <https://www.sec.gov/rules/final/2010/ic-29132.pdf>.

⁶⁴ See Money Market Fund Reform: Amendments to Form PF, Investment Company Act Release No. 31166 (July 23, 2014) [79 FR 47736 (Aug. 14, 2014)] (“2014 Adopting Release”), available at <https://www.sec.gov/rules/final/2014/33-9616.pdf>. Rule 2a-7 provisions are available at <https://www.govinfo.gov/content/pkg/CFR-2017-title17-vol4/pdf/CFR-2017-title17-vol4-sec270-2a-7.pdf>.

testing and improving transparency by requiring MMFs to report additional information to the SEC and to investors.

Prior to October 14, 2016, virtually all U.S. MMFs were CNAVs.⁶⁵ As a result of the 2014 reforms, only government⁶⁶ MMFs and retail MMFs are permitted to operate as CNAV funds. Institutional prime and institutional municipal (or tax-exempt) MMFs are required to operate as VNAV funds.

Besides limiting the types of MMFs that may seek a stable net asset value and tightening the rounding convention for floating NAV MMF shares, the 2014 reforms also imposed on all MMFs (other than government MMFs, which may opt in) the requirement to operate with the MMF's Board authority to impose a liquidity fee and/or redemption gate if liquidity in the MMF is depleted below specified levels.

In the context of the 2014 review of rule 2a-7, the SEC determined that the institutional MMFs should be required to have floating NAVs because institutional shareholders often respond more quickly than retail shareholders to potential market stresses, giving institutional shareholders "first mover advantage" in a CNAV fund, where shareholders who redeem first in a period of heavy redemptions can avoid the share dilution effects from the market and liquidity losses that non-redeeming shareholders face. Institutional MMFs also raise concerns about the risks of heavy redemptions from these MMFs in times of stress and the resulting negative impacts on short-term funding markets. An additional motivation for this reform was that the floating NAV may make it more transparent to certain of the impacted investors that they, not the MMF sponsors or the US government, bear the risk of loss.

In adopting its 2014 reforms, the SEC concluded that government MMFs should not be subject to the floating NAV⁶⁷. These MMFs face different redemption pressures and have different risks characteristics than other MMFs because of their unique portfolio composition (i.e., lower credit default risk and a highly liquid portfolio). In particular, most government MMFs always have at least 30% weekly liquid assets because of the nature of their portfolio (i.e., the securities they generally hold, by definition, are weekly liquid assets). In fact, N-MFP data for June 30, 2018 through June 30, 2019 shows the reported weekly liquid assets average to be almost 80% for government and Treasury funds.

In addition, government MMFs historically have experienced inflows rather than outflows in times of stress. Further, the assets of government MMFs tend to appreciate in value in times of stress rather than depreciate. Based on these considerations, and the more limited risk of heavy redemptions in government MMFs, the 2014 reforms were tailored appropriately to

⁶⁵ As a result of the 2014 reforms, MMFs were given a two-year compliance date for MMFs to implement the floating NAV reform.

⁶⁶ "Government money market fund" means a MMF that invests 99.5% or more of its assets in cash, government securities, and/or repos that are "collateralized fully" by cash and government securities. 17 CFR 270.2a-7(a)(17). Some government MMFs limit their holdings to only U.S. Treasury obligations or repurchase agreements collateralized by U.S. Treasury securities and are called "Treasury money market funds."

⁶⁷ 2014 Adopting Release, at 204.

permit government MMFs to implement the fees and gates reforms if they choose, but not apply the floating NAV requirement to these MMFs⁶⁸.

The SEC has observed that retail investors historically have behaved differently from institutional investors in a crisis and are less likely to make large redemptions quickly in response to the first sign of market stress. Accordingly, the SEC has determined that “retail MMFs” should not be required to adopt floating NAVs. A “retail MMF” means a MMF that has policies and procedures reasonably designed to limit all beneficial owners of the fund to natural persons⁶⁹. The SEC stated, in 2014, that the significant benefits of providing an alternative stable NAV MMF option justify the risks associated with the potential for a shift in retail investors’ behaviour in the future, particularly given that the retail MMFs will be able to use fees and gates as tools to stem heavy redemptions should they occur. The SEC also has defined “retail MMF” based on shareholder characteristics and thus should minimize the potential for gaming behaviour by institutional investors⁷⁰.

As data shows, following the 2014 reforms, as expected⁷¹, there was a significant shift in assets away from institutional prime MMFs, into government and Treasury funds, which was mirrored in retail MMFs to a lesser degree.

Following the October 2016 compliance date, the percentage of assets for VNAV (institutional (prime and municipal) to CNAV funds has steadily increased⁷². As of October 2018, the percentage of VNAV to CNAV funds was approximately 12% to 88%. As of June 30, 2019, the percentages were 17% and 83%, respectively. Approximately 82% of the CNAV assets (or \$2.45 trillion) were held in government and Treasury MMFs. Compared to prime funds, government and Treasury MMFs generally offer greater safety of principal but historically have paid lower yields⁷³.

In comparison, 100% of institutional funds were VNAV. These represent approximately 17% (or \$631 billion) of US MMF assets. From September 30, 2016 to June 30, 2019, the AUM for VNAV funds increased by more than 160% from approximately \$247 billion to \$631 billion.

China:

MMFs in China are under the supervision of the China Securities Regulatory Commission (CSRC) and the sector has experienced rapid growth since its inception in 2003, with at certain times spectacular expansion of its assets under management growing, especially after the second half of 2013 due to the reform of interest rate liberalization and the sales extension

⁶⁸ The SEC noted that although government funds could opt-in to fees and gates, they expected these funds will rarely imposes fees and gates because their portfolio assets present little credit risk. 2014 Adopting Release, at 206 n. 643.

⁶⁹ 17 CFR 270.2a-7(a)(21).

⁷⁰ 2014 Adopting Release, at 219-20.

⁷¹ 2014 Adopting Release, at 624

⁷² All data is from publicly available Form N-MFP data.

⁷³ 2014 Adopting Release, at 11. The Commission recognized that its floating NAV reform could result in more efficient allocation of risk through a “sorting effect” whereby institutional investors in prime either remain in floating NAV MMFs and accept the risk of regular principal volatility or move their assets into alternative investment products better suited to their actual risk tolerance. *Id.*, at 154.

achieved by using Internet platform, although the bulk of the assets is managed by a limited number of key market players, making the MMF industry in China quite concentrated. The MMF market was initially driven by institutional investors, although the MMF sector is today mostly retail-based. All China MMFs were historically CNAV MMFs. On 1 October 2017, the China MMF reform, initiated in 2014, came into effect with the *Provisions for the Management of Liquidity Risks of the Public Securities Investment Funds* and the *Guiding Opinions on Redemption of Money Market Funds Distributed on Internet* (effective as of 2018) which provides rules for the MMFs distributed via internet. Following this, first (out of 6) pilot VNAV MMF in China was established August 2019. In parallel, the China market also has cash-based Wealth Management Products (WMP), valued by amortized cost method and with constant NAV, under the supervision of the China Banking and Insurance Regulatory Commission (CBIRC) but no official definition of those cash-based WMP does existed at the time of the review and no additional data in relation to those products was available to the Review Team.

In recent times, the AuM of China MMFs has continued to decline, given the interest rates environment and the fact that CSRC tightened the supervision of MMFs, impacting the banks, wealth management products having similar characteristics to MMF distributed capital. The CSRC aims at continuing to strengthen supervision of MMFs and consolidate the risk-control and compliance responsibilities of fund custodian.

Further, CSRC aims at maintaining stable growth of VNAV MMF depending on the outcome of the pilot project with the six VNAV MMFs. The six MMFs with VNAV were launched in August and September 2019 and have operated steadily since and CSRC plans to lead the VNAV MMF development gradually, taking into account the results of the pilot VNAV MMF project.

Given that the yield of MMFs is decreasing with the liberalization of interest rates and implementation of a series of liquidity risk control measures, the total AUM of MMFs keeps flat growth but tends to decrease.

As already outlined in the 2015 IOSCO peer review report, the Chinese MMF market shows a heavy concentration with the bulk of the assets being managed by a limited number of key market players. At the end of 2014, the largest five MMF asset managers held 51% of overall Chinese MMF assets by the end of 2014. Among these, Tian Hong Zeng Li Bao fund, the MMF linked to Alibaba's online investment fund (Yu'e Bao) and created in June 2013 quickly grew to become the largest Chinese MMF accounting for more than 26% of the market in China. This being said, by the end of September, 2019, the AUM of Yu'e Bao MMF reached 1.05 trillion RMB(149.57 billion USD), which is 660 billion RMB (94.02 billion USD) less than the highest point of 1.71 trillion RMB (243.59 billion USD), accounting for a 39% decline. With CSRC and PBOC having guided Yu'e Bao's implementation of various risk control measures to enhance risk resiliency since 2017, the fund managers set stricter product investing limits in line with the current legal framework and for liquidity risk control purpose (e.g. limiting the average remaining life of the portfolio to 60 days, increasing the proportion of high liquid assets to more than 30%, and prudentially accepting the investor subscriptions on sale-side).

Europe:

With respect to the European jurisdictions, the revision of the MMF regime post 2012 was operated by the adoption of the EU Money Market Funds Regulation (EU) 2017/1131 (MMFR), which became applicable as of 21 July 2018 (as of 21 January 2019 for MMFs that existed on 21 July 2018). Prior to MMFR, the European MMF framework was governed by the 2010 CESR guidelines on a Common Definition of European Money Market

Funds (CESR/10-049)⁷⁴, although those were not applied in a uniform manner in all EU Member States. In Europe, MMFs can operate under the rules of the Directive 2009/65/EC on Undertakings for Collective Investment in Transferable Securities (UCITS) or under the rules of the Alternative Investment Fund Manager (AIFM) Directive 2011/61/EU. In Ireland, France and Luxembourg, MMFs have in this context historically mainly operated under the UCITS rules (in Luxembourg, over 93% of the MMFs in terms of AuM are structured as UCITS, and in France this is the case for 90% of the MMFs assets). European MMFR rules allow MMFs to operate as CNAV as well as VNAV funds.

As it was the case generally previously under the CESR Guidelines, the European MMFR regime allows certain types of MMF (i.e., Short Term CNAV MMFs) to utilise the amortised costs method, which in the post MMFR regime is the case in relation to Public debt CNAV MMFs as well as in relation to Low Volatility Net Asset Value MMFs (LVNAV MMFs), although both types of funds are also required to calculate the value of their assets on the basis of mark-to-market or mark-to-model for the purpose of monitoring differences between the constant NAV and the NAV per unit or share.

In relation to the main European MMF markets, different developments have been observed in relation to the continuation of the existence of CNAV funds in the different markets post-MMFR. In Luxembourg and Ireland, the majority of the previous Short Term CNAV MMFs have converted into MMFR CNAV categories of MMFs, i.e., mainly the LVNAV MMFs as well as to a lesser extent the Public debt CNAV MMFs. As a result, LVNAV MMFs and Public debt CNAV MMFs represent the majority of the MMFs in Ireland (95% of the total MMFs) and Luxembourg (65% of the total MMFs). The situation is different with respect to France. In France, the current MMF market is exclusively composed of VNAV funds (84% of standard and 16% of short-term MMFs) largely denominated in EUR, USD for a residual part. In the UK, CNAV funds represent around 30% of the overall value of MMFs (in the form of LVNAV MMFs, no Public Debt CNAV MMFs).

Further description of the specificities of the different European markets is given in the next sections below based on information provided by the assessed jurisdictions.

Ireland

In Ireland, Money Market Funds (MMFs) have been authorised by the Central Bank of Ireland since the early 1990s. At this time, Irish MMFs were predominantly short term funds.

The regulatory regime for MMFs has evolved over time and they have grown to constitute a significant proportion of the investment funds sector in Ireland. For example, in 2010 the sector comprised of over EUR 310 billion in Assets under Management. This represented approximately 57% of all Irish UCITS and 45% of all Irish authorised investment funds at the time.

Prior to the EU Money Market Funds Regulation (EU) 2017/1131 (MMFR), while MMFs were authorised within the European Union, they were generally authorised under the UCITS regime. Individual Member States, including Ireland, applied local requirements to the authorisation and supervision of these funds. For example, the Central Bank of Ireland required Irish MMFs to undertake stress testing of their portfolios. It was also generally the case that Irish MMFs were rated by a credit rating agency and often by a multiple of agencies. In light of this, and in addition to obligations imposed under the UCITS regime, Irish MMFs complied

⁷⁴ Note: ESMA published an opinion (ESMA/2014/1103) on the review of the CESR guidelines on a Common Definition of European Money Market Funds (CESR/10-049).

with the portfolio related obligations laid down by those agencies adopting the most stringent in each context.

In the light of market events during the financial crisis, in 2008 it was agreed that a greater level of coordination between European National Competent Authorities was required, particularly in the case of MMFs, leading to the development of the 2010 CESR guidelines on a Common Definition of European Money Market Funds (CESR/10-049)⁷⁵. The Central Bank was a strong supporter of this development and introduced the final guidelines into the domestic regulatory regime as obligations on Irish MMFs.

The ESMA guidelines were superseded by the MMFR. The MMFR applies directly in Ireland with statutory instrument No. 269/2018 - European Union (money market funds) Regulations 2018 - ensuring full effect in Ireland.

France

France was the first⁷⁶ EU country to set up Money Market Funds (MMFs) or “SICAV monétaires” in 1981⁷⁷. These funds appeared in a context of liberalisation of the French financial sector as well as financial innovation & fiscal incentives. Among the drivers, we can mention the restriction imposed on the remuneration of deposits⁷⁸, the reform of French monetary market, the development of new financial instruments (short-term) and large bond issuances from public sector entities.

The dynamism of the French market over the 80s and 90s was mainly due to a combination of factors such as high liquidity and returns, low risk and low taxation. Also, this market was considered safe as MMFs were significantly investing in French assets (sovereign bonds and public companies). Since their launch, MMFs have been mainly used by corporate treasurers and institutional investors for cash management purposes while the proportion of retail investors (mostly via financial institutions) remained very limited⁷⁹. In the early 90s, MMF represented 80%⁸⁰ of short-term UCITS and more than 50%⁸¹ of total assets under management in France.

The French market, just like the other EU markets, has evolved substantively in the last decade. As stated under section 4.1. above, in terms of numbers, MMFs represent today about 17,4% of asset under management, while in 2009 MMFs represented around 40%⁸². Two main drivers can explain this evolution namely, regulatory changes in the EU (CESR guidelines – 2010, EU MMF regulation – 2018), and the low interest rate environment which makes it more challenging for MMFs to deliver substantial returns.

⁷⁵ Note: ESMA published an opinion (ESMA/2014/1103) on the review of the CESR guidelines on a Common Definition of European Money Market Funds (CESR/10-049).

⁷⁶ https://publications.banque-france.fr/sites/default/files/medias/documents/bulletin-de-la-banque-de-france_188_2012-t2.pdf (page 62)

⁷⁷ Marc Montoussé (2006), *Économie monétaire et financière* (2^e édition), Paris : Bréal

⁷⁸ Banks have tried to find alternative ways to provide returns to their clients and they used MMFs which appeared to be the adequate investment instrument at that time.

⁷⁹ [REVUE D'ÉCONOMIE INDUSTRIELLE — n°134, 2^{ème} trimestre 2011 \(table 2\)](#)

⁸⁰ [Note de conjoncture de l'Insee – Décembre 1990](#)

⁸¹ <https://www.lesechos.fr/2004/03/les-sicav-une-passion-francaise-1061077>

⁸² https://publications.banque-france.fr/sites/default/files/medias/documents/bulletin-de-la-banque-de-france_188_2012-t2.pdf (page 62)

At the end of September 2019, the French market was made up of 200 funds which were all VNAV and represented 20% of AuM in France for an amount of EUR 338 billion⁸³. Amongst the VNAV funds, MMFs can be split between short-term MMFs (WAM of portfolio should be less than 60 days) which represent 16% and Standard MMFs 84% (debt securities that may be less than two years to maturity; WAM of portfolio should be less than 6 months). It is to be noted as well that 40% of MMFs are also UCITS and 60% are AIF and represent respectively 90% and 10% in terms of AuM. These funds have a relatively strong domestic focus as they are mostly sold to French clients and invest primarily in French and European assets. French MMF are predominantly denominated in EUR. Another characteristic is that the French market is very concentrated with one fund representing 14% of the market, and the top 20 counting for 70%⁸⁴. While all French domiciled MMF have historically been structured as VNAV funds, since the entry into force of the EU MMF regulation, stable NAV funds can be launched in France (either as an LVNAV MMF or a Public Debt CNAV).

Luxembourg

The Money Market Funds market in Luxembourg is concentrated, in that the 5 biggest managers of Luxembourg MMFs represent about 75% of the market share of the MMFs in terms of net assets. MMF managers of Luxembourg MMFs are mainly part of banking groups originating from the US (50%). In addition to US based MMF managers, the origin of other managers is diversified among many European countries and to a lesser extent non-European countries as well. The USD is the major currency for MMFs in Luxembourg and it represents about 50% of the overall assets. Other significant currencies of MMFs are the EUR for about 25% and the GBP for about 20%. A number of MMFs in other currencies do exist as well although they represent a very small size in regard to the overall size of the MMFs in Luxembourg. In terms of investors, institutional investors typically use MMFs for the purpose of their treasury management.

As at 30 September 2019, the category of Short Term LVNAV MMFs was the largest MMF type in Luxembourg, accounting for about 50% of the net assets of MMFs. The second largest type of MMFs in size was the Short Term VNAV category which accounted for about 20%. Short Term Public Debt C-NAV MMFs and Standard MMFs are about equal in size, approximately amounting to 15% of the Luxembourg MMF market each.

Historically, the main portion of MMFs in Luxembourg has been set up as Short Term CNAV MMFs, for about 70-75% of the market share over time. Following the implementation of the MMFR which notably introduced Public Debt CNAV MMFs and LVNAV MMFs as a replacement for such MMFs, the following evolutions during the period June 2018 (i.e., end of month data just before the MMFR became applicable) and June 2019 (i.e., a few months after the end of the transitional period for existing funds) can be observed. Overall, total net assets (TNA) in EUR of Luxembourg MMF increased by 16% from EUR 268 bn to EUR 310 bn due to:

- a general increase of assets (in EUR) in existing funds; and
- a limited number of existing non-MMF funds that sought authorization as short-term or standard VNAV MMFs under the MMFR.

⁸³ [EFAMA statistics third quarter of 2019](#)

⁸⁴ Autorité des marchés financiers

As regards CESR CNAV MMF that constituted the major part of the Luxembourg MMF industry prior to the entry into force of MMFR (72% of the TNA as at 30/06/2018), they generally converted either to the new category LVNAV MMF (about 3/4 in terms of TNA) or Public Debt CNAV MMF (about 1/4) following the implementation of the MMFR. TNA remained fairly stable following these conversions (TNA of CESR CNAV MMF amounted to 193,7 bn EUR as at 30/06/2018 compared to the TNA of LVNAV and Public Debt CNAV MMF of 200,5 bn EUR as at 30/06/2019), although some investment fund managers launched new short term VNAV MMF in addition to their CESR CNAV MMF that have been converted to LVNAV MMF and/or Public Debt CNAV MMF.

CESR short term VNAV MMF generally remained short term VNAV MMF under the MMFR with similar total TNA, but the size of short term VNAV MMFs more or less doubled between June 2018 and June 2019 (TNA increased from EUR 32.2 bn to EUR 67.5 bn). This increase is mainly due to the launch of new VNAV MMF by initiators that previously offered only short term CESR CNAV MMF and to some existing non-MMF that sought authorization as short term VNAV MMF because they fell in the scope of the MMFR.

The category of standard MMF remained rather stable (TNA marginally increased from EUR 41.7 bn to EUR 41.9 bn as at June 2019).

The United Kingdom:

TNA in Money Market Funds authorised by the FCA are in the region of GBP 21.7 billion. As a component of the overall UK domiciled funds universe, MMFs represent around 2%. There are a total of 19 MMF provider firms in the UK, and at the time of the Review the FCA was not working on any new MMF applications.

There are no CNAV MMFs within the UK MMF universe. There are, however, LVNAV MMFs, comprising around 30% of overall value. The remainder are VNAV MMFs. The investor base of UK domiciled MMFs authorised by the FCA is primarily institutionally based (around 90% of AUM). The residual component is retail in nature with a mixture of direct and platform-based investors.

Japan:

The fundamental legislations governing MMF products in Japan are the “Act on Investment Trusts and Investment Corporations” (AITIC) and the “Financial Instruments and Exchanges Act” (FIEA). Based on these legislations, the detailed rules for day-to-day risk management are set out in the “Regulations on management of MMF, etc.” and its subordinate regulation published by the Investment Trust Association Japan, which is a Certified Financial Instruments Business Association under the Financial Instruments and Exchange Act and is capable of issuing binding rules for these products.

There have been two categories of MMF-type products under Japanese regime, namely the “Money Management Fund” (JMMF) launched in 1992 and the “Money Reserve Fund” (MRF) launched in 1997. JMMFs and MRFs are investment trusts which mainly invest in money market financial instruments as well as government and corporate bonds with limited maturities according to the relevant legal provisions.

In terms of AuM, JMMFs historically represented approximately one third of the combined MRF and JMMF TNA in 2010. JMMFs have nevertheless progressively reduced in size and market share. Since May 2017, no more fund managed in Japan is classified as the JMMF.

MRFs are products which securities companies (broker dealers) in Japan have been using for the purpose of settlement and pooling cash since their introduction, given mainly that those broker dealers are not allowed to accept deposits. Given this specific purpose, MRFs are as such structured as CNAV funds.

India:

SEBI (Mutual Funds) Regulations, 1996 (notified on December 9, 1996) and various circulars issued thereunder governs the regulations concerning Mutual funds in India. In India, a Mutual Fund is set up in the form of a trust, where

- The Sponsor forms the Trustee Company and the Asset Management Company (AMC).
- The sponsor should contribute at least 40% to the net worth of the AMC.
- Trustees holds the assets of the Mutual Funds in fiduciary capacity on behalf of the investors and are vested with the general power of superintendence and direction over AMC. Trustees act as first level supervisor and they oversee the functions of an AMC. Two thirds of the trustees should be independent persons who are not associated with the sponsors in any manner.
- AMC is responsible for managing the assets of the Mutual Fund in line with the stated investment objectives. The board of directors of such asset management company has at least 50% independent directors, who are not associate of, or associated in any manner with, the sponsor or any of its subsidiaries or the trustees.
- Trustees and the AMC shall with the prior approval of the Board enter into an investment management agreement.
- The custodian, who is registered with SEBI, holds the securities of various schemes of the fund in its custody on behalf of trustees.
- The details of investor in the schemes of Mutual funds are tracked by Registrar & Transfer agents.

Mutual fund under the regulation has been defined as a fund established in the form of a trust to raise monies through the sale of units to the public or a section of the public under one or more schemes for investing in securities including money market instruments or gold or gold related instruments or real estate assets: Provided that infrastructure debt fund schemes may raise monies through private placement of units, subject to conditions specified in these regulations.

Accordingly, the Regulations govern the various equity-oriented funds, debt-oriented funds, hybrid funds, ETFs, Fund of Funds, etc. Under the SEBI (Mutual Funds) Regulations, 1996 (hereinafter referred as 'MF Regulations') defines a **money market mutual fund** as a scheme of a mutual fund which has been setup with the objective of investing exclusively in money market instruments.

As per MF Regulations, Money market instruments include commercial papers, commercial bills, treasury bills, Government securities having an unexpired maturity up to one year, call or notice money, certificate of deposit, usance bills, and any other like instruments as specified by the Reserve Bank of India from time to time.

The following three fund categories share features of funds that are covered in the context of the current review:

1. Money Market fund: Money market fund can invest in money market instruments having maturity up to one year.
2. Liquid Fund: Liquid funds can invest in Debt and money market securities with maturity of up to 91 days only.
3. Overnight Fund: Overnight Funds can invest in overnight securities having maturity of 1 day.

All the above funds are under the ambit of MF Regulations and circulars issued thereunder. All mutual funds in India are required to compute NAV daily based on the principle of fair valuation and mutual funds with stable NAV are not permitted under our jurisdiction. Accordingly, all mutual funds in India are with variable NAV (VNAV).

In India, Money Market Mutual Funds (MMMFs) were introduced in April 1991 by the Reserve Bank of India (RBI) to provide an additional short-term investment avenue to investors and to bring money market instruments within the reach of individuals. Subsequently, MMMFs became more attractive to banks and financial institutions. The guidelines on MMMFs were subsequently incorporated into Securities Exchange Board of India (SEBI) (Mutual Funds) Regulations.

SEBI (Mutual Funds) Regulations, 1996 prescribed guidelines and framework regarding management of MMMFs in India. The framework governing MMMFs has since then evolved as SEBI introduced various regulations from time to time pertaining to various aspects of MMMFs such as investments, valuation, liquidity and credit risk management, exit load, performances advertisement, benchmarking, stress testing, etc.

MMMFs have continued to grow to constitute a significant proportion of the total assets managed by the mutual funds in India. Corporates in India started to park their surplus monies on a daily basis to these funds to get better yields which has led to the growth of these funds.

As on September 30, 2019, MMMFs contribute around 19.92 % of total AUM of the Indian mutual fund industry. The promoters of these funds are from varied backgrounds consisting of Indian Banks (both public sector and private sector), International financial institutions, Indian Financial institutions, Indian Conglomerates, and Indian Companies.

Clients of these funds are Corporates, Banks/Financial institutions, Foreign Portfolio Investors, High Networth Individuals (HNIs) and Retail investors. Corporates are the major investors in these funds followed by HNIs. Base currency of these funds is INR.

Brazil:

MMF funds in Brazil were initially created to provide solutions to cash management needs for investors, both retail and institutional (including other funds, which made use of those to put in place liquidity buffers). During the eighties and nineties, in view of the hyperinflationary environment in the Brazilian economy, MMFs were of critical importance as an instrument to preserve the value of the currency, when investors had to invest mainly in overnight financial investments. However, MMFs do not have, and never had, a vocation to someday be a major instrument to the industry.

In Brazil, banks have historically been the major providers of MMFs, even though some MMFs are also provided by independent asset managers. With the reduction of domestic interest rates, the issue of costs has become increasingly relevant, and thus, one evolution in this segment was the reduction of management fees. Today it is common for MMFs to operate on a zero rate, given that profitability, squeezed by liquidity needs, is affected by any rate fees and costs.