September 16, 2013

Securities and Exchange Commission Attn: Elizabeth M. Murphy, Secretary 100 F Street NE Washington, DC 20549-1090

## Re: Money Market Fund Reform, Number S7-03-13

Thank you for the opportunity to comment on the money market mutual fund reform proposals put forth by the Securities and Exchange Commission on June 5, 2013. The authors of this letter are Samuel Hanson, Assistant Professor of Business Administration at Harvard Business School, David Scharfstein, Edmund Cogswell Converse Professor of Finance and Banking at Harvard Business School, and Adi Sunderam, Assistant Professor of Business Administration at Harvard Business School. We write in our individual capacities as finance academics, not on behalf of Harvard or any other organizations with which we are affiliated.

The main alternatives outlined in the proposal would either require prime institutional funds to transact at a floating net asset value (Alternative One); or allow money market funds (MMFs) to impose liquidity fees and redemption gates in times of stress (Alternative Two); or a combination of the two. We think that the floating net asset value (NAV) alternative would not be a significant improvement over the status quo and that it would not meet the SEC's goals of "address[ing] the heightened incentives shareholders have to redeem shares in times of financial stress" and "improv[ing] the transparency of money market fund risks through more visible valuation and pricing methods." Moreover, we believe that liquidity fees and redemption gates could actually exacerbate the incentive for shareholders to redeem shares ("run") during a period of financial stress, and could thus be a step back relative to the status quo. Finally, even though prime institutional funds have been the source of most of the recent instability in the MMF sector, excluding retail investors from reform efforts is problematic. Given the history of instability in money markets, retail investors could become more sensitive to increases in risk during future systemic crises and could also be more prone to redeem their shares.

## **Alternative One: Floating NAV**

The floating NAV reform proposal would eliminate the so-called "penny rounding" provisions from rule 2a-7 for prime institutional MMFs but preserve these provisions for all other types of MMFs. These provisions allow MMFs to report and transact at a net asset value of \$1.00 as long as their "shadow" NAV has not fallen below \$0.995. The affected MMFs would be required to report and transact at their actual net asset values each day, just as all other mutual funds currently do. However, like all other mutual funds, the affected MMFs would be allowed to calculate their NAVs using historical cost accounting to value instruments with maturities under 60 days.

Advocates of floating NAV point to two potential benefits. First, floating NAV could, in theory, lower the probability of runs. Under the current stable NAV system, if the fund's true NAV is below \$1.00 but above the \$0.995 threshold, investors who redeem early receive \$1.00,

while investors who redeem later receive less than the true NAV, thereby encouraging early redemptions. To the extent that a floating NAV prevents investors from redeeming their shares at a price above their true value, it reduces the strategic incentive for early redemptions. Second, advocates of a floating NAV argue that daily fluctuations in the reported NAV in normal times could lead investors to recognize the inherent riskiness of MMFs, thus making investors less likely to panic in a crisis.

We believe these potential benefits of a floating NAV are significantly overstated. In practice, a floating NAV system would be almost identical to the existing stable NAV system. The basic problem stems from the illiquidity of secondary markets for commercial paper and other private money market instruments such as bank CDs. Due to the illiquidity of the underlying fund assets, the fund's NAV would largely be accounting or model-based estimates of prices rather than on actual transaction prices (as used by mutual funds holding equities or liquid debt instruments).<sup>1</sup> Moreover, under the SEC proposal, MMFs would be able to use amortized cost accounting for instruments with maturity under 60 days, which includes a majority of all MMF assets. Thus, as noted by the asset management firm, BlackRock, MMF share prices would barely fluctuate under a floating NAV system.<sup>2</sup> We are skeptical, therefore, that investors would come to recognize the inherent risks of MMFs in normal times and that they would then be less likely to panic in a crisis.

More importantly, the illiquidity of private money market instruments means that investors will still have strong strategic incentives to run as risk escalates under a floating NAV regime. While MMFs can easily sell liquid assets such as Treasury bills to meet initial withdrawals, once these liquid assets are exhausted, MMFs would be forced to meet subsequent redemptions by selling illiquid paper into a strained market at depressed, fire-sale prices. Other MMFs would then be forced to publish lower NAVs, which could lead to additional investor redemptions and more forced sales. Anticipating this downward price spiral, MMF investors would have strong incentives to redeem their shares early in a crisis before illiquid instruments have to be sold. Indeed, the recent financial crisis witnessed widespread runs on MMF-like cash-management products with floating NAVs, including ultra-short bond funds in the US and variable NAV MMFs in Europe.<sup>3,4</sup> In summary, run risk stems from combining illiquid assets

<sup>&</sup>lt;sup>1</sup> In this regard, MMFs are more similar to banks, which must make accounting-based assessments of loan portfolio value, than they are to equity mutual funds, which can easily mark their portfolios to market each day.

<sup>&</sup>lt;sup>2</sup> Blackrock (2012), "Money Market Funds: A Path Forward," BlackRock Viewpoint, 9/27/2012: <u>https://www2.blackrock.com/webcore/litService/search/getDocument.seam?venue=PUB\_IND&source=GLOBAL&</u> <u>contentId=1111173537</u>

<sup>&</sup>lt;sup>3</sup> Ultra-short bond funds are similar to MMFs in that they hold fixed-income securities with short maturities. However, the NAV of ultra-short bond funds floats. In August 2007, the NAVs of ultra-short bonds funds began to fall slowly and fund flows turned negative. Then in early March 2008, the NAV of all these funds dropped 2% and ultra-short bond funds experienced an outflow of 15% over the following month. Even though NAVs stabilized thereafter, moderate outflows continued throughout 2008, and by the end of 2008 assets of these funds were down more than 60% from their mid-2007 level. See "Report of the Money Market Working Group," Investment Company Institute, 2009, p. 105.

<sup>&</sup>lt;sup>4</sup> European MMFs come in two varieties: stable NAV funds and accumulating NAV funds, whose NAV varies over time. However, the stable versus variable NAV distinction explained none of the cross-sectional variation in withdrawals rates from European MMFs following the failure of Lehman Brothers in September 2008. Instead, withdrawals for both stable and variable NAV funds are related to measures of ex ante fund risk-taking and the

with the right to redeem shares on demand; it is the fundamental economic problem faced by all banks and bank-like entities such as MMFs. Switching to a floating NAV accounting system when underlying fund assets cannot be priced on a truly floating basis because of their illiquidity will do little to solve the deeper economic problem of investor runs.

While, to some extent, run incentives exist in other types of mutual funds that mark illiquid assets to market, there are several reasons to believe that the problem is more severe for MMFs. First, the strategic incentives to withdraw are stronger as the secondary market liquidity of the fund assets declines. MMF assets have far less secondary market liquidity than the assets held by most other mutual funds, including equity funds and long-term bond funds.<sup>5</sup> Thus, significant outflows from MMFs are more likely than outflows from other types of mutual funds to generate secondary market fire sales. Second, money markets are characterized by a highly risk-averse investor base, which normally devotes limited attention to monitoring and analyzing risks. Thus, as compared to longer-term capital markets where monitoring is always necessary, money markets are inherently more fragile and prone to severe freezes when monitoring suddenly becomes necessary. Third, runs on MMFs are likely to be more disruptive to the real economy than runs on other mutual funds because MMF assets are short-term liabilities of financial and nonfinancial firms. Firms rely on short-term credit markets to finance working capital needs that are necessary for their ongoing operations. Furthermore, financial intermediaries are heavily dependent on short-term credit markets. These intermediaries play a critical role in providing working capital finance to firms and short-term credit to households.

While we have focused on the problems created by illiquidity, it is also worth noting that an additional problem is created by the yield-seeking behavior of institutional MMF investors. Indeed, it has been documented that these investors often seek out yield in normal times, which encourages MMFs to invest in riskier money market instruments. These investors then aggressively redeem their shares in a crisis.<sup>6</sup> Thus, they are likely aware of the risks involved in investing in MMFs, but are tempted to take these risks with the expectation that they will be able to withdraw their funds before losses are realized in a crisis or with the expectation that the MMF industry will receive government support in crisis. The floating NAV system is unlikely to change the risk-seeking behavior of these investors.

Although the behavior of institutional investors has been a major contributor to the recent instability of MMFs, the difference in behavior between retail and institutional investors may not be sufficiently permanent to serve as a basis for long-term policy decisions. In particular, increases in the sophistication of retail investors, and improvements in the information technology available to them, may lead them to behave more like institutional investors over time. For instance, one explanation for the behavior of institutional investors is the availability of Internet portals that allow them to sort MMFs by yield and to easily transfer their cash to the

likelihood of sponsor support. See Jeffrey Gordon and Christopher Gandia (2013), "Money Market Fund Risk: Will Floating Net Assset Value Solve the Problem?" Columbia Law School working paper..

<sup>&</sup>lt;sup>5</sup> See Patrick McCabe, Marco Cipriani, Michael Holscher, and Antoine Martin (2013), "The Minimum Balance at Risk: A Proposal to Mitigate the Systemic Risks Posed by Money Market Funds," forthcoming *Brookings Papers on Economic Activity*.

<sup>&</sup>lt;sup>6</sup> Martin Kacperzyck and Philipp Schnabl (2013), "How Safe are Money Market Funds," *Quarterly Journal of Economics* 128(3), 1073-1122, and Sergey Chernenko and Adi Sunderam (2013), "Frictions in Shadow Banking: Evidence from the Lending Behavior of Money Market Funds," Harvard Business School working paper.

highest-yielding funds. If such portals are made widely available to retail investors, their behavior may come to resemble the behavior of institutional investors. This argues for including both retail and institutional funds in reform efforts.

## Alternative Two: Liquidity Fees and Gating

This alternative would allow MMFs to operate as they currently do in normal times, but would allow them to impose a 2% liquidity fee on redemptions if liquid assets fall below 15%. MMFs would also be allowed to temporarily restrict redemptions if this condition is met. Advocates of this alternative argue that such conditional restrictions help to discourage investor redemptions and control runs in the event of a crisis.

We have three main concerns about such liquidity fees and gating rules. First, they have an inherently micro-prudential focus. They are based on the condition of individual funds and aim to control the behavior of investors in individual funds. However, liquidity gees and gating rules can have significant macro-prudential consequences. In particular, news that one MMF has initiated redemption restrictions could set off a system-wide run by investors who are anxious to redeem their shares before other funds also initiate such fees or restrictions.

Second, rule 2a-7 already contains a gating rule, which has proven to be ineffective. In particular, a fund may suspend redemptions if its NAV falls below \$0.995—i.e., if it "breaks the buck." This rule incentivizes investors to redeem their shares at the first indication of trouble out of fear that their cash could be trapped in the fund if it suspends redemptions. New gating rules will simply exacerbate the incentives for investors to redeem early by making redemption fees or restrictions more likely.

Third, basing liquidity fees and the gating trigger on the fund's holdings of liquid assets discourages MMFs from drawing down on their buffers of liquid assets precisely when they should do so from a system-wide perspective, i.e., in a system-wide liquidity and funding crisis. The purpose of maintaining buffers of liquid assets is to allow funds to meet large redemption requests without withdrawing financing from private issuers. In addition, liquidity-based triggers would encourage MMFs to demand shorter maturity assets, making the financial system as a whole less stable. In particular, liquidity-based triggers would encourage MMFs to keep their buffers of liquid assets very high to avoid concerns about triggering redemption fees or restrictions. This would increase their demand for money market instruments that qualify as liquid assets, i.e. those that mature in five days or fewer. In response to this increased demand, financial institutions would have greater incentives to fund themselves with shorter term paper, making them more vulnerable to destabilizing runs. This undermines the broader macro-prudential goal of encouraging financial institutions to use longer-term, stable funding.

In our view, the proposed liquidity fees and gating rules could substantially reduce financial stability relative to the status quo. However, as discussed above, run risk will still exist if the floating NAV proposal is adopted. Further consideration must be given to policies that would mitigate the damage caused by such runs once they have already begun. For the reasons described above, the current proposal on liquidity fees and gates should not be the preferred policy solution.

## **Alternatives to the SEC Proposal**

In our comment letter to the Financial Stability Oversight Council, we argued that capital buffers would be more effective in controlling systemic risk than floating NAV and redemption restrictions.<sup>7</sup> We continue to believe that this is the case. Capital buffers reduce the incentive of funds to take excessive risk, and they reduce the incentive of investors to run. We believe that given the relative safety of MMFs in normal times, the buffer would not lead to a significant reduction in yield for MMF investors. However, if the SEC chooses not to adopt capital buffers, as seems likely given the current proposal, we would make the following recommendations.

<u>Recommendation 1</u>: Under the floating NAV proposal described in Alternative One, MMFs should not be allowed to use amortized cost accounting for instruments with maturity under 60 days. We agree with the Federal Reserve Bank Presidents that MMF assets should be required to use the same mark-to-market accounting that is currently used to compute shadow NAVs.<sup>8</sup> While run risk would still exist given the inherent illiquidity of MMF assets, this change would help to reduce the accounting-based source of run risk discussed above. Furthermore, the SEC should work to develop ways of more accurately assessing current market prices on illiquid money market instruments, although we remain skeptical that such an effort would be fully successful.

<u>Recommendation 2</u>: Liquidity fees and redemption restrictions described in Alternative Two should not be adopted.

<u>Recommendation 3</u>: If a floating NAV proposal is adopted it should include both retail and institutional funds.

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<sup>&</sup>lt;sup>7</sup> See Samuel Hanson, David Scharfstein, and Adi Sunderam (2013), "Harvard Business School FSOC Comment Letter", File No. FSOC–2012–0003.

<sup>&</sup>lt;sup>8</sup> See Rosengren, Eric et. al. (2013), Letter to the Financial Stability Oversight Council, http://www.bostonfed.org/news/press/2013/pr021213-letter.pdf