



2005 Market Street, Suite 1700 215.575.9050 Phone
Philadelphia, PA 19103-7077 215.575.4939 Fax

901 E Street NW, 10th Floor 202.552.2000 Phone
Washington, DC 20004 202.552.2299 Fax
www.pewtrusts.org

March 11, 2018

Nicholas A. Shufro
Assistant Administrator, Risk Management
Federal Insurance & Mitigation Administration
Federal Emergency Management Agency
400 C Street SW, Suite 313
Washington, DC 20472-3100

Re: Draft National Mitigation Investment Strategy

Dear Assistant Administrator Shufro:

The Pew Charitable Trusts appreciates the opportunity to review the Draft National Mitigation Investment Strategy (NMIS), which has been provided for public comment by the Mitigation Framework Leadership Group (MitFLG), chaired by the Federal Emergency Management Agency (FEMA). The NMIS is an important undertaking and Pew applauds its overarching goal, to coordinate and ensure effective investments in disaster mitigation.

In 2017, there were a record-tying 16 weather and climate disaster events in the U.S. each with losses over \$1 billion. The cumulative cost of these events exceeded \$300 billion, setting a new annual record for this country.¹ We must do more to protect communities from natural disasters. Research shows investments in risk reduction yield sizeable returns: in January, the National Institute of Building Sciences (NIBS) found that every \$1 spent on disaster mitigation grants by three federal agencies saves society \$6. In the case of riverine flooding, the benefit is \$7-to-\$1.²

In 2015, the Government Accountability Office (GAO) requested development of a fiscal strategy for disaster resilience,³ and the present draft shows significant progress. Pew supports the Fundamental Principles articulated in the document as well as many of its proposed outcomes and recommendations, while offering the suggestions below for the MitFLG's consideration.

¹ National Centers for Environmental Information (NCEI) U.S. Billion-Dollar Weather and Climate Disasters (2018). Since 2010, those losses have added up to more than \$405 billion, compared with nearly \$363 billion from 2000-09 and \$155 billion from 1990-99.

² National Institute of Building Sciences, *Natural Hazard Mitigation Saves: 2017 Interim Report* (2017), https://www.nibs.org/page/ms2_form.

³ GAO, Report to Congressional Requestors: Hurricane Sandy - An Investment Strategy Could Help the Federal Government Enhance National Resilience for Future Disasters, No. GAO-15-515 (July 2015), available at <http://gao.gov/assets/680/671796.pdf>.

Overall Comments

- **Pew Comment:** *Create an additional outcome to increase spending for mitigation in the pre-disaster timeframe.*

The nation cannot afford its current level of spending on post-disaster recovery. We can save on recovery by investing more in mitigation before disasters strike, and Pew believes the NMIS should clearly articulate this broad goal, while emphasizing the responsibility of the federal government to help with these investments. This high-level goal warrants its own Outcome or Fundamental Principle, or perhaps it could be incorporated more easily as a recommendation under Outcome 1.

From 2005 to 2014, the federal government obligated at least \$277.6 billion to disaster assistance but far less—just \$600 million—to FEMA’s Pre-Disaster Mitigation grant program that helps communities make improvements to better withstand future storms.⁴ Mitigation must account for a greater percentage of federal spending. This objective is consistent with the MitFLG’s goal of avoiding recommendations that would increase federal funding, as the NIBS report and many other studies⁵ show that mitigation leads to an overall decrease in expenditures.

Under Outcomes 2 and 3, the NMIS proposes greater investments and leadership by the private sector, non-profits, and State, Local, Tribal, and Territorial (SLTT) governments. In light of the relatively small amount of federal money historically designated for pre-disaster mitigation, the NMIS should also recommend more spending by the federal government for this purpose.

- **Pew Comment:** *Amend the strategy throughout with a clear identification of roles and responsibilities for FEMA and other federal agencies.*

As drafted, the strategy rightly emphasizes the need for improved coordination across various levels of government and the private sector, and it calls for enhanced efforts and involvement from the full range of entities with capacity to mitigate risks. While we agree that risk reduction will be greatly improved through collaborative, all-hands efforts, we are concerned that neither collaboration nor any of the strategy’s other important goals will be achieved without assignment of leadership roles. As the GAO underscored in its 2015 report to Congress calling for a national mitigation strategy, an effective strategy requires delineation of roles and responsibilities.⁶ We urge the MitFLG to address this missing element.

⁴ Government Accountability Office, “Federal Disaster Assistance: Federal Departments and Agencies Obligated at Least \$277.6 Billion During Fiscal Years 2005 Through 2014” (September 2016), <http://www.gao.gov/assets/680/679977.pdf>.

⁵ FEMA, “Hazard Mitigation Assistance Loss Avoidance Study Summaries,” (last visited February 8, 2018), <https://www.fema.gov/hmgp-loss-avoidance-studies>.

⁶ GAO, Report to Congressional Requestors: Hurricane Sandy - An Investment Strategy Could Help the Federal Government Enhance National Resilience for Future Disasters, No. GAO-15-515 (July 2015), <http://gao.gov/assets/680/671796.pdf>.

- **Pew Comment:** Consider writing investment strategies for other missions to ensure a streamlined approach to national preparedness, as called for in Presidential Policy Directive 8 (PPD-8).

To coordinate investments effectively, it is necessary to understand the broader landscape of spending on national preparedness, especially preparedness missions that overlap with disaster mitigation.

FEMA's National Preparedness Goal organizes national preparedness activities into five mission areas, one of which is mitigation. "All five mission areas integrate with each other through interdependencies, shared assets, and overlapping objectives."⁷ For example, the mitigation mission intersects the recovery mission area, in that the process of recovering from disasters must include the identification of risk reduction opportunities. And although the protection mission area differs from mitigation in its attention to security and threat deterrence, it shares with mitigation the goal of keeping infrastructure safe.⁸

Coordinating these missions was the main objective of PPD-8. Issued by the White House in 2011, this policy directive aimed to facilitate an integrated, all-of-nation approach to preparing for disasters, avoiding duplication of effort and streamlining actions.⁹ For each preparedness mission, PPD-8 required the federal government to develop synchronized planning frameworks, which detailed a shared understanding of each mission, but were not fiscally focused. The NMIS is a subcomponent of the mitigation framework, but the other frameworks lack investment strategies.

The federal government should consider investment strategies for the other preparedness missions in the spirit of national integration, as called for by PPD-8. These equivalent strategies would provide the MitFLG with important context to more fully achieve the NMIS goal of coordinating investments. Pew is interested to learn of any plans for additional strategies or comparable measures for ensuring a streamlined approach to preparedness.

Comments on Specific Outcomes and Recommendations

NMIS Outcome 1: Coordination of risk mitigation and management improves between and among federal, public, private, and non-profit sector entities. **Recommendations 1.1 and 1.2:** Develop common vocabulary for understanding risk and mitigation, and develop common metrics for evaluating mitigation and resilience.

⁷ FEMA, *Overview of the National Planning Frameworks* (July 2014), https://www.fema.gov/media-library-data/1406718145199-838ef5bed6355171a1f2d934c25f8ad0/FINAL_Overview_of_National_Planning_Frameworks_20140729.pdf.

⁸ FEMA, *National Mitigation Framework* (September 2016), https://www.fema.gov/media-library-data/1466014166147-11a14dee807e1ebc67cd9b74c6c64bb3/National_Mitigation_Framework2nd.pdf.

⁹ FEMA, "Learn About Presidential Policy Directive-8," (last visited February 8, 2018), <https://www.fema.gov/learn-about-presidential-policy-directive-8>.

- **Pew Comment:** *The NMIS should look to PPD-8 for guidance on cultivating a shared understanding of mitigation-related terms.*

After gathering input from stakeholders nationwide, PPD-8 provided definitions for national preparedness, resilience, mitigation, recovery, and a range of other preparedness terms.¹⁰ In the second edition of the National Preparedness Goal, PPD-8 also mapped out the core capabilities needed nationally to achieve each preparedness mission, thereby offering additional detail that supplemented the high-level definitions.¹¹ Although the National Preparedness Goal stopped short of supplying numerical targets, it did identify specific objectives to help stakeholders further understand each capability.¹² The NMIS references this work in the present draft, but the MitFLG should also consider using it as a starting point in developing a common vocabulary and metrics.

NMIS Outcome 3: *SLTTs increasingly empowered to lead risk reduction activities and share responsibility and accountability with the federal government. **Recommendation 3.3:** Public, private, and non-profit entities should align financial incentives and cost sharing for mitigation projects.*

- **Pew Comment:** *Expand the NMIS recommendation for the federal government to work with SLTTs to establish funds designated for disaster resilience, possibly integrating it with Recommendation 3.3.*

We are pleased the NMIS chose to include a state revolving loan fund in the present draft. The nation's resilience would greatly benefit from the federal government and SLTTs sharing costs for new state funds that would be specifically reserved for a range of pre-disaster mitigation activities. Because this recommendation empowers SLTTs to lead risk reduction efforts, we suggest it is most relevant to Outcome 3.

States are hard-pressed to prioritize mitigation during the havoc of disaster recovery, and could pursue more disaster mitigation with a stable source of funding available whenever opportunities for such projects arise. State revolving loan funds, in particular, would enable more communities to take risk reduction measures.

As proposed in a bipartisan Senate bill in 2017 (S.1507),¹³ each state's revolving fund could be capitalized with dollars from the federal government with additional contributions from the state

¹⁰ FEMA, "Learn About Presidential Policy Directive-8," (last visited February 8, 2018), <https://www.fema.gov/learn-about-presidential-policy-directive-8>.

¹¹ FEMA, "Core Capabilities," (last visited February 8, 2018), <https://www.fema.gov/core-capabilities>.

¹² FEMA, *National Preparedness Goal*, September 2015, https://www.fema.gov/media-library-data/1443799615171-2aae90be55041740f97e8532fc680d40/National_Preparedness_Goal_2nd_Edition.pdf.

¹³ Senator Jack Reed, "Reed, Colleagues Introduce Legislation to Enhance Proactive Flood Mitigation Efforts," (last visited February 8, 2018), <https://www.reed.senate.gov/news/releases/reed-colleagues-introduce-legislation-to-enhance-proactive-flood-mitigation-efforts>.

itself. Individual states would then manage their funds under the general principles established by the federal government but tailored to their unique risks and priorities.

Communities and property owners would receive low-interest loans from states to pursue mitigation. The approach allows each state to establish a relatively predictable flow of money to a pipeline of new projects. In this way, even a modest federal expenditure can leverage a large return on investment and foster an enduring commitment to preparation and mitigation.

Moreover, the revolving loan fund is a tested model, as states and municipalities have used such funds to support affordable housing, renewable energy, clean water, energy-efficiency, and other community needs. From 1987 to 2016, the Clean Water State Revolving Fund program, which finances improvements to wastewater infrastructure, leveraged \$41 billion in federal monies for \$118 billion in clean water infrastructure.¹⁴ This helps explain why there is public support—85 percent, according to a recent Pew poll¹⁵—for FEMA and state governments to offer low-interest loans to help reduce the risk of flooding.

Pew strongly supports the use of state revolving loan funds for nature-based infrastructure wherever feasible, as envisioned in the current NMIS draft. According to a study supported by Lloyd’s of London, coastal wetlands provided essential protection during Hurricane Sandy, reducing property damage by about \$625 million.¹⁶ Because the benefits of additional mitigation activities such as buyouts and structural changes to meet enhanced building codes also have a demonstrated societal and economic benefit, the MitFLG might consider expanding the applicable activities to include such measures. To mitigate the flood hazard, projects eligible for loan funds could include property elevation, floodproofing, and stormwater management. Application to more mitigation efforts would enhance the loan fund’s value, giving states more flexibility in deciding which activities to pursue, and truly empowering SLTTs to lead risk reduction activities and share more responsibility with the federal government.

- ***Pew Comment:*** *Include a recommendation to continue developing the public assistance deductible.*

The federal government should support state efforts by offering strong incentives. In 2017, FEMA released a detailed proposal for a new program, the public assistance deductible,¹⁷ which

¹⁴ Environmental Protection Agency (EPA), “Learn about the Clean Water State Revolving Loan Fund,” <https://www.epa.gov/cwsrf/learn-about-clean-water-state-revolving-fund-cwsrf>.

¹⁵ The Pew Charitable Trusts, “Poll Shows Nationwide Support for Feds to Boost Rebuilding Standards,” February 1, 2018, <http://www.pewtrusts.org/en/research-and-analysis/blogs/compass-points/2018/02/01/poll-shows-nationwide-support-for-feds-to-boost-rebuilding-standards>.

¹⁶ Narayan, S. et al., *Coastal Wetlands and Flood Damage Reduction: Using Risk Industry-based Models to Assess Natural Defenses in the Northeastern USA* (2016). See also, Executive Office of the President, *Standards and Finance to Support Community Resilience*, (December, 2016), https://obamawhitehouse.archives.gov/sites/default/files/omb/reports/omb_resilience_finance_report.pdf.

¹⁷ Federal Register, “Establishing a Deductible for FEMA’s Public Assistance Program,” (January, 2017), <https://www.federalregister.gov/documents/2017/01/12/2017-00467/establishing-a-deductible-for-femas-public-assistance-program>.

would provide such encouragement by rewarding state investments in risk reduction. We believe Outcome 3 should include the deductible, for the positive impact it would have on state engagement in mitigation.

Under the public assistance deductible concept, states would be expected to spend a predetermined amount of their own money to rebuild infrastructure after disasters, before federal funds become accessible. The amount would be conditioned on a state's commitment to mitigation; the more mitigation achieved prior to the disaster, the less money the state must spend before it can access federal dollars. 76 percent of Americans polled by Pew support the conditioning of federal funds in this manner.¹⁸

While this proposal has raised understandable concerns about shifting responsibilities for disaster response and recovery to state and local governments, we do not see its primary effect as transferring costs. Rather it would spur action by a level of government uniquely positioned to influence key decisions on land use planning, natural resource management, capital investment, and building requirements that can save lives and property.

NMIS Outcome 4: *Public, private, and non-profit sector entities improve risk communication, leading to more risk-informed mitigation investments by individuals and communities. Public, private and non-profit sector entities develop and share more of the data and tools needed to make risk-informed mitigation investments. **Recommendation 4.1:** Federal departments and agencies should enhance the availability and usability of federal risk and resilience data.*

- **Pew Comment:** *We recommend the Florida loss avoidance assessment approach as a model for federal agencies and other states.*

Pew supports the proposal under Recommendation 4.1 for federal departments and agencies to designate “resilience data stewards” to serve as points of contact for their department’s or agency’s data on disaster mitigation. We are also hopeful that state and local entities receiving federal grants or using their own resources to undertake mitigation projects begin collecting and using data on loss avoidance in ways that demonstrate the value of various mitigation options.

In particular, we see value in the Loss Avoidance Assessment work being conducted by the State of Florida’s Division of Emergency Management, which maintains a GIS database of various mitigation projects and is able to calculate return on investment for completed projects when additional storms impact project areas. Such assessments build the case for mitigation investment. We urge the MitFLG to consider which federal agencies might share the Florida record-keeping and assessment approach with other state agencies, via workshops, workbooks, or other trainings.

¹⁸ The Pew Charitable Trusts, “Poll Shows Nationwide Support for Feds to Boost Rebuilding Standards,” February 1, 2018, <http://www.pewtrusts.org/en/research-and-analysis/blogs/compass-points/2018/02/01/poll-shows-nationwide-support-for-feds-to-boost-rebuilding-standards>.

NMIS Outcome 5: *Public, private, and non-profit sector entities improve risk communication, leading to more risk-informed mitigation investments by individuals and communities.*

- **Pew Comment:** *FEMA itself can take important steps to improve risk communication through its floodplain mapping program.*

The Flood Insurance Rate Maps (FIRMs) issued by FEMA and adopted by local governments participating in the National Flood Insurance Program (NFIP) are central to communicating risk to individuals, and FEMA headquarters as well as several regions have greatly improved access to maps and map products. Pew believes, however, that more can be done to assure that flood maps better convey information about flood risk beyond the need for certain individuals to obtain flood insurance.

As the Agency knows well, the advancement of mapping technology offers opportunities to include additional information or layers on maps. Using digital map products to share information about the gradation of risk, potential future flood levels, and even changes represented by historic flood levels, the Agency may be able to convey risk information beyond the simple dichotomy of in or out of a flood zone. Such information could help the general public and local officials better understand the dynamic nature of flood risk, and thereby encourage more thoughtful mitigation and adaptation.

On this point, we would urge FEMA to assemble a group that could meld the technical understanding of mapping specialists with that of communications experts to make recommendations for changes to map products and mapping terminology. Such a group should specifically consider how to convey information about future flood risks.

- **Pew Comment:** *The MitFLG should consider a recommendation for new disclosure requirements for property sellers as a strategy for improving risk communication.*

As it stands, there is no national requirement for sellers to state that their home is located in a flood-risk area. The U.S. should require sellers to disclose available information about a property's flood history and risk, along with obligations that the property owner carry flood insurance. An NMIS recommendation to close this gap in communication would support risk-informed investments.¹⁹

A single, national standard makes sense. In fact, the bill passed by the House in November 2017 to reauthorize the National Flood Insurance Program would require states to enact property seller disclosure laws by 2022.²⁰

¹⁹ The Pew Charitable Trusts, “Home Sellers Should Disclose Flood History and Risk to Buyers,” January 17, 2017, <http://www.pewtrusts.org/en/research-and-analysis/blogs/compass-points/2017/01/17/home-sellers-should-disclose-flood-history-and-risk-to-buyers>.

²⁰ H.R. 2874, 21st Century Flood Reform Act, passed on November 14, 2017.

Lack of transparency in high-risk areas can have devastating consequences for families and their property, which helps explain why, according to a recent Pew poll, 86 percent of national respondents and those in states affected by the 2017 hurricanes support a single, national standard for property sellers to disclose past flooding during a sale—up from 81 percent in the previous poll.²¹ Buyers need this information to make an informed decision on what is for many the largest and most important purchase of their lives.

NMIS Outcome 6: *The built environment—whether grey or nature-based infrastructure, and including lifeline infrastructure, buildings and homes—becomes more resilient and promotes community resilience.* **Recommendation 6.1:** *Federal departments and agencies should ensure up-to-date building standards are used for federal building projects and could incentivize SLTTs receiving federal aid for building projects to adopt and enforce, at a minimum, the most current versions of model building codes.*

- **Pew Comment:** *It is crucial for the federal government to adopt a resilience standard for any building and rebuilding efforts that leverage federal funding.*

Pew agrees with Recommendation 6.1 for the federal government to ensure the use of updated standards for any building projects that receive federal funding. The devastation caused by Hurricanes Harvey, Irma, and Maria—\$265 billion in total losses²²—underscores the need for tougher and stronger infrastructure. Structures that meet or exceed the latest building code requirements to deal with flooding can save, on average, between \$5 and \$7 in avoided losses for every \$1 spent on upfront construction costs.²³ We encourage the MitFLG to call for a requirement for all federally funded construction or substantial rebuilding in flood-prone areas to be constructed to better withstand the impacts of flooding. We believe that such standards should be applied, not only within the designated Special Flood Hazard Areas, but also for any structures that have been damaged by repeated flooding, regardless of location.

This message resonates with the public and key stakeholders across political parties. A recent Pew poll found that 9 out of 10 registered voters support the requirement for federally funded infrastructure to be built and rebuilt more resilient to flooding.²⁴ And dozens of organizations

²¹ The Pew Charitable Trusts, “Poll Shows Nationwide Support for Feds to Boost Rebuilding Standards,” February 1, 2018, <http://www.pewtrusts.org/en/research-and-analysis/blogs/compass-points/2018/02/01/poll-shows-nationwide-support-for-feds-to-boost-rebuilding-standards>.

²² National Ocean and Atmospheric Administration, National Centers for Environmental Information, “Assessing the U.S. Climate in 2017,” accessed February 2, 2018, <https://www.ncei.noaa.gov/news/national-climate-201712>.

²³ Multihazard Mitigation Council (2017) Natural Hazard Mitigation Saves 2017 Interim Report: An Independent Study – Summary of Findings. Principal Investigator Porter, K.; co-Principal Investigators Scawthorn, C.; Dash, N.; Santos, J.; P. Schneider, Director, MMC. National Institute of Building Sciences, Washington. In fact, elevating buildings located in areas most prone to flooding at least 2 feet above the level of a 100-year flood was found to have a return on investment ranging from nearly \$7-to-\$1 in states including Virginia and Georgia to upward of \$20-to-\$1 in Texas and Florida, and even \$31-to-\$1 in Alabama.

²⁴ The Pew Charitable Trusts, “Poll Shows Nationwide Support for Feds to Boost Rebuilding Standards,” February 1, 2018, <http://www.pewtrusts.org/en/research-and-analysis/blogs/compass-points/2018/02/01/poll-shows-nationwide-support-for-feds-to-boost-rebuilding-standards>.

representing fiscal conservatives, architects, engineers, insurance businesses, and other non-profits have signed letters urging Congress and the White House to adopt such a requirement.²⁵

It is our hope that Recommendation 6.1 will endorse this measure to help our communities and infrastructure become strong enough to withstand future flooding.

Recommendation 6.3: Public sector entities should focus more on rebuilding better as well as rebuilding quickly following damage caused by natural disasters.

- ***Pew Comment:*** We suggest adding a recommendation for the federal government and SLTTs to streamline the application process for pre- and post-disaster buyouts of flood-prone properties.

Pew supports rebuilding better and faster following natural disasters, but owners of properties in hazardous areas such as floodplains—especially properties that have been repeatedly flooded—should be given a meaningful choice between rebuilding quickly and the alternative of relocating, so they can avoid damages from future flooding. Alongside the goal of fast rebuilding, the NMIS should emphasize the importance of streamlining federal and state programs to improve the process for offering buyouts to the owners of properties in high-risk areas, particularly structures that have experienced frequent flooding.

Repeatedly flooded properties cost the nation billions. Historically, these properties have accounted for just 1 percent of properties with National Flood Insurance Program policies, but about 25-30 percent of flood claims.²⁶ Purchasing homes and converting them to open spaces can be cheaper for the government in the long run than repairing and rebuilding numerous times, but government's buyout efforts have suffered from limited funding and delays.²⁷ In a 2016 report, the Lincoln Land Institute and Regional Planning Association noted that many homeowners after Hurricane Sandy had already submitted applications to FEMA for individual assistance or started to repair their homes before buyout programs were announced in New York State.²⁸

Roy Wright, Assistant Administrator of the Federal Insurance and Mitigation Administration, who also chairs the MitFLG, stated earlier this year that he wants to speed up the process for

²⁵ The Pew Charitable Trusts, “Pew, Fiscally Conservative Groups Urge Stronger Flood Standards for Buildings,” September 25, 2017, <http://www.pewtrusts.org/en/research-and-analysis/speeches-and-testimony/2017/09/pew-fiscally-conservative-groups-urge-stronger-flood-standards-for-buildings>.

²⁶ The Pew Charitable Trusts, “Repeatedly Flooded Properties Cost Billions,” October 6, 2016, <http://www.pewtrusts.org/en/multimedia/data-visualizations/2016/repeatedly-flooded-properties-cost-billions>.

²⁷ NPR https://www.npr.org/2017/09/27/553934600/debt-laden-fema-is-slow-to-act-on-program-that-buys-flooded-houses?utm_campaign=storyshare&utm_source=twitter.com&utm_medium=social

²⁸ Lincoln Institute of Land Policy and Regional Planning Association, *Buy-In for Buyouts: The Case for Managed Retreat from Flood Zones* (2016), <https://www.lincolninst.edu/sites/default/files/pubfiles/buy-in-for-buyouts-full.pdf>. Although some progress has been made in post-Sandy buyouts, only \$750 million has been spent on them in the New York metropolitan region, out of the billions in federal recovery assistance allocated to this area.

buyouts.²⁹ One solution is to use resilience planning to pre-identify neighborhoods in high-risk areas willing to commit to accepting buyouts should damage occur during a storm, so government can work with the property owners to prepare. Unless the process is expedited, it will continue to be impractical or in some cases impossible for many homeowners and communities to access buyout programs. Accelerating the pace of rebuilding damaged homes, without changes to enable more buyouts, could cause more property owners to remain vulnerable in high-risk areas.

Conclusion

A comprehensive investment strategy for risk reduction will help address longstanding challenges at the federal, state and local levels, especially if the focus is on increasing the number and quality of mitigation activities before disasters. Although there are benefits to investing in resilience post-disaster, there are also significant obstacles. Decisions about when and where to spend on resilience should not be driven solely by where disasters have occurred, after-the-fact. Making more of these choices in the pre-disaster timeframe would allow government to more thoroughly factor in which areas will face the greatest risk over time.³⁰ The MitFLG should use the NMIS as an opportunity to prioritize taxpayer dollars for risk reduction in advance, when mitigation yields the most benefits.

We appreciate the chance to comment on the NMIS and look forward to reviewing future drafts of this important endeavor. Thank you for taking our views into account. Please do not hesitate to contact me with any questions at llightbody@pewtrusts.org or Matt Fuchs at mfuchs@pewtrusts.org.

Sincerely,



Laura Lightbody, Project Director
Pew's flood-prepared communities initiative
llightbody@pewtrusts.org

²⁹ Houston Chronicle, “Q&A: Roy Wright, chief of the National Flood Insurance Program” (January 19, 2018), <https://www.houstonchronicle.com/business/article/Q-A-Roy-Wright-chief-of-the-National-Flood-12511867.php>.

³⁰ GAO, Report to Congressional Requestors: Hurricane Sandy - An Investment Strategy Could Help the Federal Government Enhance National Resilience for Future Disasters, No. GAO-15-515 (July 2015), available at <http://gao.gov/assets/680/671796.pdf>. From fiscal years 2011 to 2014, FEMA obligated more than \$3.2 billion for its post-disaster mitigation grant program. Obligations to PDM totaled only \$222 million.