



# **Consolidated Roster of Goals & Recommendations**



# Goals & Recommendations

## Overarching



### GOAL 1 - Institutionalize resilience across Maryland's funding and regulations.

#### Recommendation 1.1

Evaluate state funding programs and identify where hazard risk assessment could be incorporated into application scoring.

**Owner:** MDEM/MOR

**Timeline:** 5 years

**Funding:** No additional funding needed

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- The State administers several funding programs that can pay for resilience projects such as stormwater upgrades, living shorelines, or resilience improvements to transportation assets.
- But there is a much larger opportunity to incorporate resilience into how the State funds construction projects in general – from roads, to schools to energy assets and more.
- As a first step, MOR would evaluate State funding programs to identify opportunities for agencies to incorporate hazard risk into application scoring. This would happen in concert with efforts to coordinate funding that are led by the [State Clearinghouse](#).<sup>60</sup>
- This would allow the State to understand the risk profile of investments and better steward its funds.

#### Recommendation 1.2

Screen environmental permits to identify opportunities to incorporate climate considerations in future permits and renewals.

**Owner:** MDE

**Timeline:** 5 years

**Funding:** TBD

#### Why This Matters:

- The Maryland Department of the Environment has [recently updated state stormwater regulation](#) to incorporate climate-adjusted rainfall.<sup>61</sup>
- A similar process could be followed to future-proof other environmental regulations. MDE would evaluate environmental regulations and permits to identify places to incorporate climate projections. This would occur in alignment with other permitting goals like efficacy.

#### Recommendation 1.3

Establish a statewide resilience authority or empower an existing entity to play that role.

**Owner:** TBD

**Timeline:** 5 years (TBC)

**Funding:** TBD

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- At the local level, [resilience authorities](#) are entities that can issue bonds, receive government funding, and assess fees for their services in order to pay for resilience projects.<sup>62</sup>



#### Why This Matters (cont.):

- These structures can increase local financing capacity and unlock dollars for resilience.
- No comparable state entity exists. With a statewide resilience authority, Maryland could access a wider array of funding and financing to tackle large-scale resilience projects.

#### Recommendation 1.4

**Establish a resilience baseline for the State; develop a statewide resilience assessment to support local government benchmarking for use in a statewide resilience tracker to help identify investment needs; and develop indicators to monitor the effectiveness of resilience efforts and establish future goals.**

**Owner:** UMCES

**Timeline:** 5 years

**Funding:** TBD pending competitive bid. Estimates range from \$250,000 to \$1.7 million

#### Why This Matters:

- It is an [emerging best practice for states](#) to develop and utilize metrics to measure disaster and climate resilience.<sup>63</sup>
- In 2022, the [Maryland General Assembly tasked the University of Maryland Center for Environmental Science](#) (UMCES) with developing a resilience baseline, a benchmarking assessment for local governments, and metrics to track resilience over time.<sup>64</sup>
- This would help identify opportunities for investment and ensure that Maryland is directing spending where it can be most effective.

## GOAL 2 - Coordinate state funding and direct it toward places with high hazard risk and social vulnerability.

#### Recommendation 2.1

**Convene a funding table in which state agencies pool resources and stack funding to accomplish transformative resilience projects.**

**Owner:** MDEM/MOR

**Timeline:** 2 years

**Funding:** No additional funding needed

**Focus Area:** Justice & Equity, Place-based Resilience

#### Why This Matters:

- One of Maryland's strengths is that so many of its agencies fund resilience work.
- But stakeholders frequently described situations where multiple agencies funded projects in the same location without foreknowledge or initial collaboration. They also expressed concern that some high-risk geographies may receive little to no resilience dollars.
- When resilience projects are submitted for certain types of State and Federal funding, they are sent to relevant agencies for review through the [State Clearinghouse](#), creating an initial dataset of resilience projects.<sup>65</sup> However, no comprehensive view exists to show resilience projects and project ideas around the State.
- By utilizing the Clearinghouse data to develop a resilience project inventory and convening state agencies, MOR can help coordinate funding across agencies, enabling more efficient capital stacking, better visibility into statewide spending, and transformative resilience projects.
- This recommendation would advance the place-based resilience concepts described above.



## Recommendation 2.2

Identify focus geographies for agencies to coordinate place-based resilience using existing disaster data, environmental justice data, and other sources.

**Owner:** MDEM/MOR      **Timeline:** 2 years      **Funding:** No additional funding needed

**Focus Area:** Justice & Equity, Place-based Resilience

### Why This Matters:

- MOR is tasked by State law with “ensuring that investments prioritize vulnerable communities and environmental justice.”<sup>66</sup>
- To achieve this and effectively coordinate funding, MOR would work with funding agencies to identify geographies with outsized hazard risk and social vulnerability where resilience dollars could significantly move the needle.
- This would build off of existing State law that defines overburdened and underserved communities, as well as Governor Moore’s initiatives to advance environmental justice.<sup>67</sup>
- On the heels of the 2025 flooding in Western Maryland, additional rural datasets and indicators could be combined with existing environmental justice tools to determine under-resourced areas.

## Recommendation 2.3

Accelerate the number of resilience projects in under-resourced communities with high hazard risks.

**Owner:** Multiple; MDEM/MOR will track results      **Timeline:** 10 years      **Funding:** No additional funding needed

**Focus Area:** Justice & Equity, Place-based Resilience

### Why This Matters:

- Utilizing the funding table structure and the priority geographies as described above, Maryland’s agencies could direct dollars and technical assistance resources to under-resourced communities with high hazard risks.
- MOR would measure success in terms of the number of resilience projects in under-resourced communities over time and would utilize resilience benchmarks that become available.

## GOAL 3 - Collaborate and take action to address emerging climate challenges.

### Recommendation 3.1

Convene a subset of Agency Resilience Liaisons to coordinate state-level strategy on extreme temperature.

**Owner:** MDEM/MOR      **Timeline:** 2 years      **Funding:** No additional funding needed

### Why This Matters:

- The effects of climate change are already here: in 2025, Maryland experienced its highest number of heat deaths in more than a decade.<sup>68</sup>
- By mid-century, Maryland is projected to experience 47.7 days above 90° F per year under a high future climate scenario. This is 190% greater than the 16.5 days above 90° under a baseline scenario.<sup>69</sup>



### Why This Matters (cont.):

- Several of Maryland's agencies are already addressing this challenge. Maryland Occupational Safety and Health issues heat stress standards, the Maryland Department of Health monitors heat-related illness, and the Maryland Department of Transportation manages the impacts of heat on transportation.<sup>19,25</sup>
- Stakeholders frequently expressed that greater coordination around extreme heat would help with information sharing and strategic alignment.

### Recommendation 3.2

**Convene a subset of Agency Resilience Liaisons to collaborate and share information about community-driven relocation.**

**Owner:** MDEM/MOR      **Timeline:** 2 years      **Funding:** No additional funding needed

### Why This Matters:

- With sea level rise and worsening flooding, Maryland will look dramatically different in the next 50 years.<sup>70</sup>
- State agencies are grappling with questions of how to support voluntary relocation from high-risk areas.
- Community-driven relocation is a complex topic that requires serious consideration, and an initial step would be convening state agencies to share information and discuss this topic.
- After laying this groundwork, the State might work with interested communities to understand requirements for successful implementation.

## GOAL 4 - Strengthen emergency response in the face of federal changes by sharing resources with neighboring states and non-governmental partners.

### Recommendation 4.1

**Establish resource sharing agreements with partners beyond Maryland State government to support preparedness, response, recovery, and mitigation activities.**

**Owner:** MDEM/DRR      **Timeline:** 2 years      **Funding:** No additional funding needed

### Why This Matters:

- Mutual aid is a foundational part of emergency management, supported by structures like the Emergency Management Assistance Compact.<sup>71</sup>
- With changes to FEMA's funding and a move toward greater state responsibility, the Maryland Department of Emergency Management is exploring formalized agreements with other states and stakeholders in all phases of emergency management.
- This would allow for support across training, response, recovery, and mitigation. It would also decrease reliance on federal support.

## GOAL 5 - Enhance the state's digital resilience through continued IT modernization and development of key cybersecurity governance and operations capabilities.



### Recommendation 5.1

**Improve digital availability and modernization initiatives to refresh critical and legacy digital infrastructure; integrate digital innovations like artificial intelligence; and implement zero trust architecture principles.**

**Owner:** Multiple (led by DoIT)

**Timeline:** 10 years

**Funding:** TBD

**Focus Area:** Justice & Equity

#### Why This Matters:

- Many state and local entities operate on outdated or unsupported or digital infrastructure. Not only does this lead to high maintenance costs, but it also creates greater points of failure and higher cybersecurity threat risk.
- For those reasons, it is essential to modernize the State's digital infrastructure.
- By adopting and implementing digital innovations like artificial intelligence, the State could realize economies of scale and power.
- The State could also adopt zero trust architecture principles – “never trust, always verify” – to raise the floor of statewide cybersecurity.

### Recommendation 5.2

**Establish statewide cybersecurity and privacy governance, policy, and standards / baseline; develop cybersecurity and privacy posture assessment processes and tools to assist state and local evaluation of security programs for compliance and cybersecurity resilience.**

**Owner:** DoIT Office of Security Management

**Timeline:** 2 years

**Funding:** TBD

#### Why This Matters:

- With global transformation and growing digital reliance, the digital threat landscape has evolved. Adversaries running the spectrum of socially or politically motivated hacktivists to financially driven criminals to state-sponsored espionage and sabotage units continually seek new vulnerabilities and methods to achieve their goals.
- The Maryland IT Security Manual and similar statewide cybersecurity guidance documents are outdated and no longer reflect the advanced cyber threat landscape the State faces.
- Updated statewide governance would provide a foundation on which state and local cybersecurity programs could be built. New policies would build on that foundation to create an effective cybersecurity program.
- Standards, baselines, assessments, and tools could be used to put enhanced cybersecurity and privacy into practice.

### Recommendation 5.3

**Expand the availability and adoption of centralized IT and cybersecurity services to standardize defenses across the state; enhance state and local entities' access to enterprise-grade capabilities such as endpoint detection and response .**

**Owner:** DoIT Office of Security Management

**Timeline:** 5 years

**Funding:** TBD

### Why This Matters:

- Many state entities lack the budget and personnel to procure and manage top-tier IT and cybersecurity tools, resulting in a fragmented landscape where well-defended agencies connect to vulnerable ones.
- A "Whole-of-State" approach to centralized services would bridge this gap, allowing less resourced entities to leverage the technical expertise of the state.
- Centralizing core IT and cybersecurity services would eliminate duplication of effort and ensure a consistent baseline of security. A centralized service model would also enhance visibility into the statewide threat environment, allowing the State to detect and neutralize coordinated attacks before they cascade across jurisdictional lines.



## **\*\* End of Sector Recommendations \*\***

# Goals & Recommendations

## *Environment & Natural Systems*



### **GOAL 1 - Prioritize resilience as a criteria for conservation & restoration investments.**

#### **Recommendation 1.1**

Develop methodology and case studies quantifying the costs and benefits, including ecosystem service value, of nature-based practices that increase resilience of human and natural systems.

**Owner:** DNR

**Timeline:** 2-3 years

**Funding:** \$100k+ for a study

**Focus Area:** Robust Economy & Job Creation

#### **Why This Matters:**

- While nature-based practices provide an array of ecosystem benefits, including hazard risk reduction, those benefits can be difficult to quantify and are not always incorporated into cost-benefit analyses.<sup>41</sup>
- DNR already quantifies many of the ecosystem benefits associated with restoration, but could expand its resilience benefit calculations to consider inland flooding, heat reduction, and more. This could be used to inform investments.

#### **Recommendation 1.2**

Include quantified resilience benefits as criteria for investment across relevant conservation and restoration programs.

**Owner:** DNR

**Timeline:** 5 years

**Funding:** TBD

**Focus Area:** Robust Economy & Job Creation

#### **Why This Matters:**

- Once DNR has a more complete understanding of the resilience benefits of conservation and restoration approaches, this information can be used to drive decision making.
- When evaluating potential projects, DNR could evaluate resilience benefit as one of the criteria for selection.

### **GOAL 2 - Improve resilience data collection, governance, coordination, access, and usability for local governments and state agencies.**

#### **Recommendation 2.1**

Identify data needs which may support local governments and the State of Maryland in advancing resilience.

**Owner:** MDP

**Timeline:** 2 years

**Funding:** Funding secured - General Funds

**Focus Area:** Justice & Equity



### Why This Matters:

- During the stakeholder engagement process, the Maryland Office of Resilience repeatedly heard that local governments lack data to develop resilience projects, such as downscaled climate projections or basic mapping capabilities. These needs vary by community and region.
- Because MDP has regional planning staff, the Department is well-poised to identify local data needs that can be addressed at a later date.
- This is the first step, and once the data needs have been identified, MDEM will help coordinate across agencies to fill data needs.

## GOAL 3 - Identify innovative approaches and structures to increase nature-based solutions, by working with private property owners and nongovernmental funders.

### Recommendation 3.1

Improve the accessibility of the living shoreline loan program to increase implementation by private property owners.

**Owner:** DNR

**Timeline:** 2 years

**Funding:** No additional funding needed

**Focus Area:** Justice & Equity

### Why This Matters:

- More than 80 percent of Maryland's shoreline is privately owned, making collaboration between government and private landowners essential.<sup>42</sup>
- DNR administers the Shoreline Erosion Loan Program, offering no-interest loans to finance living shorelines on public, private, and community owned lands.<sup>37</sup> These projects not only protect against shoreline erosion but also reduce hazard risks.
- One option for improving utilization of this program is by updating its formula to reduce the financial burden for property owners.

### Recommendation 3.2

Develop 100 Coastal Resilience Management Plans to help private landowners plan for and adapt to sea level rise.

**Owner:** DNR

**Timeline:** 5 years

**Funding:** Climate Pollution Reduction Grant (CPRG) Funding Secured

**Focus Area:** Robust Economy & Job Creation

### Why This Matters:

- Sea level rise will dramatically change Maryland's landscape, especially on the lower eastern shore.<sup>17</sup>
- Through proactive planning, Maryland can help private landowners prepare for the impacts of sea level rise on their financial, social, and environmental systems.
- DNR has received funding through an EPA Climate Pollution Reduction Grant to advance marsh restoration, tidal connectivity, living shorelines and marsh migration corridor resilience by creating 100 Coastal Resilience Management Plans, which will support this goal.<sup>43</sup>



### Recommendation 3.3

Make nature-based solutions a mainstream and accessible resilience practice for private property owners.

Owner: DNR

Timeline: 10 years

Funding: TBD

#### Why This Matters:

- Successful implementation of Recommendations 3.1 and 3.2 will help make nature-based solutions both mainstream and accessible.
- Nature-based solutions can be highly effective for reducing flood risk, providing storm protection, and minimizing erosion.<sup>44</sup>
- For instance, wetlands act like sponges, absorbing and slowly releasing water that would otherwise cause flooding.<sup>45</sup> Living shorelines can have a similar impact, breaking up wave energy and reducing storm damages.<sup>46</sup>
- But a variety of barriers prevent greater uptake of nature-based solutions.<sup>47</sup> By updating policy, engaging community members in planning, and continuing education efforts, DNR can make this practice mainstream and help draw down Maryland's hazard risk.

### Recommendation 3.4

Share information, best practices, and lessons learned in enhancing resilience through public-private-philanthropic partnerships and non-traditional financing structures.

Owner: MDEM/MOR

Focus Area: Robust Economy & Job Creation

#### Why This Matters:

Timeline: 5 years

Funding: No additional funding needed

- To help ensure the spread of high-quality resilience projects, Maryland should explore innovative financing structures that can bring in private dollars.
- This could include partnering with MDE and DNR to explore ways to leverage Maryland's Conservation Finance Act for resilience outcomes using pay-for-success contracting methods.

**\*\* End of Sector Recommendations \*\***

# Goals & Recommendations

## Critical Infrastructure



**GOAL 1 - Enhance and support the power grid's reliability and resilience in the face of escalating community reliance and a developing threat landscape.**

### Recommendation 1.1

**Support resilient microgrid projects geared toward keeping critical infrastructure functional during outages.**

**Owner:** MEA

**Timeline:** 2 years

**Funding:** SEIF-Funded

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- The Maryland Energy Administration runs the [Resilient Maryland Grant Program](#), which funds microgrids, resilience hubs, and resilient facility power systems.<sup>43</sup>
- These combined solutions reduce energy use during normal conditions and provide backup power during outages.
- The Resilient Maryland Program can be used to fund microgrid projects that support critical infrastructure and ensure its function during disasters. One example is a [recent initiative by the WSSC](#).<sup>44</sup>

**GOAL 2 - Support transportation system resilience.**

### Recommendation 2.1

**Find the highest return on investment opportunities to implement priorities from the Transportation Resiliency Improvement Plan.**

**Owner:** MDOT

**Timeline:** 2 years

**Funding:** U.S. Dept. of Transportation PROTECT (Promoting Resilient Operations for Transformative, Efficient, and Cost-Saving Transportation)

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- Maryland's transportation system faces disruptions from hazards and changing climate conditions. For instance, a 2021 study by [the Pew Charitable Trusts](#) found that flooding impacts approximately 15,000 lane miles of state-maintained roads. This equates to roughly 20% of Maryland's roads.<sup>18</sup>
- As part of the PROTECT program, Maryland created its 2024 [Transportation Resiliency Improvement Plan](#) (TRIP), which lays out investment priorities to build transportation resilience.<sup>45</sup> In accordance with the TRIP, MDOT maintains a list of transportation [resilience projects](#).<sup>46</sup>
- By updating the TRIP and identifying and executing projects with the highest return on investment, the Department can continue to build transportation resilience.



## Recommendation 2.2

Provide technical assistance and planning support to help local governments and transportation systems reduce risks associated with climate and evolving technologies.

**Owner:** MDOT

**Timeline:** 5 years

**Funding:** U.S. Dept. of Transportation PROTECT Funding

**Focus Area:** Robust Economy & Job Creation

### Why This Matters:

- Most of Maryland's roads are locally owned and maintained, as are other transportation assets.<sup>47</sup>
- MDOT can provide technical assistance and planning support to ensure that local governments shore up their systems and assets against hazards.

## GOAL 3 - Strengthen the resilience of additional critical infrastructure, such as military installations, water and wastewater, and dams.

### Recommendation 3.1

Support efforts to improve military readiness through the Resilient Maryland Defense Communities Project.

**Owner:** COMM-OMFA

**Timeline:** 2 years

**Funding:** Funding secured through Office of Local Defense Community Cooperation (OLDCC) MIRR Grant

**Focus Area:** Robust Economy & Job Creation

### Why This Matters:

- Maryland's military communities face evolving hazards that threaten community infrastructure and services needed to support military operations and mission assurance.
- As a result, eight military installations are engaging in a U.S. Department of Defense-funded Military Installation Readiness Review.<sup>34</sup> These reviews evaluate community assets and infrastructure across transportation, supply chain, energy, water and wastewater, medical services, and more.
- To knit together lessons from those installations and develop a collaborative framework to address shared resilience challenges on and off base, The Office of Military and Federal Affairs at the Maryland Department of Commerce is leading the Resilient Maryland Defense Communities Project.

### Recommendation 3.2

Identify and enable pathways for resilience planning assistance to support small and decentralized drinking water and wastewater systems vulnerable to flooding and drought.

**Owner:** MDE

**Timeline:** 5-10 years

**Funding:** A version of this is possible with existing resources

**Focus Area:** Justice & Equity



### Why This Matters:

- Across Maryland, wells and septic systems are vulnerable to flooding and drought.
- For instance, approximately 52,000 septic systems are located within the Critical Area (within 1,000 feet of tidal waters).<sup>48</sup> Heavy rains or coastal flooding could cause untreated wastewater to overflow into communities, posing public health risks.<sup>49</sup>
- MDE can support planning efforts to make these systems more resilient and help communities avoid building new systems in harm's way.

### Recommendation 3.3

**Coordinate with dam owners and local emergency managers to maximize adoption of new state-of-the-art rainfall estimates, modeling tools, and technical guidance to improve the safety and resilience of dam infrastructure.**

**Owner:** MDE

**Timeline:** 5 years

**Funding:** No additional funding needed

### Why This Matters:

- The Probable Maximum Precipitation (PMP) estimates the highest rainfall that could fall in a specific area and timeframe.<sup>50</sup> Engineers use these estimates to design infrastructure, including dams.
- The Maryland Dam Safety Program is releasing updated PMP data for use in the design of Significant and High Hazard dams.
- These updates reflect the latest climate science and are a critical step toward modernizing Maryland's dam design standards, making them more resilient.
- When combined with modeling tools and technical guidance, this suite of resources can make dams more resilient.

### Recommendation 3.4

**Launch updated state stormwater regulations that incorporate climate-forecasted rainfall and establish a consistent level of flood protection across Maryland.**

**Owner:** MDE

**Timeline:** 2 years

**Funding:** No additional funding needed

### Why This Matters:

- Maryland is modernizing its stormwater standards to address the increasing risks of flooding, erosion, and pollution driven by climate change.
- Per SB227 (2021), the Maryland Department of the Environment (MDE) is required to review and update certain stormwater regulations at least every five years.<sup>51</sup>
- MDE has collaborated with a broad array of stakeholders to identify areas for the latest update.<sup>52</sup>
- The updated regulations will require the incorporation of climate-forecasted rainfall data into stormwater design.
- This means that stormwater systems will be designed with future conditions in mind and better equipped for more intense storms.
- MDE will release the updated regulations and then transition into implementation, providing guidance to locals via the updated Stormwater Manual.

### Recommendation 3.5

Promulgate implementing regulations for water-sector cyber security and support water system cyber risk assessment, risk mitigation planning, and emergency response plan development.

**Owner:** MDE

**Timeline:** 2 years

**Funding:** No additional funding needed

#### Why This Matters:

- In 2025, Maryland passed [Senate Bill 871](#) – Department of the Environment – Community Water and Sewerage Systems – Cybersecurity Planning and Assessments to strengthen the resilience of community water and wastewater systems against cyber threats.<sup>53</sup>
- The law directs MDE, working with DoIT and MDEM, to lead statewide cybersecurity planning and oversight in this sector.
- Key provisions include incident reporting, stronger standards, preparedness plans, staff training, and secure records.



**\*\* End of Sector Recommendations \*\***

# Goals & Recommendations

## Community & Local Government Capacity



### GOAL 1 - Establish regionally-based technical assistance to help local jurisdictions advance resilience.

#### Recommendation 1.1

**Establish a resilience technical assistance pilot in one or more regions of the state.**

**Owner:** MDEM-MOR      **Timeline:** 2 years      **Funding:** Funding needs TBD. MOR currently has multiple applications pending to fund this pilot.

**Focus Area:** Justice & Equity, Robust Economy & Job Creation

#### Why This Matters:

- Across Maryland's 23 counties, 157 municipalities, and one independent city, there are significant variations in budget, number of personnel, and expertise on staff.
- As a result, many local jurisdictions lack dedicated resilience planning and grant writing staff.<sup>47</sup>
- By creating a technical assistance program at the regional level, the Maryland Office of Resilience can fill these gaps and create better resilience outcomes.
- An initial pilot will establish a process that can be scaled to other geographies in the future.

#### Recommendation 1.2

**Expand regional technical assistance to all regions of the state to accelerate multi-jurisdictional collaboration, development of project pipelines, and establishment of resilience authorities.**

**Owner:** MDEM-MOR      **Timeline:** 5 years      **Funding:** Funding needs TBD, will be determined by the cost of the pilot.

**Focus Area:** Justice & Equity, Robust Economy & Job Creation

#### Why This Matters:

- Disasters do not respect jurisdictional boundaries. Regional approaches enable more effective large-scale projects, resource sharing, and economies of scale.
- Recognizing this, states are increasingly establishing regional technical assistance programs that help local governments assess risks and identify projects.<sup>55</sup>
- Technical assistance yields dividends by better positioning communities for future funding. New Jersey's Resilient NJ program led to \$26.3 million in federal funding for project implementation.<sup>56</sup>

## GOAL 2 - Provide tools and guidance that increase local capacity to plan, fund, and implement resilience efforts.



### Recommendation 2.1

Develop and share tools that support the creation of resilience authorities across the state and increase local financing capacity.

**Owner:** MDEM-MOR

**Timeline:** 2 years

**Funding:** Funding needs TBD. A version is possible with existing resources; MOR also has an application pending to support this effort.

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- In Maryland, because of [Senate Bill 457](#), local jurisdictions can establish resilience authorities, which can issue bonds, apply for and administer funding, and operate more nimbly than local governments.<sup>57</sup>
- The [Resilience Authority of Anne Annapolis and Arundel County](#) and [Resiliency Authority of Charles County](#) serve as two successful examples that have increased local financing capacity.<sup>33,34</sup>
- Because this is a novel governance structure, local jurisdictions would benefit from tools and templates to guide their decision process and aid in structuring these entities.

### Recommendation 2.2

Develop best practices for local capital improvement planning that incorporate natural and human-caused hazards as well as climate projections.

**Owner:** MDEM-MOR

**Timeline:** 5 years

**Funding:** TBD

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- Local governments [utilize capital improvement plans](#) to manage long-term investments in public infrastructure.<sup>58</sup>
- It is an emerging best practice to link capital improvement plans with climate adaptation and disaster resilience, considering sea level rise, increased precipitation, and other future risks when siting and designing infrastructure.
- The City of Baltimore is a leader in this regard, linking its Capital Improvement Plan to its Disaster Preparedness Plan, Climate Action Plan, and Sustainability Plan.

### Recommendation 2.3

Pilot mechanisms to compensate community liaisons for their time and expertise weighing in on resilience projects.

**Owner:** DNR

**Timeline:** 5 years

**Funding:** No additional funding needed

**Focus Area:** Justice & Equity



#### Why This Matters:

- Equitable community engagement is a cornerstone of environmental justice. To achieve that, it is essential to honor community knowledge.
- On Maryland's Eastern Shore, Envision the Choptank has successfully partnered with community ambassadors to more effectively engage with communities and understand local priorities.<sup>59</sup>
- To do this properly, the State needs mechanisms to compensate community liaisons.

#### Recommendation 2.4

**Scale the practice of compensating community liaisons across state agencies and resilience programs.**

**Owner:** TBD

**Timeline:** 10 years

**Funding:** TBD

**Focus Area:** Justice & Equity

#### Why This Matters:

- Once DNR has established and piloted mechanisms to compensate community liaisons and engage them in resilience project development, this practice can be scaled across agencies and programs to institutionalize equitable co-governance and environmental justice.

### GOAL 3 - Protect and rapidly restore small business operations statewide.

#### Recommendation 3.1

**Provide technical assistance for small businesses to prepare for and respond to disruptions, including updates to and implementation of a robust Small Business Continuity and Resiliency Playbook.**

**Owner:** COMM

**Timeline:** 2-5 years

**Funding:** No additional funding needed

**Focus Area:** Justice & Equity, Robust Economy & Job Creation

#### Why This Matters:

- Small businesses are particularly vulnerable to disasters, and 99.6% of Maryland's businesses are small businesses.<sup>60</sup>
- An estimated 75% of businesses without a continuity plan fail within three years of being struck by a disaster.<sup>61</sup>
- The Maryland Department of Commerce has developed a Small Business Continuity and Resiliency Playbook to build the resilience of small businesses across the state.

**\*\* End of Sector Recommendations \*\***

# Goals & Recommendations

## Food System



### GOAL 1 - Increase adoption of climate-smart agricultural practices in Maryland.

#### Recommendation 1.1

Implement programs, such as the Leaders in Environmentally Engaged Farming (LEEF) Program, for the adaptation of agricultural practices in response to environmental changes. This may include increases in precipitation, temperature, or soil salinization.

**Owner:** MDA

**Timeline:** 5-10 years, ongoing

**Funding:** Funding for LEEF is secured from the Governor's budget. Additional program implementation may require further funding (TBD).

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- Maryland farmers have long played a critical role in adopting best practices, helping the State achieve conservation milestones, and protecting the Chesapeake Bay.<sup>50</sup>
- Through programs like LEEF, MDA will continue to incentivize environmentally engaged farming, making Maryland more resilient to environmental changes and bolstering local food systems.<sup>43</sup>

### GOAL 2 - Increase sustainable local food production and access.

#### Recommendation 2.1

Establish and support public-private partnerships to increase local food processing and cold storage infrastructure throughout the state.

**Owner:** MDA

**Timeline:** 2-5 years, ongoing

**Funding:** Additional infrastructure implementation may require further funding.

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- Small and mid-sized producers often lack infrastructure to wash, freeze, can, package, or store food.
- Cold storage gaps are a particularly critical challenge. Without cold storage capability, small food distributors are frequently forced to turn away donated or rescued food, often locally grown, leading to waste and limiting distribution of perishable goods.<sup>44</sup>
- Through public-private partnerships, Maryland can address this challenge.



## Recommendation 2.2

**Review and reevaluate regulations for on-farm food processing to support the expanded production of value-added agricultural products.**

**Owner:** MDA & MDH

**Timeline:** 2-5 years

**Funding:** No additional funding needed.

**Focus Area:** Robust Economy & Job Creation

### Why This Matters:

- On-farm processing can generate new revenue for farmers, reduce food waste, and support local food system resilience.
- However, Maryland's "[On-Farm Home Processing License](#)" is unnecessarily restrictive, imposing a revenue cap lower than unlicensed Cottage Food Products.<sup>51</sup>
- While public health and safety are paramount, creative solutions exist to streamline on-farm processing and incentivize Maryland-grown products.

## Recommendation 2.3

**Create a state-specific food procurement guidance document that seeks to help overcome challenges limiting institutional local food procurement.**

**Owner:** DGS

**Timeline:** TBD

**Funding:** TBD

**Focus Area:** Robust Economy & Job Creation

### Why This Matters:

- Institutional procurement of Maryland-produced foods is low. According to the December 2024 Maryland Certified Local Farm and Fish [Program Report](#), just 0.25% of state agency and university food procurement budgets were spent on purchases from Certified Local Farm and Fish providers. This amounts to \$238,920 out of a food budget of \$97.6M.<sup>52,53</sup>
- By creating food procurement guidance, the Department of General Services (DGS) can better understand the barriers to local food procurement and provide actionable guidance to encourage producer and buyer participation in Maryland's local food system.

## Recommendation 2.4

**Establish new opportunities and local markets for food accessibility on lands owned by the Department of Natural Resources.**

**Owner:** DNR

**Timeline:** 5 years

**Funding:** No add'l funding needed.

**Focus Area:** Justice & Equity, Robust Economy & Job Creation

### Why This Matters:

- Per DNR data provided 11/26/25, DNR owns, manages, and leases approximately 9,373 acres of farmland for crop production and grazing.
- The Department has observed two needs – support for regenerative practices and local access to food produced on these lands.
- For this reason, DNR and MDA are partnering on an initiative that will expand access and use of agricultural lands to environmental justice communities, establish new markets, and support local circular economies.
- This effort will support environmental best practices for farming and increase food production & access, while also mitigating climate impacts.

## GOAL 3 - Improve the ability of Maryland's food system to adapt to and recover from supply chain disruptions.



### Recommendation 3.1

Build relationships with regional, state, and local food system players, including independent food retailers and charitable food service providers, and exercise their ability to get and stay open in a disaster.

**Owner:** MDEM-WCI      **Timeline:** 5 years, ongoing      **Funding:** No additional funding needed.

**Focus Area:** Justice & Equity, Robust Economy & Job Creation

#### Why This Matters:

- MDEM's Whole Community Integration Branch's purpose is to "partner, engage, and coordinate with private sector, faith-based, and nonprofit organizations all across our State, ensuring they're integrated throughout all the phases of emergency management."<sup>54</sup>
- By expanding its network, WCI can help food system players better navigate disasters with minimal disruption.

### Recommendation 3.2

Leverage the Maryland Food System Resiliency Council to educate state leaders on the role food plays and convene a broad group of food systems stakeholders.

**Owner:** MDEM-MOR      **Timeline:** 2 years      **Funding:** No add'l funding needed.      **Focus Area:** Justice & Equity, Robust Economy & Job Creation

#### Why This Matters:

- The Maryland Food System Resiliency Council is an advisory body that makes recommendations to the Maryland General Assembly that address food insecurity and build food system resilience.<sup>41</sup>
- The FSRC members and their broader network are a powerful force multiplier to share information and increase effectiveness of the food system recommendations described elsewhere.

### Recommendation 3.3

Evaluate and establish emergency food buying processes aimed at stabilizing the food system during periods when food cannot be easily purchased, imported, or delivered.

**Owner:** MDEM (collaborating with DGS)      **Timeline:** 2 years      **Funding:** No add'l funding needed.

**Focus Area:** Justice & Equity, Robust Economy & Job Creation



### Why This Matters:

- During the Covid-19 pandemic, Maryland's local jurisdictions were pushed to design and implement innovative food purchasing and distribution models to address food insecurity resulting from economic instability and supply chain shortages.
- Baltimore City's Department of Planning demonstrated that emergency funds could be invested to purchase healthy, locally grown food for Marylanders experiencing food insecurity.<sup>55</sup> In doing so, they helped direct funds to the local agricultural industry while addressing public health disparities in Baltimore City's under-resourced neighborhoods.
- The State can establish more emergency-contingent contracts with local food producers and distributors to help prevent future food insecurity crises during times of food supply instability or disruption.

## **\*\* End of Sector Recommendations \*\***

# Goals & Recommendations

## Housing



### GOAL 1 - Make existing housing stock more resilient while emphasizing affordability.

#### Recommendation 1.1

Increase training and continuing education for building code officials and design professionals to improve the resilience of housing and other structures.

**Owner:** MDOL

**Timeline:** 2 years, ongoing

**Funding:** No additional funding needed

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- Adopting the latest model code has a benefit cost ratio of 11:1 and can save lives and prevent injuries during disasters.<sup>46</sup>
- While Maryland has already adopted the latest model International Code, building and design professionals must understand the code, and local building officials must enforce it in order for it to be effective.<sup>47</sup>
- When Maryland was assessed on the Building Code Effectiveness Grading Schedule (BCEGS), the state received a rating of 4 out of 10.<sup>48</sup>
- A lack of continuing education and limited training is an identified gap for Maryland's building codes. By addressing this, the state can build more resilient housing and other structures.

#### Recommendation 1.2

Support local and community-level initiatives to improve the resilience of existing housing stock through grants, financing, and public-private partnerships.

**Owner:** DHCD

**Timeline:** 5 years, ongoing

**Funding:** No additional funding needed

**Focus Area:** Justice & Equity, Robust Economy & Job Creation

#### Why This Matters:

- While building codes help make new buildings or remodeled homes more resilient, existing housing stock is also vulnerable to hazards.
- Grants, financing, and other assistance can help homeowners mitigate flood risks, create energy efficiencies, and cool their homes during heat waves.
- In particular, the Department of Housing and Community Development administers US Housing and Urban Development Community Development Block Grants as well as Maryland Housing Rehabilitation loans that can be used for this purpose.<sup>29,28</sup>



### Recommendation 1.3

Establish and fund a buyout program for homes in flood-prone areas.

Owner: TBD

Timeline: 10 years

Funding: TBD

Focus Area: Justice & Equity

#### Why This Matters:

- In areas that are prone to flooding, voluntary home buyouts are an important tool to move individuals out of harm's way.<sup>49</sup>
- States around the country – like New Jersey and South Carolina – have established buyout programs to advance resilience and draw down flood risk.<sup>50,51</sup>

## GOAL 2 - Support resilient and affordable growth.

### Recommendation 2.1

Provide guidance, data, and technical assistance to promote resilient and safe development of affordable modular and traditional housing.

Owner: MDOL

Timeline: 2 years, ongoing

Funding: No additional funding needed

Focus Area: Justice & Equity

#### Why This Matters:

- Modular housing is an important part of Maryland's housing supply that makes homeownership more affordable and attainable.
- To maintain affordability and advance hazard resilience, the state needs programs that make both modular and traditional housing construction safer.

### Recommendation 2.2

Develop model ordinances that incorporate resilience to support risk-informed development and land use.

Owner: MDP

Timeline: 5 years

Funding: Potential HUD PRO Housing Grant

Focus Area: Robust Economy & Job Creation

#### Why This Matters:

- In Maryland, local governments are responsible for zoning and land use decisions that dictate where development happens.
- Local stakeholders expressed a need for model ordinances that incorporate resilience in development.
- The State of Maryland has recently received a HUD PRO Housing Grant that is funding model ordinance development.<sup>52</sup> Future HUD PRO Housing funding could be utilized to fund this effort.



### Recommendation 2.3

Work with local governments to implement the State's Resilience Planning Principle in comprehensive planning.

**Owner:** MDP

**Timeline:** 5 years

**Funding:** Funding Secured - General Funds

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- In 2025, Governor Wes Moore signed legislation into [law creating the Sustainable Growth Planning Principles](#). One of those principles is resilience.<sup>23</sup>
- MDP is implementing these principles to guide local comprehensive planning, which will inform land use.

## GOAL 3 - Bolster Maryland's property insurance market in the face of climate change to protect homeowners and renters.

### Recommendation 3.1

Convene relevant state partners to understand the impact of climate change on the property insurance market in Maryland, and inform future strategies that promote market stability and insurance affordability.

**Owner:** Office of the Comptroller & MIA

**Timeline:** 2 years

**Funding:** No additional funding needed

**Focus Area:** Robust Economy & Job Creation

#### Why This Matters:

- Across the country, [climate change is impacting homeowners' insurance](#) with premiums rising and private insurers withdrawing from hazard-prone areas.<sup>53</sup>
- Renters are also at-risk of financial damages from disasters.
- Many homeowners and renters [do not realize that flood insurance policies](#) must be purchased separately.<sup>54</sup>
- While Maryland insurance markets are in a strong position, it is essential for relevant state parties to monitor this challenge and consider proactive strategies.

**\*\* End of Sector Recommendations \*\***