





ADDRESSING FOOD SECURITY POLICY GAPS IN ARMENIA: A CLIMATE ADAPTATION LENS

POLICY BRIEF

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Problem

Armenia faces significant food security challenges, exacerbated by climate change. Declining agricultural productivity can be attributed to the predominance of small-scale and traditional farming practices, the increased frequency of extreme weather events, and insufficient adaptive measures within national food security policies. Frameworks like the World Food Programs Strategic Plan (2019-2024) for Armenia define actions to enhance national food systems and achieve greater food security. They aim to improve access to nutritious food for all, with a focus on addressing regional disparities in hunger and malnutrition. However, these policies lack adequate attention to climate adaptation and resilience, leaving vulnerable populations at increased risk. A signatory to the Paris Agreement, Armenia also has international obligations.

Context

Food Security in Armenia is shaped by economic, social, and environmental factors. Agriculture remains a critical sector for the country's economy: <u>35% of the rural population depends directly on agriculture for income</u>. Significant policy gaps and sectoral challenges hinder effective solutions for issues like food access and sustainable agriculture. These include:

- 1. Agricultural Dependency: Agriculture contributes about 12% of Armenia's GDP and employs over 30% of the population. Limited arable land primarily dedicated to grains, vegetables, fruits, and vineyards is worked primarily through small-scale farms. Despite recent efforts to diversify crops, much of the rural economy still relies on traditional farming practices. The country is also experiencing more frequent occurrences of frost, heavy rainfall, and manmade disasters, which are often caused by a lack of awareness and limited access to critical information.
- 2. **Irrigation and Water Management**: Armenia's agriculture heavily depends on irrigation due to its semi-arid climate. The Soviet-era irrigation infrastructure has undergone modernization, supported by international investments. These improvements have enabled farmers to transition to higher-value crops like

vegetables and orchards, <u>but water shortages and uneven irrigation access</u> remain critical issues.

- 3. Climate Vulnerabilities and Climate Impacts: According to the Armenian Ministry of Environment, rising temperatures and water scarcity affect crop yields and livestock, threatening food availability and affordability. The sector is highly sensitive to climate change. Increased temperatures, variable precipitation, and extreme weather threaten crop yields and water resources. There is a growing need for climate-smart agriculture practices, including efficient irrigation, resilient crop varieties, and improved farming techniques.
- 4. **Policy Gaps and Support System**: Existing policies, including the Food Security Strategy, prioritize market stability but offer limited actionable plans for climate resilience. Areas lacking attention include water resource management, sustainable farming practices, and risk mitigation for smallholder farmers. Armenia lacks a cohesive food security and agricultural policy framework. Limited access to modern technologies, financial services, and agricultural markets hinders the sector's growth potential. Strategic policies are needed to enhance infrastructure, provide financial incentives, and strengthen market integration.

To mitigate these challenges and gaps Armenia should: strengthen international cooperation, conduct research on best practices and follow implementation on national level, raise awareness, invest in modern infrastructure, and promote Good Agricultural Practices (GAPs).

Scenarios and Policy Implications

Scenario 1: Policy Stagnation - continued reliance on current policies will exacerbate food insecurity. This would lead to <u>increased imports, inflation, and</u> reduced resilience in rural areas.

Scenario 2: Proactive Policy Integration - implementing comprehensive reforms in agricultural and climate policies could mitigate risks, improve food security, and align Armenia with international sustainability goals, <u>such as the Paris Agreement targets</u>.

Recommendations

1. Strengthen Climate-Resilient Agriculture:

- Promote water-efficient technologies like drip irrigation.
- Invest in climate-smart agriculture practices

2. Enhance Policy Coordination:

- Consolidate food safety and climate adaptation mandates under a unified body.
- Align local policies with international frameworks like the UN Framework Convention on Climate Change.

3. Public Awareness and Training:

Launch educational campaigns on sustainable farming.

Provide incentives for adopting eco-friendly agricultural practices.

4. Infrastructure Upgrades:

- Modernize food safety laboratories and monitoring systems.
- Establish more weather monitoring stations for better predictive analytics

Canada's Role in Supporting Armenia's Food Security

Canada, as a global leader in sustainable agriculture and climate adaptation, can play a pivotal role in addressing food security challenges in Armenia through several methods.

Policy and Framework Development: Sharing best practices from Canada's comprehensive agricultural policies, such as its Food Policy for Canada, can guide Armenia in creating robust frameworks for sustainable food systems.

Capacity Building: Through knowledge-sharing initiatives and training programs, Canadian agricultural experts and institutions can empower Armenian farmers and policymakers to adopt modern, climate-smart agricultural practices. Learn from Canadian models, such as Agri-Food Canada, to integrate sustainability in agriculture.

Technological Assistance: Canada's advancements in precision agriculture, waterefficient irrigation technologies, and sustainable crop production can help modernize Armenia's agricultural infrastructure.

Research and Innovation Partnerships: Collaborative research between Canadian and Armenian institutions can develop climate-resilient crop varieties, improving water resource management and enhancing soil health.

Financial and Technical Support: Canada can provide grants and technical assistance for projects that focus on food security, infrastructure upgrades, and market integration for Armenian farmers.

By integrating these efforts into its international development agenda, Canada can foster long-term resilience and sustainable growth in Armenia's food security sector. This aligns with Canada's commitment to the United Nations Sustainable Development Goals and its broader mission to promote global food security and climate adaptation.

Conclusion

Armenia must adopt a multi-pronged approach that includes strengthening climate-resilient agriculture, enhancing policy coordination, and improving infrastructure. By adopting water-efficient technologies, promoting sustainable farming practices, and modernizing food safety laboratories, Armenia can build a robust agricultural system capable of withstanding climate-related challenges. Public awareness campaigns and capacity-building initiatives are essential to ensure that farmers and communities can effectively adopt these practices.

International cooperation will play a pivotal role in achieving these goals. Technologies like precision agriculture and water-efficient irrigation, proven effective in Canada, could be adapted to Armenia's unique climatic and agricultural conditions.

Armenia's alignment with global frameworks such as the Paris Agreement and the United Nations Sustainable Development Goals provides a foundation for integrating international collaborations into its national policies. This alignment ensures that Armenia's food security strategies are not only locally effective but also contribute to regional stability and resilience. Solutions will be globally relevant, contributing to hunger eradication and climate resilience.