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Fellowship Capstone | Policy Brief

Antibiotic Resistance as Foreign Policy: U.S. Leadership in the Fight Against AMR

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I. EXECUTIVE SUMMARY

Antibiotic resistance is a growing global health crisis with wide-reaching economic, security, and humanitarian implications. If left unchecked, antimicrobial resistance (AMR) threatens to undermine decades of medical progress, making once-treatable infections deadly and increasing the likelihood of future pandemics. Though commonly understood as a public health issue, also critical challenges AMR poses international relations, trade, and national security. This brief will explore how U.S. foreign policy can address AMR by leveraging its global influence to regulate antibiotic use, improve surveillance, and coordinate with multilateral partners. In doing so, it argues that AMR is not just a scientific problem but a geopolitical one-requiring urgent action across diplomatic, regulatory, and humanitarian domains.

II. Overview

Penicillin, an antibiotic that effectively treats a wide range of bacterial infections, was the first naturally occuring drug of its kind to start the antibiotic era. Penicillin and the development of other similar antibiotics in the mid-1950s easily cured a variety of diseases that were previously untreatable and fatal. Altering the course of modern medicine, the evolution of antibiotics has extended the average human lifespan by 23 years. However, this miracle drug has not been without

its pitfalls. Within recent years, there is a concern about antibiotic resistance and its global crisis. Bacteria's growing resistance to antibiotics through misuse and overuse by patients means little effectiveness. The World Health Organization has identified AMR as one of the top 10 global health threats, warning that without coordinated international action, common infections could once again become deadly. The overuse and misuse of antibiotics in both human medicine and livestock agriculture, particularly in countries with lax regulation, have accelerated this process. AMR does not recognize borders: resistant strains originating in one country can globally through travel, trade, and migration.

A. Relevance

Antibiotic resistance is not only a public health issue—it's a foreign policy issue. The United States cannot fight AMR in isolation. As the world's largest provider of global health aid and a major pharmaceutical exporter, the U.S. plays a critical role in shaping antibiotic usage and stewardship norms abroad. Antibiotic resistance has the potential to disrupt global markets, increase health care costs, destabilize low-resource health systems, and erode U.S. influence.

III. HISTORY



A. Current Stances

Efforts to address antibiotic resistance began gaining traction in the early 2000s, culminating in the World Health Organization's 2015 Global Action Plan on AMR. However, implementation has been uneven. The U.S. released its own National Action Plan for Combating Antibiotic-Resistant Bacteria in 2015 (updated in emphasizing domestic stewardship, 2020), research, and international collaboration.

Yet critics argue that U.S. foreign policy has not fully leveraged its influence. While agencies like USAID and the CDC have worked on AMR surveillance abroad, there is no consistent strategy for aligning trade policy, development aid, and health diplomacy around this issue. Meanwhile, countries like India and China continue to serve as hotspots for resistant bacteria due to high population pharmaceutical density, poor regulation, pollution and industrial from antibiotic production. Without international standards and accountability, current approaches are likely to fall short.

A. Stakeholders

Key stakeholders include:

- U.S. federal agencies such as the CDC, USAID, State Department, and Department of Health and Human Services influence global health and trade.
- Low- and middle-income countries (LMICs), whose pharmaceutical production and agricultural systems have limited resources to combat AMR.

- Multilateral organizations like the WHO and World Bank which facilitate global coordination.
- Private pharmaceutical firms and agriculture exporters, who influence drug manufacturing, usage, and regulation.

B. Risks of Indifference

Without policy action, resistant infections could become the leading cause of death by 2050. Indifference not only jeopardizes public health but also threatens economic stability, trade reliability, and global security. LMICs may suffer disproportionately, exacerbating global inequalities and weakening trust in U.S. global leadership.

C. Nonpartisan Reasoning

Combating AMR should not be a partisan issue. Addressing AMR strengthens national security, supports global stability, and protects economic interests. It also positions the U.S. as a responsible leader in international development and public health.

IV. TRIED POLICY

The 2015 U.S. National Action Plan emphasized domestic monitoring, stewardship programs, and international collaboration. However, implementation of its international goals has lagged. There is limited integration between AMR priorities and foreign policy tools such as trade agreements, regulatory diplomacy, or global aid. This gap reveals the need for more targeted



foreign policy mechanisms.

Additionally, while the WHO's Global Action Plan offers a framework, its voluntary nature limits enforcement, especially in countries with conflicting economic interests.

V. POLICY OPTIONS

A. Incorporate AMR Safeguards into Trade Agreements

The U.S. can condition trade deals with major pharmaceutical and agricultural exporters on measurable commitments to antibiotic stewardship, including limits on non-therapeutic antibiotic use in livestock and wastewater treatment standards for drug manufacturers.

B. Expand USAID AMR Programming

USAID's existing global health initiatives can be expanded to fund AMR surveillance, lab capacity-building, and education campaigns in LMICs. This would increase resilience in frontline health systems while strengthening U.S. partnerships.

C. Create an AMR-Focused Global Health Envoy

Modeled after the U.S. Global AIDS Coordinator, this envoy would coordinate interagency responses, align foreign policy and development goals, and represent U.S. interests in multilateral AMR negotiations.

D. Enforce Environmental Controls on Pharmaceutical Pollution

The U.S. can integrate environmental safeguards into bilateral agreements by requiring wastewater

treatment and pollution limits at antibiotic production sites, especially in high-exporting countries.

E. Fund Global Innovation Challenges for AMR Alternatives

The U.S. can launch multilateral R&D initiatives offering grants or prizes for alternatives to antibiotics, such as phage therapy, vaccines, and rapid diagnostics, to reduce antibiotic dependence worldwide.

VI. CONCLUSION

Antimicrobial resistance is a mounting global that transcends borders, demanding coordinated foreign policy action. While U.S. health agencies have made strides, a broader health, integrating trade, strategy development is urgently needed. By embedding AMR safeguards in trade deals, expanding foreign aid programming, and designating a health envoy, the U.S. can mitigate this threat while strengthening global trust and stability. Delaying action will only raise future costs-human, economic, and political. U.S. leadership on antimicrobial resistance (AMR) is not just possible, it is necessary.

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