



HEALTH IN ALL POLICIES AND WATER: AN INTRODUCTION

Health in All Policies (HiAP) is an approach that encourages policymakers across sectors to consider how their decisions impact community health. Government programs, from local utilities to federal highway projects, can use HiAP to make decisions that account for their services' and activities' health impacts. When applied to water programs, HiAP promotes a comprehensive look at how water impacts health, and behooves us to consider upstream solutions to address these impacts. Issues extend beyond meeting safe drinking water standards, and include topics of water affordability, access to an adequate water supply, stable water infrastructure, and availability of safe water for bathing and recreation.

Water is Essential to Life

Access to drinking water as a basic human right has been recognized for thousands of years. Ancient texts, such as the Bible and Koran, proclaim the right to safe and clean water.¹ In the twenty-first century, the United Nations promulgated a resolution that states everyone has the right to sufficient, continuous, safe, acceptable, physically accessible, and affordable water for personal and domestic use.¹ States have also taken action to codify this right into law. In 2012, California became one of the first states to recognize the human right to water through AB 685.²

Safe water is defined as water that is free from micro-organisms, chemical substances, toxins, and radiological hazards that constitute a threat to a person's health.^{3,4} Contaminated water and poor sanitation are linked to disease transmission, and inadequate or inappropriately managed water and sanitation services expose individuals to preventable health risks. Unfortunately, growing populations, lack of resources for water infrastructure maintenance and investment, and climate change's mounting impacts on hydrologic conditions have created a major threat to water supplies and water quality.

Public health and environmental officials help keep our water safe through a numerous activities, such as sampling, laboratory testing, surveillance, setting regulations and guidelines

for water quality, administering health advisories when issues arise, educating the public on health risks related to water, and working with partner organizations and individuals to manage water quality and quantity. However, many issues still arise domestically and abroad with water quality and quantity, including access to clean water. A HiAP approach can help address issues related to water justice, source water protection, and water security through the development of more upstream solutions, including policies that impact agricultural runoff and industrial pollution, climate change, and access to water utilities. Additionally, a HiAP approach can be part of the battle to fight obesity through policy changes and taxes that encourage drinking water instead of sugar-sweetened beverages (SSBs).

Protecting our water systems is important for everyone, but may be especially important as an environmental justice issue. Accessing safe water can be particularly challenging for those who rely on assistance programs to keep their water turned on, use private wells, or are on small systems that cannot afford treatment systems needed to meet drinking water standards. Through a HiAP approach, government agencies and other decision makers can address issues related to water justice, water security, source water protection, and promoting water as the beverage of choice.

The corresponding guides share successful HiAP examples in each of these areas. The

purpose of these guides is to provide context for current water and public health issues, showcase successful collaborations that have resulted in improved management of our water systems, and highlight examples, strategies, and opportunities for government agencies, community groups, and decision makers to engage in water issues through a HiAP approach.

Water Justice

Water justice can be defined as clean and safe water for everyone, regardless of their location, type of water system, or income level. In areas where residents do not have access to safe drinking water, some communities have successfully brought water justice issues to the forefront by forming collaboratives. Collaborative efforts have promoted changes to water policy and programs to reflect values of health equity and environmental justice. Water justice issues can be complex, and touch on issues that include source water protection, water security, water consumption, water affordability, and storm water management. Some of these joint efforts are funded specifically through federal, state, or local grant programs, but many others are partnerships formed merely through the identification of common goals. The collaboratives embody the same strategies used to achieve HiAP and bring together various stakeholders from youth residents to city council members.

Water Security

Building partnerships is key to successful HiAP initiatives. For water issues, working collaboratively is especially challenging during times of drought, when agriculture, energy, and residential drinking water sectors vie for dwindling water resources. In California and other U.S. areas experiencing extended droughts, it can contribute to both the loss of agricultural production and greater need for water for irrigation. Drought contributes to losses in the energy sector, reducing hydroelectric power generation and increasing demand for energy-intensive pumping of groundwater. Drought contributes to increased demand for water from the residential sector,

which has an expanding population. Water-related sectors can use a HiAP approach to address this complex array of issues and promote public health.

However, even areas with plenty of rainfall and large reservoirs experience water shortages. In these areas, a primary concern among many water suppliers is how to meet peak summer demand when water shortages occur. Adopting a HiAP approach can expand the range of options used to address seasonal water shortages, and avoid the devastating, unintended consequences of policies that may not consider broader public health issues. Specific strategies include water reuse, water reclamation, greywater recycling, and use of catchment systems. Behavior changes are also important water conservation techniques. Upstream, local water conservation ordinances are key policies that help address water security issues.

Healthy Beverages

In the fight against childhood obesity, facilitating continuous access to safe drinking water is a healthy alternative to providing SSBs in schools and vending machines. Incentives for promoting water consumption over sugary drinks include suspending taxes on bottled water and placing additional taxes on sugary drinks. When incentives aren't enough to change behavior, mandates via local or state policy can remove SSBs from schools and workplaces, or limit SSB marketing in certain venues. In addition, federal law requires schools participating in the National School Lunch Program to provide access to free drinking water during lunch time where meals are served to students. Collaborations between governmental agencies, schools, parents, and community groups have successfully implemented programs to promote the availability and consumption of water over SSBs.

Source Water Protection

Access to safe water, even in areas with abundant water supplies, becomes a problem when drinking water sources are contaminated. Despite mandates to meet drinking water

standards, water suppliers must continue to provide water to customers for consumption and food preparation, even when the water is not necessarily safe to drink. People also need water for bathing, recreation, certain utilities (e.g., flushing toilets), and fire suppression.

Through multi-stakeholder collaboration, HiAP can support developing policies that get to these problems' root causes and prevent the reoccurrence of contaminated water supplies, such as upstream contamination from agricultural runoff or industry, or increased salinity due to sea-level rise from climate change.

For much of the nation, bacteria and algal bloom problems require better control of sources, including nutrient-laden storm water runoff. Other contamination problems, such as industrial releases and nutrient pollution from agricultural runoff, require better control of industrial practices. With partnerships between landowners, governmental agencies, local

decision makers, residents, and community groups, source water protection can be addressed through a HiAP approach.

HiAP and Safe Water

Although clean, safe, abundant water may seem like a given in many communities, it is not a reality everywhere in the United States. Adopting HiAP approaches can increase everyone's access to a clean, safe supply of this essential nutrient. By establishing new partnerships, collaborating across governmental sectors, and outlining common goals, the nation can move closer to providing safe and affordable water through the adoption of broader policies and programs and implementation of protective measures.

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REFERENCES

¹ United Nations. "Resolution 64/292: The Human Right to Water and Sanitation." Adopted July 28, 2010. Available at: <http://www.un.org/es/comun/docs/?symbol=A/RES/64/292&lang=E>. Accessed 7-1-2015.

² State of California. Assembly Bill Number 685. Sept. 25, 2012. Available at: http://www.leginfo.ca.gov/pub/11-12/bill/asm/ab_0651-0700/ab_685_bill_20120925_chaptered.pdf. Accessed 12-1-2015.

³ World Health Organization. "Water." Available at: <http://www.who.int/topics/water/en/>. Accessed 8-24-15.

⁴ United Nations. "Human Right to Water." 2005-2015. Available at: http://www.un.org/waterforlifedecade/human_right_to_water.shtml. Accessed 8-24-15.