EPA's Climate Change Adaptation Resource Center (ARC-X): Responding to the Needs of Local Communities

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EPA's Goal in Support of Local Communities

Empower *all* 40,000 communities across the nation to anticipate, prepare for, and adapt to the impacts of climate change.

Central Element of EPA's Efforts: Building Adaptive Capacity

EPA is mainstreaming climate adaptation planning by:

➢ Building and strengthening the "adaptive capacity" of its staff and its partners in the states, tribes, and local communities

➢ Supporting their efforts to integrate climate adaptation into the work they do by:

   ✓ **Training:** increasing awareness of ways climate change may affect their ability to implement effective programs

   ✓ **Tools and Technical Support:** providing data, information, tools and technical support

   ✓ **Financial incentives:** supporting climate-resilient investments in communities across the country

Some Communities are Already Acting:
Massachusetts Water Resources Authority

➢ Redesigned and upgraded the Deer Island Wastewater Treatment Plan in Boston Harbor (1989-1998)

➢ $3.8 billion investment!

➢ Anticipated impacts of climate change and sea level rise over lifetime of the facility (2050)

➢ Raised key portions of the facility by 1.9 feet in anticipation of future increases in sea level
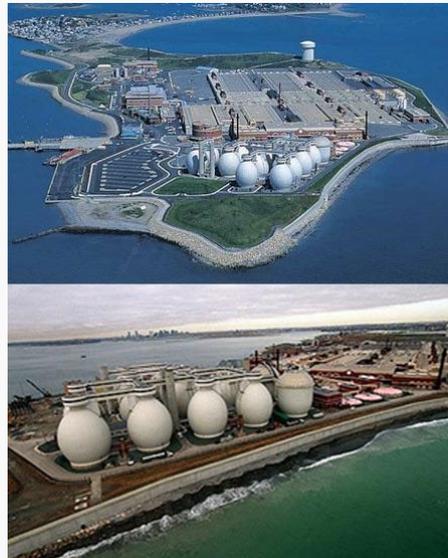
Many Communities Are Still Struggling to Adapt

➤ Particularly challenging for middle- to smaller-sized communities

➤ The challenges:

  ✓ Often lack technical expertise and experience with adaptation

  ✓ Also limited resources to devote to adaptation

  ✓ Overwhelmed by huge volume of information about climate adaptation, much of which is irrelevant to their community

  ✓ Challenging to integrate available information into a single package that will provide them with a complete recipe for how to evaluate and prepare for the risks posed by climate change

> *"We don't need any more stinkin' tools. What we need is the technical assistance to understand which tools are the right ones for us to use given the issues of concern to us, and the technical assistance to understand how to use the tools."*

**EPA's Climate Adaptation Resource Center (ARC-X)
Meets These Challenges.**

Unlike any other resource currently available to the public.

www.epa.gov/arc-x

EPA's Adaptation Resource Center (ARC-X): Responding to the needs of local communities

➢ EPA's Adaptation Resource Center (ARC-X) is an interactive resource to help **local government officials** effectively deliver services to their communities even as the climate changes.

➢ Using the ARC-X, decision makers can obtain an integrated package of information *tailored specifically to their needs*.

➢ Once users select the areas of interest to them, they will find information about:
  - ✓ the risks posed by climate change to the issues they care about;
  - ✓ adaptation strategies they might consider implementing;
  - ✓ case studies illustrating how other communities have successfully adapted to those risks;
  - ✓ tools to replicate the successes of other communities **(the relevant tools & technical support!)**

➢ The ARC-X is designed to help *all 40,000 communities* across the nation anticipate, prepare for, and adapt to the impacts of climate change.

➢ **Already being used by over 40,000 users in all 50 states**

State-Level Versions

- ➤ ARC-X is a national system (to share information across all 40,000 communities in all 50 states)

- ➤ Unable to do "deep dive" into any one state

- ➤ Fostering development of state-level versions by "host universities"
  - ✓ **Provide code and content *free of charge***
  - ✓ **Provide technical support**

- ➤ Encouraging host universities to:
  - ✓ Form partnerships with, and leverage expertise of, other universities in the state
  - ✓ Ensure engagement of HBCUs and other minority-serving institutions (MSIs)

- ➤ Sharing of case studies with EPA & other state-level versions of the ARC-X

- ➤ Examples of systems being developed:
  - ✓ Indiana (**Launched in September 2017**)
  - ✓ New York & Puerto Rico
  - ✓ Virginia
  - ✓ Louisiana

Demo of the ARC-X