

1-1-2011

The Fifty-Third Annual Convention of the Colorado Water Congress: Climate and Water Policy: When is the Right Time to Adjust Course?

Dustin Charapata

Follow this and additional works at: <https://digitalcommons.du.edu/wlr>



Part of the [Law Commons](#)

Custom Citation

Dustin Charapata, Conference Report, The Fifty-Third Annual Convention of the Colorado Water Congress: Climate and Water Policy: When is the Right Time to Adjust Course?, 14 U. Denv. Water L. Rev. 425 (2011).

This Conference Report is brought to you for free and open access by the University of Denver Sturm College of Law at Digital Commons @ DU. It has been accepted for inclusion in Water Law Review by an authorized editor of Digital Commons @ DU. For more information, please contact jennifer.cox@du.edu, dig-commons@du.edu.

The Fifty-Third Annual Convention of the Colorado Water Congress: Climate and Water Policy: When is the Right Time to Adjust Course?

CONFERENCE REPORTS

THE FIFTY-THIRD ANNUAL CONVENTION OF THE COLORADO WATER CONGRESS

Denver, Colorado January 26-28, 2011

CLIMATE AND WATER POLICY: WHEN IS THE RIGHT TIME TO ADJUST COURSE?

This session focused on adapting water policy to meet the needs of population growth, economy, diverse human values, and climate change. Engineers and policy makers who were influential during Australia's recent water crisis highlighted some of the challenges Colorado may face due to climate change.

Marc Waage from Denver Water began the session by explaining that climate change is happening, but it is unclear at what rate or how high temperatures will reach. Based on current models showing the evaporative effect of warming temperatures, Denver could expect a significant supply gap by 2050. To plan for a multitude of scenarios, Denver Water uses a modeling formula that projects present, near-term, and long-term scenarios against a variety of future uncertainties. Waage also discussed possible solutions, which include new supply development, efficiency, reducing population growth, and reducing agricultural transfers.

The next speaker, Mark Pascoe from the International Water Centre in Queensland, Australia, stated that Australia's climate models, like Denver's, also show a supply gap in 2056. Pascoe talked about Urban Heat Island Effect, which shows a city's interior is, on average, four degrees hotter than the outer edges. He suggests keeping water in the cities to produce a cooling effect and using cities as supply catchments because Australian cities are capable of collecting as much water as they consume.

Mark Pifher from Aurora Water spoke next about the need for regulatory schemes to adapt to an environment with higher temperatures and less water. Increased temperatures will affect the biological integrity of watercourses because cool water species will die. In addition, future reduced flow and increased temperatures will affect chemical integrity by increasing salinity and lowering dissolved oxygen content. Thus, the regulatory scheme for effluent limitations will have to adapt and consider low flow averages to be the norm instead of the exception. Some organizations, like the Association of Metropolitan Water Agencies, have recognized that new institutional structures may be necessary to handle the challenges presented by climate change.

Although the Environmental Protection Agency (EPA) recognized in its 2010-2011 Key Action Update that regulatory programs might require modification due to climate change, the EPA has yet to communicate a clear policy that adapts the regulatory scheme to climate change. Pifer concluded by stating that regulatory reforms must adapt to reflect reality because the consequence of inaction is too great.

Scott Ashby, a policy-maker from Adelaide, Australia, spoke last about the challenges of water management during Australia's recent drought. Ashby began by stating that analysts have historically based water management policy on average flows, but with the reality of climate change, these policies will need to adjust to take account of extreme flow variation. He spoke about the difficulty of reaching an agreement between states concerning water rights in the Murray-Darling Basin, a situation geographically and hydrologically similar to the Colorado Basin. In a last ditch effort to prevent Adelaide from running out of water at the height of the drought, the city resorted to developing a desalinization plant.

At the end of the session, the speakers fielded questions from the audience. The audience directed many of the questions at Ashby and Pascoe regarding the government's reaction during the drought.

Dustin Charapata

TAKING CARE OF BUSINESS: BUILDING AND MAINTAINING OUR WATER INFRASTRUCTURE

Peter Binney of Merrick & Co. moderated the panel. He began the session by discussing the deterioration of America's water infrastructure and the need for billions of dollars in improvements to bring it back up to modern standards. He noted that users' cost of water service will have to go up or the level of service will fall.

The first panelist, David Downie, general manager for the Department of Sustainability and Environment in Victoria, Australia, began with background information about Victoria. He explained that in Victoria, the public owns utilities, including water, but there is ample private participation. Downie emphasized the community involvement in the utilities-business-plans, and that the overriding policy goal is to have users pay the full cost of their services, which includes infrastructure building and repair. He noted that it was a challenge to explain to users that prices must be set in terms of infrastructure. Their cost of service needed to reflect the costs involved in capturing and transporting the water, not just the cost of the water itself.

The second panelist, Peter Sutherland, Business Leader - Water Resources for GHD in Sydney, Australia, presented a slide show entitled: *Taking Care of Business: The Search for Water Security in Australia*. Sutherland reiterated Downie's point that, as the cost of water and the necessary infrastructure continues to increase, users should expect to