WESTERN STATES WATER COUNCIL

682 East Vine Street, Suite 7 / Murray, Utah 84107 / (801) 685-2555 / FAX (801) 685-2559

Web Page: www.westernstateswater.org

July 7, 2020

The Honorable Nita Lowey, Chair
Committee on Appropriations
U.S. House of Representatives
The Capitol, H-307
Washington, DC 20515

The Honorable Kay Granger, Ranking Member
Committee on Appropriations
U.S. House of Representatives
1036 Longworth House Office Building
Washington, DC 20515

The Honorable, Betty McCollum, Chair
Interior, Environment & Related Sub.
Committee on Appropriations
U.S. House of Representatives
2007 Rayburn House Office Building
Washington, DC 20515

The Honorable David Joyce, Ranking Member
Interior, Environment & Related Sub.
Committee on Appropriations
U.S. House of Representatives
1016 Longworth House Office Building
Washington, DC 20515

Dear Chairs and Ranking Members:

On behalf of the Western States Water Council, a state government entity advising the governors of eighteen states, I am writing to express our strong support for the U.S. Geological Survey (USGS) Water Resources Program, as you mark up the FY2021 Interior appropriations bill.

In particular, the Council has long supported the USGS Water Availability and Use Science Program, including Water-Use Data and Research, the Groundwater and Streamflow Information Program, the Water Quality Program and the Water Resources Research Act Program that supports the Nation's Water Resources Research Institutes. Our member states benefit from and partner with USGS under these programs, and the Council collaborates with and supports USGS work through development of our own Water Data Exchange (WaDE) focused on water rights and aggregate water use data.

We would also like to express our support for the OpenET proposal to leverage the work of a broad network of collaborators to develop and provide credible, transparent, automated, and easily accessible data on evapotranspiration (ET) and consumptive use (CU) using satellite-based sensors and cloud computing. For many years, the Council has supported the use of satellite imagery to estimate ET and CU under actual field conditions over large areas, particularly the use of thermal infrared imaging data available from Landsat 7 and Landsat 8.

The proposed OpenET initiative addresses an urgent need for an operational system that can produce accurate consumptive use estimates that are available for automated data transfer to federal, state, and local water agencies that can also be used with irrigation management information systems. It will create data visualization and Application Programming Interface (API) platforms for viewing, down-loading, and enabling automated computer-to-computer data transfers and integration into the National Hydrologic Model and National Water Census databases.

Currently, no operational system exists for monitoring actual consumptive use of irrigation water and reservoir evaporation in the Reclamation Act states. The proposed initiative would make this information more accessible and easier to interpret for a wide range of ET models. It aims to collaboratively develop a software system to operationally estimate field-level consumptive use from irrigated agriculture and reservoirs.

The OpenET team includes experts in satellite-based estimation of ET, cloud computing, and user-driven website design from USGS, USDA, NASA, the Desert Research Institute (DRI – Nevada's water resources research institute), other partner universities and private consulting firms. The WSWC is also working with the OpenET team to coordinate our efforts to provide state water use data.

Water resources research, and the dissemination and application of research results and technology transfer are increasingly important to meeting our present and future water needs. Today's USGS supported water research infrastructure uses the capabilities of universities to greatly assist and provide federal and state water agencies important support for long-term planning, policy development and management of the increasingly complex water use and supply challenges.

Agricultural water use is the largest consumptive use of water in the West, and observing systems that provide data and visualization tools for interpreting those data aid in the more efficient use of water that is critical for managing our growing needs for food and fiber, while protecting the environment.

Consumptive water use data is essential for the administration and protection of water rights in the West, which are based on beneficial use. This includes general stream adjudications, interstate compacts, court decrees and negotiated water rights settlements. In addition, as consumptive use is the measure of a water rights, it is also an indispensable element of any water transfer or water marketing mechanism.

Moreover, such data and tools will help mitigate the additional stresses on western water resources from the impacts of climate variability and changes in plant and crop evapotranspiration resulting in changed water demand patterns. Water resources planning and management at all levels of government and sound future decision-making depend on our ability to understand, monitor, predict, and adapt to climate variability.

The Western States Water Council urges the Committee to give a high priority to the allocation and appropriation of sufficient funds for these vital programs. Western water law and policy are based on the reality of scarcity and the need to use water wisely. Measuring and monitoring consumptive water use is an essential key. We have made great strides in increasing efficiency and reducing water use in the West and the Nation, but continued investments are needed.

If you have any questions, please don't hesitate to contact me.

Sincerely,

Tony Willardson
Executive Director