

Mapping the future of solar energy in the Columbia Basin

Budget proviso funds consensus building process for solar PV siting

Problem Statement: Between 1982 and 2012, 363,300 acres of farmland and 561,100 acres of forestland in Washington were lost to development. In the Columbia Basin, we've lost over half of our native shrub steppe. The agricultural sector of the state's economy, and of rural Eastern Washington counties in particular, makes a significant contribution to our state's export oriented economy. These same lands are suitable for solar energy generation, offering additional revenue for struggling farmers. A mapping study proposed for the state will show we have enough land for both solar energy and agricultural production.

The recently passed [Clean Energy Transformation Act](#) requires Washington state utilities to meet 100% of their load with clean, renewable sources of energy by mid-century. To meet these statutory requirements, Washington state utilities will have to replace the approximately 25% of the electricity that comes from fossil fuels with renewable resources like solar PV.

It is critical that Washington State balance the need to meet these energy goals with the need to protect the agricultural economy and conservation needs. Instances of conflict between the transition to *solar* energy in Washington state and the need to protect our *agricultural economy and natural heritage* must be addressed through a fair and inclusive process.

In other parts of the country, such conflict has been avoided through stakeholder engagement processes to identify least-conflict areas for solar PV development and guide best practices and policymaking for solar siting. A proposed budget proviso for the 2020 supplemental budget provides a strategic approach to reducing land use conflicts while fostering an increase in solar energy production, all while supporting a robust agricultural economy.

Background Information: In order to find a common path forward in expanding solar power production in Washington state, it's important to ensure a variety of perspectives on land use are included. We should embrace an inclusive process for balancing a wide variety of interests, guiding utility-scale solar PV development towards areas with the least conflicting values.

In 2015, California [tackled these same issues head-on](#) in the highly agriculturally productive San Joaquin Valley. Berkeley Law's Center for Law, Energy and the Environment (CLEE) partnered with Conservation Biology Institute (CBI) and a third-party facilitator to identify "least-conflict" areas for solar PV development in the eight-county San Joaquin Valley region.

The project team convened agricultural, ranching, conservation, and utility-scale solar PV development stakeholders, tribes, and key agencies. Through the facilitated process, participants identified the areas of least conflict for the development of solar PV. That data was used to inform maps that developers now use to make rational, community-informed decisions about where to propose new utility-scale solar PV projects and where projects might be permitted more efficiently without opposition or conflicts.

Budget Proviso Statement of Intent: Beginning in 2020, Washington State University's Energy Program (WSU-EP) will house a program to develop least conflict priority maps and voluntary preferred practices for Washington state's Columbia Basin. WSU-EP can serve as a neutral party, bringing together conservation groups, agricultural interests, utilities, government agencies and tribes, as well as solar developers to develop these stakeholder-driven maps.

WSU-EP will also review the latest research and development on preferred practices for dual-use and co-location of solar PV and agriculture, housing these maps and preferred practices in a one-stop shop for companies and permitting agencies interested in siting solar PV in the Columbia Basin. This work can also serve as a pilot project for the development of least conflict maps and preferred practices in other parts of the state.

In leading this process, WSU-EP will conduct interviews with key stakeholders, convene meetings with all of the stakeholder groups, and facilitate intra-group stakeholder meetings to map out areas of least conflict. WSU-EP may contract with experienced outside facilitators to assist in the stakeholder engagement process and map development but should ultimately serve as the institutional home for this data.

Stakeholder Process

- Compile existing map layers through consultation with state and federal agencies, NGOs, and other relevant stakeholders.
- Convene working group of solar industry representatives to identify *opportunity area* for development, which will serve as the geographic scope of the least conflict priority review for other stakeholder groups.
- Convene independent working groups for leaders from the agricultural, ranching, conservation, tribes, and government agencies to identify least-conflict areas based on their own group assessment
- Compile data from different workgroups to produce a shared map with least-conflict priority areas across all of the stakeholder groups
- Invite all stakeholders to submit research on preferred practices for dual-use. Compile into digestible format.
- Create web portal to provide public access to least conflict priority maps, preferred practices, and final report on the overall process.
- Outreach to permitting agencies and solar industry developers to ensure output is utilized to inform project development and permitting process.

Draft Budget and Resource Needs: WSU-EP should maintain the flexibility to determine the most cost-effective way to achieve the above goals. WSU-EP may need to commit significant staff time to facilitating the least conflict process, or they may contract with a qualified outside vendor. Compiling resources on best practices may draw on existing research expertise at WSU-EP, which may require additional financial support.

Data resulting from this project should be publicly accessible, serving as a resource for solar PV developers and permitting agencies. Creating and maintaining this new web portal may require significant staff time and the requisite funding necessary.

Proposed Budget

Mapping Project, including stakeholder facilitation: \$300,000
Compiling research on preferred practices for dual-use: \$60,000 (.5 FTE)
Creation of web portal, publication of summary report: \$140,000