

Agricultural Land Use & Solar Development



Compatibility of Solar and Agriculture

Solar development and agriculture coexist to create both economic and environmental benefits for the surrounding community. Recent studies from North Carolina State University and the National Renewable Energy Lab demonstrate:

During solar farms' operations, soils rest and rebuild while deep-rooted plants add organic matter and a fertile top soil.¹

A diverse mix of plants have stronger hydrologic performance standards than turf-grasses and other monocropping practices. With pollinator habitats, storm water runoff can decrease 8–23%, depending on storm severity and amount of rainfall.²

Studies show it is beneficial for agricultural land to lie fallow, allowing the natural biological process to rejuvenate the soil for future generations.¹

Application of herbicides on solar facilities does not result in higher rates of herbicide application than in conventional agriculture, and is often less per acre than commercial agriculture operations.³

¹D.C. Neilson and F.J. Calderon, "Fallow Effects on Soil," Publications from USDA-ARS/UNL Faculty, 2011.

²Davis, Rob. "Soil, Crop, & Storm Water Benefits of Solar Sites." Agriculture, Fresh Energy, 22 Mar. 2016, <https://freshenergy.org/soil-crop-storm-water-benefits-of-solar-sites/>

³North Carolina Clean Energy Technology Center. Health and Safety Impacts of Solar Photovoltaics. May 2017. Accessed June 2017. https://nccleantech.ncsu.edu/wp-content/uploads/Health-and-Safety-Impacts-of-SolarPhotovoltaics-2017_white-paper.pdf

Cypress Creek's Commitment

Cypress Creek Renewables works with local soil and farming experts on a variety of ways to integrate solar into existing farms. We also work to integrate agriculture into new solar farms by planting cover crops inside project areas, planting pollinator gardens, developing bee colonies onsite to help pollinate area crops, and raising grazing sheep on select sites.

Low Profile

Due to their low profile and simplicity, solar projects can be incorporated into existing farms without negatively impacting farming operations or crop yields.

Vegetation Management

No neonicotinoid insecticides are used on the vegetation in our solar facilities, in order to preserve more sustainable natural landscapes.

Siting

Through responsible siting, we work to avoid environmentally sensitive areas, including wetlands and wildlife, whenever possible.

Landowner Benefit and Support

As a good neighbor, Cypress Creek Renewables works with landowners to provide opportunities for income generation to ensure the financial health of the farm.

“Overall, solar energy fits well with agriculture; farmers have land and often high energy needs, and solar represents the spirit of independence and self-reliance that characterizes agriculture and agriculture’s connection to the environment.”

– The U.S. Department of Agriculture

Decommissioning

Once a solar farm reaches the end of its life, all of the equipment will be removed. The land is then reseeded with a local seed mix and can be repurposed for agriculture or other uses.

Pollinator Habitat

Our Solar + Pollinator Program is intended to benefit the environment and local farmers by increasing the habitat for pollinators, such as honey bees, needed for the success of numerous crops, to produce fruits and seeds as we generate clean solar power.



“The National Farmers’ Union strongly endorses land-based renewable energy which supports profitable agriculture under current market conditions and policy framework—for example, where farmers own their own renewable energy assets or otherwise benefit from harnessing renewable natural energy resources.”

– The National Farmers Union