



Farm Service Agency and Climate Change



The Farm Service Agency is addressing climate change through the Conservation Reserve Program (CRP), Conservation Reserve Enhancement Program (CREP), and the Biomass Crop Assistance Program (BCAP). As the nation's largest private lands conservation program, CRP offers participants the opportunity to reduce atmospheric greenhouse gas (GHG) concentrations while achieving other environmental benefits.

The Farm Service Agency strategy includes:

GHG Benefits of CRP

Shifting cropland into long-term grasses, trees, or restored wetlands increases the carbon stored in soils and biomass. Taking cropland out of production also reduces nitrous oxide emissions related to fertilizer use and reduces field operations, lowering carbon dioxide emissions from fossil fuel combustion and tillage.

Estimates for 2011, with enrollment including about 31.1 million acres of grass cover, trees, and wetlands, show CRP acres sequestering 43.8 Tg of carbon dioxide per year. Taking into consideration nitrous oxide and carbon dioxide emission reductions discussed above, CRP acreage currently reduces atmospheric GHG concentrations by approximately 51.1 Tg per year.

Facilitating CRP Enrollment

In the past, GHG benefits of CRP were real but were not a factor considered in enrollment decisions. In recent years, FSA has made two changes to explicitly consider GHG benefits:

- For competitive contracts, the maximum possible environmental benefits index (EBI) score for the air quality factor was increased by 10 points. The additional points are available for offers that include high carbon sequestration benefits.
- FSA codified that contract holders may sell carbon sequestration or other environmental credits associated with land enrolled in CRP.

Negotiating Federal-State CREP Partnerships

The impacts of future climate change are difficult to predict. However, most models predict that in the western U.S. temperature, precipitation amount, and distribution and duration of precipitation events are likely to fluctuate more widely, exacerbating competition for available water. Since 2005, FSA has negotiated four CREP agreements whose main objective is conserving agricultural irrigation water. Agreements with the governors of Kansas, Colorado, Idaho, and Nebraska would remove a total of 255,000 acres from irrigated crop production. Incentives from State and local water use authorities pay to retire the water from irrigation, in three States for the duration of the CREP contract and, in the other, permanently.

BCAP Helps Landowners and Operators Provide Biomass

Authorized by the 2008 Farm Bill, BCAP supports establishment and production of eligible crops for conversion to bioenergy and assists landowners and operators with the cost of collection, harvest, storage, and transportation of eligible material. Program outlays were \$14 million in FY 2009 and \$223 million in FY 2010. In FY 2011, BCAP provided an investment of approximately \$55 million in obligations to nine project areas encompassing 168 counties in 10 States. The investment supports crop production on approximately 50,000 acres of hybrid poplar, warm season grasses, camelina and miscanthus giganteus. These crops are being established for conversion to advanced biofuels, fuel pellets, renewable jet fuel drop-ins, and biobased products.