

Saves Energy, Improves Soil Quality, Saves Money

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The Energy Conservation System offers payments to agriculture producers for applying a combination of conservation activities that will:

- **Save energy and money,**
- **Sequester carbon,**
- **Lessen greenhouse gases, and**
- **Protect natural resources on the farm.**

The system includes **no-till, nutrient management, cover crops, and buffers**. When these activities are implemented on the same acres in successive years, producers can cut input costs, maintain production, reduce dependence on fossil fuels, protect natural resources, and improve soil quality to encourage a **sustainable and profitable cropping system**.

Saving Energy

The combination of these activities, implemented as a system, captures and sequesters carbon and other nutrients while reducing the fuel and nutrient inputs in a row crop production system. Energy consumption is reduced through fewer tillage passes and related nutrient inputs.

Carbon Sequestration

This system of activities works together to capture and sequester carbon and other nutrients. Conservation buffers—when strategically placed in areas along water bodies, fence rows, woodlands and erosive areas—provide increased carbon sequestration while reducing input costs on traditionally low producing or sensitive acres, and provide additional wildlife habitat.

Improving Soil Quality

Soil quality is improved when the combination of activities work in conjunction to improve soil structure, provide additional soil organic matter, increase biological activity, enhance nutrient cycling and reduce erosion.

Aligns with President, Secretary of Agriculture, and NRCS Strategic Goals

1) Meets the **President's plan on Energy and the Environment**, including:

- Reduced dependence on foreign oil
- Support a cap-and-trade program to reduce greenhouse gas emissions

2) Meets the **Secretary of Agriculture's goals** for:

- Energy
- Carbon Sequestration
- Climate Change

On a 200-acre farm, the Energy System can:

- Save 200 gallons diesel fuel,
- Save 6,600 pounds nitrogen,
- Save 124 tons CO₂ per year (34 tons of Carbon), and
- Stimulate innovative ag technology.

3) Meets the NRCS **Strategic Plan's Venture Goal: An Adequate Energy Supply**

- Outcomes: Agricultural activities conserve energy and ag lands are a source of environmentally sustainable biofuels and renewable energy.

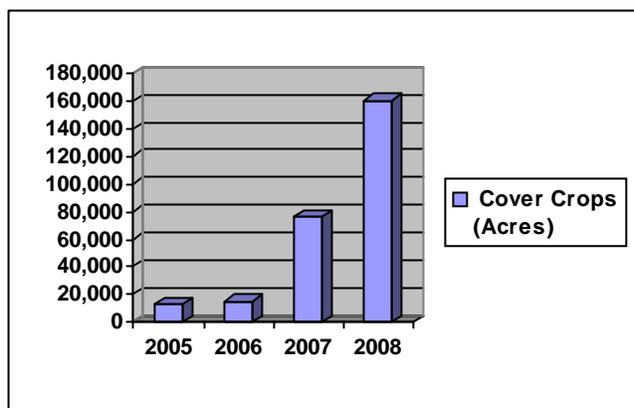
Successes in Indiana

Indiana's Energy Conservation System reimburses producers for additional costs that occur while transitioning to the system approach.

In Indiana, cover crops have traditionally been the most limiting component of the Energy Conservation System. Indiana initially offered this payment in 2007, and the results have been significant as measured by the acres of cover crops—after the payment was offered, the acres of cover crops increased significantly each year compared to prior years.

Successes

Indiana implemented the Energy Conservation System in FY 2007. The amount of Cover Crop acres adopted shot up dramatically after the systems approach was adopted. In FY 2005, 13,013 acres were adopted; in FY 2006, 14,711 acres were adopted; in FY 2007, acreage climbed to 76,029 acres; and in FY 2008, acres of cover crops hit 160,331.



Systems Approach and Payment Guidelines

The Energy Conservation System utilizes Practice code 370, Atmospheric Resource Quality Management. The payment schedule is approximately \$20 per acre for up to three years.

The Energy Conservation System requires a producer to implement no-till, nutrient management, cover crops and buffers as a system. Below are the guidelines for utilizing the system incentive.

- Available if at least one of the four activities is currently not installed on the offered acres.
- Buffers must be adjacent to all water bodies and must be at least two percent of the enrolled acres. Buffers are prioritized as follows: 1) water bodies (**required**), 2) sensitive areas, 3) treating resource concerns where they exist in each field, 4) between land use changes, and 5) low yielding areas.
- This payment is limited to 1,000 acres per applicant per year and is in addition to any other eligible payments.
- Cover crops must be installed on all enrolled acres each year to receive the payment, and may not be harvested for grain or forage.
- CRP, GRP and WRP acres are eligible to meet the buffer requirement, but cannot be included in the acres for the payment.
- Acres under CSP contracts are not eligible for this payment.
- Participants are required to analyze their operations through the NRCS national Energy Calculators (Tillage and Nutrients) and COMET-VR prior to receiving payment.

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