

FACT SHEET - National Ethanol Industry

1. Economic Impact

The United States ethanol industry added \$57 billion to the Gross Domestic Product and \$12 billion in federal, state and local taxes in 2022. It also added \$35 billion in household income.

2. Employment

The nation's ethanol industry supports more than 420,000 jobs in all sectors of the economy.

3. Rural Economic Development

Each plant contributes to the local economy by providing jobs at above average wages and an additional market for locally grown corn. In 2022, a typical dry mill ethanol plant added approximately \$2.44 of additional value, or 34%, to every bushel of corn processed.

4. Production

In 2022, 15.4 billion gallons of ethanol was produced at 199 plants in 25 states. This is up to near pre-pandemic production levels.

5. Consumption

Ethanol is blended with nearly every gallon of the nation's gasoline supply. The ethanol used in 2022 accounts for more than 10% of the nation's motor fuel supply, up from less than 1% 20 years ago. In addition, 1.4 billion gallons (roughly 10% of production) was exported in 2022. Canada (32%), and South Korea (13%), EU (11%) and India (7%) are the top destinations for U.S. ethanol exports.

6. Corn Use

In 2022, the nation's ethanol industry used 5.3 billion bushels of corn worth a record \$38 billion. Around 35% of corn produced is used for ethanol and coproduct production, which includes 36.4 million metric tons of high-quality livestock feed.

7. Renewable Fuels Standard

The Renewable Fuels Standard (RFS) came to an important crossroad in 2022 with Congress including specific volume requirements for only the first 15 years. Moving forward EPA is given more discretion to "set" RFS volumes. In December 2022, EPA proposed the first RFS "set" rule for 2023 and beyond. The proposal leaves conventional renewable fuel volumes at 15 billion gallons for 2023 and increases it to 15.25 billion gallons for 2024 and 2025.

8. Reduced Gas Prices

Adding ethanol to gasoline decreased the price of fuel by \$0.77 per gallon on average between 2019 and 2022. This is equivalent to a savings of \$95.1 billion annually for U.S. consumers or an average annual savings of \$767 per U.S. household.

9. Environmental Benefits

Ethanol use reduces greenhouse gas (GHG) emissions by as much as 50%. In 2021, the use of ethanol reduced GHG emissions by 54.5 million metric tons, equivalent to taking 12 million cars off the road for an entire year.

10. Energy Security

The 15.4 billion gallons of ethanol used in the United States in 2022 displaced more than 600 million barrels of imported oil.

11. Co-Products

In 2022, the nation's ethanol industry produced 36.4 million metric tons (mmt) of distillers grains, gluten feed and gluten meal. These bio-products are valuable corn and soybean meal substitutes in rations used around the world to feed beef and dairy cows, pigs, chickens, turkeys, fish, and other animals.

Approximately 11.4 mmt were exported in 2022 to more than 50 countries with half the exports going to Southeast and East Asia and another 20% going to Mexico. Also produced 4.2 billion pounds of corn distillers oil, a poultry feed ingredient and major feedstock for biodiesel and renewable diesel. The industry also captured 2.8 million tons of CO₂, which was used for dry ice production, bottling, food processing, and other uses.

12. Increased Efficiency

One unit of energy invested in making ethanol yields up to 2.8 units of energy available to the consumer, on average. This is up from an average of 1.25 in 2006. Today, the top quarter of dry mill biorefineries average an energy balance of 3.2-3.4 and some achieve as high as 4.0.

13. Infrastructure

The USDA's Higher Blends Infrastructure Incentive Program (HBIIIP) and ethanol industry initiatives, such as Prime the Pump, made E15 available at more than 3,000 stations across the nation, and more than 96% of vehicles on the road today are approved for E15.