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Biofuels Incentives: A Summary of Federal Programs

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Summary

With recent high energy prices, the passage of major energy legislation in 2005 (P.L. 109-58) and 2007 (P.L. 110-140), and the passage of a new farm bill in 2008 (P.L. 110-246), there is ongoing congressional interest in promoting alternatives to petroleum fuels. Biofuels—transportation fuels produced from plants and other organic materials—are of particular interest.

Ethanol and biodiesel, the two most widely used biofuels, receive significant government support under federal law in the form of mandated fuel use, tax incentives, loan and grant programs, and certain regulatory requirements. The 22 programs and provisions listed in this report have been established over the past three decades, and are administered by five separate agencies and departments: Environmental Protection Agency, U.S. Department of Agriculture, Department of Energy, Internal Revenue Service, and Customs and Border Protection. These programs target a variety of beneficiaries, including farmers and rural small businesses, biofuel producers, petroleum suppliers, and fuel marketers. Arguably, in prior years the most significant federal programs for biofuels have been tax credits for the production or sale of ethanol and biodiesel. However, with the establishment of the renewable fuel standard (RFS) under P.L. 109-58, Congress has mandated biofuels use; P.L. 110-140 significantly expanded that mandate. In the long term, the mandate may prove even more significant than tax incentives in promoting the use of these fuels.

The 2008 farm bill—The Food, Conservation, and Energy Act of 2008—amended or established various biofuels incentives, including lowering the value of the ethanol excise tax credit, establishing a tax credit for cellulosic biofuel production, extending import duties on fuel ethanol, and establishing several new grant and loan programs.

Some key biofuels incentives have expired or are set to expire (e.g., tax credits for biodiesel, renewable diesel, and ethanol), and there is congressional interest in extending these credits.

This report outlines federal programs that provide direct or indirect incentives for biofuels. For each program described, the report provides details including administering agency, authorizing statute(s), annual funding, and expiration date. The **Appendix** provides summary information in a table format.

Contents

Introduction 1
Environmental Protection Agency (EPA)—Renewable Fuel Standard 1
Internal Revenue Service (IRS) 2
- Volumetric Ethanol Excise Tax Credit 2
- Small Ethanol Producer Credit 2
- Biodiesel Tax Credit 3
- Small Agri-Biodiesel Producer Credit 3
- Renewable Diesel Tax Credit 3
- Credit for Production of Cellulosic Biofuel 4
- Special Depreciation Allowance for Cellulosic Biofuel Plant Property 4
- Alternative Fuel Station Credit 5

Department of Agriculture (USDA) 5
- Biorefinery Assistance 5
- Repowering Assistance 6
- Bioenergy Program for Advanced Biofuels 6
- Feedstock Flexibility Program for Producers of Biofuels (Sugar) 7
- Biomass Crop Assistance Program (BCAP) 7
- Rural Energy for America Program (REAP) 7
- Biomass Research and Development 8
- Other USDA Programs 8

Department of Energy (DOE) 9
- Biorefinery Project Grants 9
- Loan Guarantees for Ethanol and Commercial Byproducts from Cellulose, Municipal Solid Waste, and Sugar Cane 9
- DOE Loan Guarantee Program 10
- Cellulosic Ethanol Reserve Auction 10

U.S. Customs and Border Protection—Import Duty for Fuel Ethanol 11
Department of Transportation—Manufacturing Incentive for Flexible Fuel Vehicles 11

Tables

Table A-1. Federal Biofuels Incentives by Agency 12

Appendixes

Appendix. Summary of Federal Incentives Promoting Biofuels 12

Contacts

Author Contact Information 15

Introduction

With recent high energy prices, the passage of the Energy Policy Act of 2005 (P.L. 109-58) and the Energy Independence and Security Act of 2007 (P.L. 110-140), and the passage of the 2008 farm bill (P.L. 110-246), there is ongoing congressional interest in promoting greater use of alternatives to petroleum fuels. Biofuels—transportation fuels produced from plants and other organic materials—are of particular interest. Ethanol and biodiesel, the two most widely used biofuels, receive significant federal support in the form of tax incentives, loan and grant programs, and regulatory programs. The 2008 farm bill also modified existing incentives—including ethanol tax credits and import duties—and established a new tax credit for cellulosic biofuels. The farm bill also authorized new biofuels loan and grant programs, some of which were funded in the FY2010 appropriations cycle.

This report outlines 22 current, expired, or pending federal programs that provide direct or indirect incentives for biofuels. The programs are grouped below by administering agency. The incentives for biofuels are summarized in the **Appendix**. This information is compiled from authorizing statutes, committee reports, and Administration budget request documents.

Environmental Protection Agency (EPA)—Renewable Fuel Standard

- Administered by: EPA
- Established: 2005 by the Energy Policy Act of 2005, §1501 (P.L. 109-58); expanded by the Energy Independence and Security Act of 2007, §202 (P.L. 110-140)
- Scheduled termination: None
- Description: The Energy Policy Act of 2005 established a renewable fuel standard (RFS) for automotive fuels. The RFS was expanded by the Energy Independence and Security Act of 2007. The RFS requires the blending of renewable fuels (including ethanol and biodiesel) in transportation fuel. In 2008, fuel suppliers were required to blend 9.0 billion gallons of renewable fuel into gasoline and diesel fuel; this requirement increases annually to 36 billion gallons in 2022. The expanded RFS also specifically mandates the use of "advanced biofuels"—fuels produced from non-corn feedstocks and with 50% lower lifecycle greenhouse gas emissions than petroleum fuel—starting in 2009. Of the 36 billion gallons required in 2022, at least 21 billion gallons must be advanced biofuel. There are also specific quotas for cellulosic biofuels and for biomass-based diesel fuel. On May 1, 2007, EPA issued a final rule on the original RFS program detailing compliance standards for fuel suppliers, as well as a system to trade renewable fuel credits between suppliers. On March 26, 2010, EPA issued final rules for the expanded program (RFS2), including lifecycle analysis methods necessary to categorize fuels as advanced biofuels, and new rules for credit verification and trading. While this program is not a direct subsidy for the construction of biofuels plants, the guaranteed market created by the renewable fuel standard is expected to stimulate growth of the biofuels industry.

- For more information: EPA Website, Renewable Fuel Standard (RFS) http://www.epa.gov/otaq/fuels/renewablefuels/index.htm

Internal Revenue Service (IRS)

Various tax credits and other incentives are available for the production, blending, and/or sale of biofuels and biofuel blends. Tax credits vary by the type of fuel and the size of the producer. Before the enactment of the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), some of the credits allowed taxpayers to blend biofuels produced outside the United States with conventional fuels, export the blended fuel, and claim the tax credit. Section 203 of P.L. 110-343 effectively eliminated this so-called "splash-and-dash" practice by requiring that any fuel eligible for the credit must be produced and/or used within the United States.

Volumetric Ethanol Excise Tax Credit

- Administered by: Internal Revenue Service
- Established: 2005 by the American Jobs Creation Act of 2004, §301 (P.L. 108-357); modified by the Food, Conservation, and Energy Act of 2008, §15331 (P.L. 110-246); further amended by the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), §203
- Scheduled termination: December 31, 2010
- Description: Gasoline suppliers who blend ethanol with gasoline are eligible for a tax credit of 45 cents per gallon of ethanol.
- Qualified applicant: Blenders of gasohol (i.e., gasoline suppliers and marketers)
- For more information: IRS Publication 510, Chapter 2: Fuel Tax Credits and Refunds http://www.irs.gov/publications/p510/ch02.html

Small Ethanol Producer Credit

- Administered by: Internal Revenue Service
- Established:1990 by the Omnibus Budget Reconciliation Act of 1990, §11502 (P.L. 101-508); extended by the American Jobs Creation Act of 2004, §301 (P.L. 108-357); expanded by the Energy Policy Act of 2005, §1347 (P.L. 109-58); amended by the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), §203
- Scheduled termination: December 31, 2010
- Description: The small ethanol producer credit is valued at 10 cents per gallon of ethanol produced. The credit may be claimed on the first 15 million gallons of ethanol produced by a small producer in a given year.
- Qualified applicant: Any ethanol producer with production capacity below 60 million gallons per year
- For more information: IRS Publication 510, Chapter 2: Fuel Tax Credits and Refunds http://www.irs.gov/publications/p510/ch02.html

Biodiesel Tax Credit

- Administered by: Internal Revenue Service
- Established: 2005 by the American Jobs Creation Act of 2004, §302 (P.L. 108-357); extended by the Energy Policy Act of 2005, §1344 (P.L. 109-58); amended by the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), §202-203
- Scheduled termination: December 31, 2009—Expired
- Description: Biodiesel producers (or producers of diesel/biodiesel blends) can claim a per-gallon tax credit. The credit is valued at $1.00 per gallon. Before amendment by P.L. 110-343, the credit was valued at $1.00 per gallon of "agri-biodiesel" (biodiesel produced from virgin agricultural products such as soybean oil or animal fats), or 50 cents per gallon of biodiesel produced from previously used agricultural products (e.g., recycled fryer grease).
- Qualified applicant: Biodiesel producers and blenders
- For more information: IRS Publication 510, Chapter 2: Fuel Tax Credits and Refunds http://www.irs.gov/publications/p510/ch02.html

Small Agri-Biodiesel Producer Credit

- Administered by: Internal Revenue Service
- Established: 2005 by the Energy Policy Act of 2005, §1345 (P.L. 109-58); amended by the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), §202-203
- Scheduled termination: December 31, 2009—Expired
- Description: The small agri-biodiesel producer credit is valued at 10 cents per gallon of "agri-biodiesel" (see Biodiesel Tax Credit, above) produced. The credit may be claimed on the first 15 million gallons of ethanol produced by a small producer in a given year.
- Qualified applicant: Any agri-biodiesel producer with production capacity below 60 million gallons per year
- For more information: IRS Publication 510, Chapter 2: Fuel Tax Credits and Refunds http://www.irs.gov/publications/p510/ch02.html

Renewable Diesel Tax Credit

- Administered by: Internal Revenue Service
- Established: 2005 by the Energy Policy Act of 2005, §1346 (P.L. 109-58); amended by the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), §202-203
- Scheduled termination: December 31, 2009—Expired
- Description: Producers of biomass-based diesel fuel (or producers of diesel/renewable biodiesel blends) can claim $1.00 per gallon tax credit.

Renewable diesel is similar to biodiesel, but it is produced through different processes and thus is ineligible for the (above) biodiesel credits.

- Qualified applicant: Renewable diesel producers and blenders
- For more information: IRS Publication 510, Chapter 2: Fuel Tax Credits and Refunds http://www.irs.gov/publications/p510/ch02.html

Credit for Production of Cellulosic Biofuel

- Administered by: Internal Revenue Service
- Established: January 1, 2009, by the Food, Conservation, and Energy Act of 2008, §15321 (P.L. 110-246)
- Scheduled termination: December 31, 2012
- Description: Producers of cellulosic biofuel can claim $1.01 per gallon tax credit. For producers of cellulosic ethanol, the value of the credit is reduced by the amount of the volumetric ethanol excise tax credit and the small ethanol producer credit (see above)—currently, the value is 46 cents per gallon. The credit applies to fuel produced after December 31, 2008.
- Qualified applicant: Cellulosic biofuel producers
- Note: The credit for cellulosic ethanol varies with other ethanol credits such that the total *combined* value of all credits is $1.01 per gallon. As the volumetric ethanol excise tax credit and/or the small ethanol producer credits decrease, the per-gallon credit for cellulosic ethanol production increases by the same amount.

Special Depreciation Allowance for Cellulosic Biofuel Plant Property

- Administered by: Internal Revenue Service
- Established: 2006 by the Tax Relief and Health Care Act of 2006, §209 (P.L. 109-432); amended by the Energy Improvement and Extension Act of 2008 (P.L. 110-343, Division B), §201
- Scheduled termination: December 31, 2012
- Description: A taxpayer may take a depreciation deduction of 50% of the adjusted basis of a new cellulosic biofuel plant in the year it is put in service. Any portion of the cost financed through tax-exempt bonds is exempted from the depreciation allowance. Before amendment by P.L. 110-343, the accelerated depreciation applied only to cellulosic ethanol plants that break down cellulose through enzymatic processes—the amended provision applies to all cellulosic biofuel plants.

- Qualified applicant: Any cellulosic ethanol plant acquired after December 20, 2006, and placed in service before January 1, 2013. Any plant that had a binding contract for acquisition before December 20, 2006, does not qualify.
- For more information: See Senate Finance Committee, Summary of House-Senate Agreement on Tax, Trade, Health, and Other Provisions, December 7, 2006.

Alternative Fuel Station Credit

- Administered by: Internal Revenue Service
- Established: 2005 by the Energy Policy Act of 2005 §1342 (P.L. 109-58); extended by the Energy Improvement and Extension Act of 2008, §207 (P.L. 110-343, Division B); expanded by the American Recovery and Reinvestment Act, §1123 (P.L. 111-5)
- Scheduled termination: December 31, 2010
- Description: A taxpayer may take a 50% credit for the installation of alternative fuel infrastructure, up to $50,000, including E85 (85% ethanol and 15% gasoline) infrastructure. Residential installations qualify for a $2,000 credit (biofuels pumps are not generally installed in residential applications)
- Qualified applicant: Individual or business that installs alternative fuel infrastructure

Department of Agriculture (USDA)

Biorefinery Assistance

- Administered by: Rural Business-Cooperative Service (RBS)
- Annual funding: $74 million in mandatory spending for FY2009, $245 million for FY2010; authorization of and additional $150 million annually for FY2009-FY2012
- FY2010 Appropriation: $245 million to guarantee $691 million in loans
- Established: 2008 by the Food, Conservation, and Energy Act of 2008, §9001 (P.L. 110-246)
- Scheduled termination: End of FY2012
- Description: Grants to biorefineries that use renewable biomass to reduce or eliminate fossil fuel use.
- Qualified applicant: Biorefineries in existence at the date of enactment.
- For more information: See RBS website—http://www.rurdev.usda.gov/rbs/busp/baplg9003.htm

Repowering Assistance

- Administered by: RBS
- Annual funding: $35 million in mandatory funding for FY2009, to remain available until expended, plus $15 million authorized annually for FY2009 through FY2012
- FY2010 Appropriation: None ($35 million in FY2009)
- Established: 2008 by the Food, Conservation, and Energy Act of 2008, §9001 (P.L. 110-246)
- Scheduled termination: End of FY2012
- Description: Grants to biorefineries that use renewable biomass to reduce or eliminate fossil fuel use. RBS issued a Notice of Funding Availability June 12, 2009—http://www.rurdev.usda.gov/rbs/busp/9004%20FR%20NOFA.pdf.
- Qualified applicant: Biorefineries in existence at the date of enactment.
- For more information: See RBS website—http://www.rurdev.usda.gov/rbs/busp/RepoweringAssistance.htm

Bioenergy Program for Advanced Biofuels

- Administered by: RBS
- Annual funding: Mandatory funding of $55 million for FY2009, $55 million for FY2010, $85 million for FY2011, and $105 million for FY2012, plus $25 million authorized annually for FY2009-FY2012
- FY2010 Appropriation: $55 million ($30 million in FY2009)
- Established: 2008 by the Food, Conservation, and Energy Act of 2008, §9001 (P.L. 110-246)
- Scheduled termination: End of FY2012
- Description: Provides payments to producers to support and expand production of advanced biofuels. RBS issued a Notice of Contract Proposal June 12, 2009—http://www.rurdev.usda.gov/rbs/busp/NOCP%20FR%209005.pdf
- Qualified applicant: Producer of advanced biofuels
- For more information: See RBS website—http://www.rurdev.usda.gov/rbs/busp/9005Biofuels.htm

Feedstock Flexibility Program for Producers of Biofuels (Sugar)

- Administered by: Commodity Credit Corporation (CCC)
- Annual funding: Such sums as necessary are authorized to be appropriated—no appropriation to date
- FY2010 Appropriation: None
- Established: 2008 by the Food, Conservation, and Energy Act of 2008, §9001 (P.L. 110-246)
- Scheduled termination: None
- Description: Authorizes the use of CCC funds to purchase surplus sugar, to ensure the sugar program operates at no-net-cost, to be resold as a biomass feedstock to produce bioenergy.
- Qualified applicant: Producer of biofuels using eligible sugar as a feedstock

Biomass Crop Assistance Program (BCAP)

- Administered by: Farm Service Agency (FSA)
- Annual funding: Commodity payment—depends on the number of applications
- Established: 2008 by the Food, Conservation, and Energy Act of 2008, §9001 (P.L. 110-246)
- Scheduled termination: End of FY2012
- Description: Dollar-for-dollar matching payments for collection, harvesting, storage, and transportation (CHST) of biomass to qualified biofuel production facilities (as well as bioenergy or biobased products), up to $45 per ton
- Qualified applicant: Person who delivers eligible biomass to a qualified facility
- For more information: See FSA website—http://www.fsa.usda.gov/FSA/webapp?area=home&subject=ener&topic=bcap

Rural Energy for America Program (REAP)

- Administered by: RBS
- Annual funding: $255 million total in mandatory spending from FY2009-FY2012; an additional authorization of $25 million annually for FY2009-FY2012
- FY2010 Appropriation: $99.4 million in discretionary and mandatory spending to cover $19.7 million in grants and $388 million in loans ($60 million in FY2009 to cover $30 million in grants and $300 million in loans)
- Established: 2008 by the Food, Conservation, and Energy Act of 2008, §9001 (P.L. 110-246)

- Scheduled termination: End of FY2012
- Description: This program replaced the Renewable Energy Systems and Energy Efficiency Improvements program in the 2002 farm bill. The program provides grants and loans for a variety of rural energy projects, including efficiency improvements and renewable energy projects. Although REAP is not exclusively aimed at biofuels projects, the program could be a significant source of loan funds for such projects.

Biomass Research and Development

- Administered by: National Institute of Food and Agriculture (NIFA)
- Annual funding: $118 million total mandatory spending for FY2009-FY2012; up to $35 million additional discretionary funding annually
- FY2010 Appropriation: $28 million ($20 million in FY2009)
- Established: FY2001 by the Biomass Research and Development Act of 2000, §307 (P.L. 106-224); program extended and mandatory appropriations provided by the Farm Security and Rural Investment Act of 2002, §9008 (P.L. 107-171); program extended and funding authorization expanded by the Energy Policy Act of 2005, §941 (P.L. 109-58); significantly modified by the Food, Conservation and Energy Act of 2008, §9008 (P.L. 110-246)
- Scheduled termination: End of FY2012
- Description: Grants are provided for biomass research, development, and demonstration projects. Eligible projects include ethanol and biodiesel demonstration plants.
- Qualified applicant: Wide range of possible applicants
- For more information: http://www.brdisolutions.com/default.aspx

Other USDA Programs

The following programs within the Rural Business Cooperative Service could possibly be used to assist biofuels producers indirectly:

- Business and Industry (B&I) Guaranteed Loans
- Rural Business Enterprise Grants (RBEG)
- Value-Added Grants
- Rural Economic Development Loan and Grant Programs

Department of Energy (DOE)

Biorefinery Project Grants

- Administered by: Office of Energy Efficiency and Renewable Energy
- Annual funding: Approximately $200 million appropriated annually for the biomass program—not all of this funding will go toward biorefinery project grants
- FY2010 Appropriation: $220 million for entire biomass program
- Established: FY2001 through funding authorized in various statutes
- Scheduled termination: None
- Description: This program provides funds for cooperative biomass research and development for the production of fuels, electric power, chemicals, and other products.
- Qualified applicant: Varies from year to year, depending on program goals in a given year
- For more information: http://www.eere.energy.gov/biomass/

Loan Guarantees for Ethanol and Commercial Byproducts from Cellulose, Municipal Solid Waste, and Sugar Cane

- Administered by: DOE
- Annual funding: Not specified
- FY2010 Appropriation: $0
- Established: 2005 by the Energy Policy Act of 2005, §§1510, 1511, and 1516 (P.L. 109-58)
- Scheduled termination: Varies, depending on specific program
- Description: The Energy Policy Act of 2005 authorizes several programs to provide loan guarantees for the construction of facilities that produce ethanol and other commercial products from cellulosic material, municipal solid waste, or sugar cane.
- Qualified applicant: Private lending institutions, to guarantee loans for the construction of biofuels plants

DOE Loan Guarantee Program

- Administered by: DOE
- Annual funding: $5.4 million for administrative expenses in FY2008; authority for $51 billion in loan guarantees for energy projects in FY2008, including $10 billion for renewable energy and energy efficiency; $6 billion additional FY2009 appropriation to cover $49 billion in loans to all projects (not just biofuels)
- FY2010 Appropriation: $43 million for administrative expenses—to be offset by loan application fees
- Established: 2005 by the Energy Policy Act of 2005, Title XVII (P.L. 109-58)
- Scheduled termination: Not specified
- Description: Title XVII of the Energy Policy Act of 2005 authorizes DOE to provide loan guarantees for energy projects that reduce air pollutant and greenhouse gas emissions, including biofuels projects.
- Qualified applicant: Private lending institutions, to guarantee loans for clean energy projects.
- For more information: http://www.lgprogram.energy.gov/

Cellulosic Ethanol Reserve Auction

- Administered by: DOE
- Annual funding: $1 billion total authorized for all fiscal years; not more than $100 million may be paid in any given year
- FY2010 Appropriation: None; $5 million in FY2008 for administrative expenses
- Established: 2005 by the Energy Policy Act of 2005, §942 (P.L. 109-58)
- Scheduled termination: Not specified
- Description: Section 942 of the Energy Policy Act of 2005 authorizes DOE to provide per-gallon incentive payments for cellulosic biofuels until annual U.S. production reaches 1 billion gallons or 2015, whichever is earlier. DOE finalized regulations on October 15, 2009. http://www.epa.gov/fedrgstr/EPA-IMPACT/2009/October/Day-15/i24778.htm.
- Qualified applicant: Any U.S. cellulosic biofuel production facility that meets applicable requirements.

U.S. Customs and Border Protection—Import Duty for Fuel Ethanol

- Administered by: U.S. Customs and Border Protection
- Annual funding: N/A
- Established: 1980 by the Omnibus Reconciliation Act of 1980 (P.L. 96-499); amended by the Tax Reform Act of 1986, §423 (P.L. 99-514) extended by the Tax Relief and Health Care Act of 2006, §302 (P.L. 109-432); further extended by the Food, Conservation, and Energy Act of 2008, §15333 (P.L. 110-246)
- Scheduled termination: December 31, 2010
- Description: A 2.5% ad valorem tariff and a most-favored-nation duty of $0.54 per gallon of ethanol (for fuel use) applies to imports into the United States from most countries; most ethanol from Caribbean Basin Initiative (CBI) countries may be imported duty-free.
- Covered Entities: Fuel ethanol importers
- For more information: CRS Report RS21930, *Ethanol Imports and the Caribbean Basin Initiative (CBI)*, by Brent D. Yacobucci; Senate Finance Committee, Summary of House-Senate Agreement on Tax, Trade, Health, and Other Provisions, December 7, 2006.

Department of Transportation—Manufacturing Incentive for Flexible Fuel Vehicles

- Administered by: National Highway Traffic Safety Administration
- Annual funding: N/A
- Established: 1975 by the Energy Policy and Conservation Act of 1975 (P.L. 94-163); amended by various statutes, most recently the Energy Independence and Security Act of 2007, §109 (P.L. 110-140)
- Scheduled termination: After model year 2019
- Description: Automakers are required to meet Corporate Average Fuel Economy (CAFE) standards for their passenger cars and light trucks. Manufacturers may gain credits for the sale of alternative fuel vehicles, including ethanol/gasoline flexible fuel vehicles (FFVs). However, the credits are limited—the maximum fuel economy increase allowed through the use of these credits is 1.2 miles per gallon through model year (MY) 2014. The credits are phased out after MY2014 and are completely eliminated after MY2019.

Appendix. Summary of Federal Incentives Promoting Biofuels

Table A-1. Federal Biofuels Incentives by Agency

Administering Agency	Program	Description	Original Authorizing Legislation	FY2010 Appropriation	Expiration Date
Environmental Protection Agency	Renewable Fuel Standard	Mandated use of renewable fuel in gasoline: 4.0 billion gallons in 2006, increasing to 36 billion gallons in 2022	P.L. 109-58 §1501	N/A	None
Internal Revenue Service	Volumetric Ethanol Excise Tax Credit	Gasoline suppliers who blend ethanol with gasoline are eligible for a tax credit of 45 cents per gallon of ethanol	P.L. 108-357 §301	N/A	End of 2010
	Small Ethanol Producer Credit	An ethanol producer with less than 60 million gallons per year in production capacity may claim a credit of 10 cents per gallon on the first 15 million gallons produced in a year	P.L. 101-508	N/A	End of 2010
	Biodiesel Tax Credit	Producers of biodiesel or diesel/biodiesel blends may claim a tax credit of $1.00 per gallon of biodiesel.	P.L. 108-357	N/A	End of 2009 – Expired
	Small Agri-Biodiesel Producer Credit	An agri-biodiesel (produced from virgin agricultural products) producer with less than 60 million gallons per year in production capacity may claim a credit of 10 cents per gallon on the first 15 million gallons produced in a year	P.L. 109-58	N/A	End of 2009 – Expired
	Renewable Diesel Tax Credit	Producers of renewable diesel (similar to biodiesel, but produced through a different process) may claim a tax credit of $1.00 per gallon of renewable diesel	P.L. 109-58	N/A	End of 2009 – Expired

Administering Agency	Program	Description	Original Authorizing Legislation	FY2010 Appropriation	Expiration Date
	Credit for Production of Cellulosic Biofuel	Producers of cellulosic biofuel may claim a tax credit of $1.01 per gallon. For cellulosic ethanol producers, the value of the production tax credit is reduced by the value of the volumetric ethanol excise tax credit and the small ethanol producer credit—the credit is currently valued at 46 cents per gallon. The credit applies to fuel produced after December 31, 2008.	P.L. 110-246	N/A	End of 2012
	Special Depreciation Allowance for Cellulosic Biofuel Plant Property	Plants producing cellulosic biofuels may take a 50% depreciation allowance in the first year of operation, subject to certain restrictions	P.L. 109-432	N/A	End of 2012
	Alternative Fueling Station Credit	A credit of up to $50,000 is available for the installation of alternative fuel pumps, including E85 (85% ethanol and 15% gasoline)	P.L. 109-58 §1342	N/A	End of 2010
Department of Agriculture	Biorefinery Assistance	Loan guarantees and grants for the construction and retrofitting of biorefineries to produce advanced biofuels	P.L. 110-246 §9001	$245 million to guarantee $691 million in loans	End of FY2012
	Repowering Assistance	Grants to biorefineries that use renewable biomass to reduce or eliminate fossil fuel use	P.L. 110-246 §9001	$35 million in FY2009	End of FY2012
	Bioenergy Program for Advanced Biofuels	Provides payments to producers to support and expand production of advanced biofuels	P.L. 110-246 §9001	$55 million	End of FY2012
	Feedstock Flexibility Program for Producers of Biofuels (Sugar)	Authorizes the use of CCC funds to purchase surplus sugar, to be resold as a biomass feedstock to produce bioenergy	P.L. 110-246 §9001	No appropriation to date	None
	Biomass Crop Assistance Program (BCAP)	Provides financial assistance for biomass crop establishment costs and annual payments for biomass production; also provides payments to assist with costs for biomass collection, harvest, storage, and transportation	P.L. 110-246 §9001	Dollar-for dollar commodity payment	End of FY2012

Administering Agency	Program	Description	Original Authorizing Legislation	FY2010 Appropriation	Expiration Date
	Rural Energy for America Program (REAP)	Loan guarantees and grants for a wide range of rural energy projects, including biofuels.	P.L. 110-246 §9001	$99.4 million to cover $19.7 million in grants and $388 million in loan guarantees	End of FY2012
	Biomass Research and Development	Grants for biomass research, development, and demonstration projects	P.L. 106-224	$28 million	End of FY2015
Department of Energy	Biorefinery Project Grants	Funds cooperative R&D on biomass for fuels, power, chemicals, and other products	Various statutes	$220 million total for biomass program	None
	Loan Guarantees for Ethanol and Commercial Byproducts from Various Feedstocks	Several programs of loan guarantees to construct facilities that produce ethanol and other commercial products from cellulosic material, municipal solid waste, and/or sugarcane	P.L. 109-58 §§1510, 1511, and 1516	No appropriation to date	Varies
	DOE Loan Guarantee Program	Loan guarantees for energy projects that reduce air pollutant and greenhouse gas emissions, including biofuels projects	P.L. 109-58 Title XVII	$43 million FY2010 appropriation to be offset by loan fees Approximately $100 billion in loan authority from FY2008 and FY2009 appropriations; $10 billion in loan authority for renewable energy and energy efficiency	None
	Cellulosic Ethanol Reserve Auction	Authorizes DOE to provide per-gallon payments to cellulosic biofuel producers	P.L. 109-58 §942	No FY2010 appropriation $5 million in FY2008 for administrative expenses	August 8, 2015
U.S. Customs and Border Protection	Import Duty for Fuel Ethanol	All imported ethanol is subject to a 2.5% ad valorem tariff; fuel ethanol is also subject to a most-favored-nation added duty of 54 cents per gallon (with some exceptions)	P.L. 96-499	N/A	End of 2010

Administering Agency	Program	Description	Original Authorizing Legislation	FY2010 Appropriation	Expiration Date
Department of Transportation	Flexible Fuel Vehicle Production Incentive	Automakers subject to Corporate Average Fuel Economy (CAFE) standards may accrue credits under that program for the production and sale of alternative fuel vehicles, including ethanol/gasoline flexible fuel vehicles (FFVs)	P.L. 94-163	N/A	Incentive expires after model year 2019

Source: CRS.

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