

**Table 10.4 Biodiesel Overview, 2001-2011**

| Year              | Feedstock <sup>1</sup> | Losses and Co-products <sup>2</sup> | Production          |                  |                  | Trade           |              |                          | Stocks, End of Year | Stock Change <sup>4</sup> | Balancing Item <sup>5</sup> | Consumption        |                  |                  |
|-------------------|------------------------|-------------------------------------|---------------------|------------------|------------------|-----------------|--------------|--------------------------|---------------------|---------------------------|-----------------------------|--------------------|------------------|------------------|
|                   |                        |                                     |                     |                  |                  | Imports         | Exports      | Net Imports <sup>3</sup> |                     |                           |                             |                    |                  |                  |
|                   |                        |                                     | Trillion Btu        | Trillion Btu     | Thousand Barrels | Million Gallons | Trillion Btu | Thousand Barrels         | Thousand Barrels    | Thousand Barrels          | Thousand Barrels            | Thousand Barrels   | Thousand Barrels | Thousand Barrels |
| 2001              | 1                      | (s)                                 | 204                 | 9                | 1                | 78              | 39           | 39                       | NA                  | NA                        | NA                          | 243                | 10               | 1                |
| 2002              | 1                      | (s)                                 | 250                 | 10               | 1                | 191             | 56           | 135                      | NA                  | NA                        | NA                          | 385                | 16               | 2                |
| 2003              | 2                      | (s)                                 | 338                 | 14               | 2                | 94              | 110          | -16                      | NA                  | NA                        | NA                          | 322                | 14               | 2                |
| 2004              | 4                      | (s)                                 | 666                 | 28               | 4                | 97              | 124          | -26                      | NA                  | NA                        | NA                          | 640                | 27               | 3                |
| 2005              | 12                     | (s)                                 | 2,162               | 91               | 12               | 207             | 206          | 1                        | NA                  | NA                        | NA                          | 2,163              | 91               | 12               |
| 2006              | 32                     | (s)                                 | 5,963               | 250              | 32               | 1,069           | 828          | 242                      | NA                  | NA                        | NA                          | 6,204              | 261              | 33               |
| 2007              | 63                     | 1                                   | 11,662              | 490              | 62               | 3,342           | 6,477        | -3,135                   | NA                  | NA                        | NA                          | 8,528              | 358              | 46               |
| 2008              | 88                     | 1                                   | 16,145              | 678              | 87               | 7,502           | 16,128       | -8,626                   | NA                  | NA                        | NA                          | 7,519              | 316              | 40               |
| 2009              | <sup>R</sup> 67        | 1                                   | <sup>R</sup> 12,281 | <sup>R</sup> 516 | <sup>R</sup> 66  | 1,844           | 6,332        | -4,489                   | 711                 | 711                       | <sup>R</sup> 669            | <sup>R</sup> 7,750 | <sup>R</sup> 326 | <sup>R</sup> 42  |
| 2010              | <sup>R</sup> 44        | 1                                   | <sup>R</sup> 8,177  | <sup>R</sup> 343 | <sup>R</sup> 44  | 546             | 2,503        | -1,958                   | <sup>R</sup> 672    | <sup>R</sup> -39          | 0                           | <sup>R</sup> 6,258 | <sup>R</sup> 263 | <sup>R</sup> 34  |
| 2011 <sup>P</sup> | 125                    | 2                                   | 23,034              | 967              | 123              | 861             | 1,740        | -879                     | 1,902               | <sup>6</sup> 1,240        | 0                           | 20,915             | 878              | 112              |

<sup>1</sup> Total vegetable oil and other biomass inputs to the production of biodiesel.

<sup>2</sup> Losses and co-products from the production of biodiesel. Does not include natural gas, electricity, and other non-biomass energy used in the production of biodiesel—these are included in the industrial sector consumption statistics for the appropriate energy source.

<sup>3</sup> Net imports equal imports minus exports.

<sup>4</sup> A negative value indicates a decrease in stocks and a positive value indicates an increase.

<sup>5</sup> Beginning in 2009, because of incomplete data coverage and different data sources, "Balancing Item" is used to balance biodiesel supply and disposition.

<sup>6</sup> Derived from the preliminary 2010 stocks value (662 thousand barrels), not the final 2010 value (672 thousand barrels) that is shown under "Stocks."

R=Revised. P=Preliminary. NA=Not available. (s)=Less than 0.5 trillion Btu.

Notes: • Biodiesel data in thousand barrels are converted to million gallons by multiplying by 0.042, and are converted to Btu by multiplying by 5.359 million Btu per barrel (the approximate heat content of biodiesel—see Table A3). • Through 2000, data are not available. Beginning in 2001, data not from U.S. Energy Information Administration (EIA) surveys are estimates. • Totals may not equal sum of components due to independent rounding.

Web Pages: • See <http://www.eia.gov/totalenergy/data/monthly/#renewable> for updated monthly and annual data. • See <http://www.eia.gov/biofuels/biodiesel/production/> for related information.

Sources: **Feedstock:** Calculated as biodiesel production in thousand barrels multiplied by 5.433 million Btu per barrel (the biodiesel feedstock factor—see Table A3). **Losses and Co-products:** Calculated as biodiesel feedstock minus biodiesel production. **Production:** • 2001-2005—U.S. Department of Agriculture, Commodity Credit Corporation, Bioenergy Program records. Annual data are derived from quarterly data. • 2006—U.S. Department of Commerce, Bureau of the Census, "M311K - Fats and Oils:

Production, Consumption, and Stocks," data for soybean oil consumed in methyl esters (biodiesel). In addition, EIA estimates that 14.4 million gallons of yellow grease were consumed in methyl esters (biodiesel). • 2007—U.S. Department of Commerce, Bureau of the Census, "M311K - Fats and Oils: Production, Consumption, and Stocks," data for all fats and oils consumed in methyl esters (biodiesel). • 2008—EIA, *Monthly Biodiesel Production Report, December 2009* (release date October 2010), Table 11. • 2009 forward—EIA, *Monthly Biodiesel Production Report* (May 2012), Table 1. **Trade:** U.S. Department of Agriculture, imports data for Harmonized Tariff Schedule codes 3824.90.40.20, "Fatty Esters Animal/Vegetable/Mixture" (for data through June 2010), and 3824.90.40.30, "Biodiesel/Mixes" (for data beginning in July 2010); and exports data for Schedule B code 3824.90.40.00, "Fatty Substances Animal/Vegetable/Mixture" (for data through 2010), and 3824.90.40.30, "Biodiesel <70%" (for data for 2011). Although these categories include products other than biodiesel (such as those destined for soaps, cosmetics, and other items), biodiesel is the largest component. In the absence of other reliable data for biodiesel trade, EIA sees these data as good estimates. **Stocks and Stock Change:** • 2009 and 2010—EIA, *Petroleum Supply Annual*, annual reports, Table 1, data for renewable fuels except fuel ethanol. • 2011—EIA, *Petroleum Supply Monthly (PSM)*, monthly reports, Table 1, data for renewable fuels except fuel ethanol. **Balancing Item:** • 2009 forward—Calculated as biodiesel consumption and biodiesel stock change minus biodiesel production and biodiesel net imports. **Consumption:** • 2001-2008—Calculated as biodiesel production plus biodiesel net imports. • 2009—Calculated as the sum of the monthly consumption data. Data for January and February 2009 are from EIA, PSM, monthly reports, Table 1, refinery and blender net inputs of renewable fuels except fuel ethanol. Data for March-December 2009 are calculated as biodiesel production plus biodiesel net imports minus biodiesel stock change. • 2010 and 2011—Calculated as biodiesel production plus biodiesel net imports minus biodiesel stock change.