

**Table 10.3 Fuel Ethanol and Biodiesel Overview, 1981-2007**

Year	Fuel Ethanol											Biodiesel						
	Feed-stock <sup>1</sup>	Losses and Co-products <sup>2</sup>	Production			Net Imports <sup>3</sup>		Stocks <sup>4</sup>	Stock Change <sup>5</sup>		Consumption			Feed-stock <sup>6</sup>	Losses and Co-products <sup>7</sup>	Production <sup>8</sup>		
	TBtu	TBtu	Mbbl	MMgal	TBtu	Mbbl	TBtu	Mbbl	Mbbl	TBtu	Mbbl	MMgal	TBtu	TBtu	TBtu	Mbbl	MMgal	TBtu
1981	13	6	1,978	83	7	NA	NA	NA	NA	NA	1,978	83	7	NA	NA	NA	NA	NA
1982	35	16	5,369	225	19	NA	NA	NA	NA	NA	5,369	225	19	NA	NA	NA	NA	NA
1983	63	28	9,890	415	35	NA	NA	NA	NA	NA	9,890	415	35	NA	NA	NA	NA	NA
1984	77	34	12,150	510	43	NA	NA	NA	NA	NA	12,150	510	43	NA	NA	NA	NA	NA
1985	93	41	14,693	617	52	NA	NA	NA	NA	NA	14,693	617	52	NA	NA	NA	NA	NA
1986	107	47	16,954	712	60	NA	NA	NA	NA	NA	16,954	712	60	NA	NA	NA	NA	NA
1987	123	54	19,497	819	69	NA	NA	NA	NA	NA	19,497	819	69	NA	NA	NA	NA	NA
1988	124	54	19,780	831	70	NA	NA	NA	NA	NA	19,780	831	70	NA	NA	NA	NA	NA
1989	126	55	20,062	843	71	NA	NA	NA	NA	NA	20,062	843	71	NA	NA	NA	NA	NA
1990	111	48	17,802	748	63	NA	NA	NA	NA	NA	17,802	748	63	NA	NA	NA	NA	NA
1991	129	56	20,627	866	73	NA	NA	NA	NA	NA	20,627	866	73	NA	NA	NA	NA	NA
1992	146	63	23,453	985	83	NA	NA	1,791	NA	NA	23,453	985	83	NA	NA	NA	NA	NA
1993	171	74	27,484	1,154	97	244	1	2,114	323	1	27,405	1,151	97	NA	NA	NA	NA	NA
1994	190	82	30,689	1,289	109	279	1	2,393	279	1	30,689	1,289	109	NA	NA	NA	NA	NA
1995	200	86	32,325	1,358	114	387	1	2,186	-207	-1	32,919	1,383	117	NA	NA	NA	NA	NA
1996	143	61	23,178	973	82	313	1	2,065	-121	(s)	23,612	992	84	NA	NA	NA	NA	NA
1997	190	81	30,674	1,288	109	85	(s)	2,925	860	3	29,899	1,256	106	NA	NA	NA	NA	NA
1998	206	88	33,453	1,405	118	66	(s)	3,406	481	2	33,038	1,388	117	NA	NA	NA	NA	NA
1999	215	92	34,881	1,465	123	87	(s)	4,024	618	2	34,350	1,443	122	NA	NA	NA	NA	NA
2000	238	101	38,627	1,622	137	116	(s)	3,400	-624	-2	39,367	1,653	139	NA	NA	NA	NA	NA
2001	259	110	42,028	1,765	149	315	1	4,298	898	3	41,445	1,741	147	1	(s)	204	9	1
2002	313	133	50,956	2,140	180	306	1	6,200	1,902	7	49,360	2,073	175	1	(s)	250	10	1
2003	410	174	66,772	2,804	236	292	1	5,978	-222	-1	67,286	2,826	238	2	(s)	R338	14	2
2004	497	210	81,058	3,404	287	3,542	13	6,002	24	(s)	84,576	3,552	299	R4	(s)	666	28	R4
2005	570	241	92,961	3,904	329	3,234	11	5,563	-439	-2	96,634	4,059	342	R12	(s)	2,162	91	R12
2006	R712	R301	R116,294	4,884	R412	R17,408	R62	R8,760	R3,197	11	R130,505	5,481	R462	R32	R(s)	R5,963	250	R32
2007 <sup>P</sup>	924	378	154,416	6,485	546	10,348	37	10,509	1,749	6	163,002	6,846	577	64	1	11,691	491	63

<sup>1</sup> Total corn and other biomass inputs to the production of fuel ethanol.

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

<sup>3</sup> Fuel ethanol imports only. Data for fuel ethanol exports are not available.

<sup>4</sup> Stocks are at end of year.

<sup>5</sup> A negative number indicates a decrease in stocks and a positive number indicates an increase.

<sup>6</sup> Total vegetable oil and other biomass inputs to the production of biodiesel.

<sup>7</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>8</sup> Production of biofuels for use as diesel fuel substitutes or additives. Biodiesel consumption equals biodiesel production.

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

Notes: • Mbbl = thousand barrels. MMgal = million U.S. gallons. TBtu = trillion Btu. • Totals may not equal sum of components due to independent rounding.

Web Pages: For related information, see [http://www.eia.doe.gov/oil\\_gas/petroleum/data\\_publications/monthly\\_oxygenate\\_telephone\\_report/motr.html](http://www.eia.doe.gov/oil_gas/petroleum/data_publications/monthly_oxygenate_telephone_report/motr.html), [http://www.eia.doe.gov/oil\\_gas/petroleum/data\\_publications/petroleum\\_supply\\_monthly/psm.html](http://www.eia.doe.gov/oil_gas/petroleum/data_publications/petroleum_supply_monthly/psm.html), and <http://www.census.gov/cir/www/311/m311k.html>.

Sources: (Note: For production, net imports, stocks, stock change, and consumption, data in thousand barrels are converted to million gallons by multiplying by 0.042; and are converted to trillion Btu by multiplying by the approximate heat content of fuel ethanol or biodiesel—see Table A3.) **Fuel Ethanol Feedstock:** Calculated as fuel ethanol production in thousand barrels multiplied by the approximate heat content of fuel ethanol feedstock—see Table A3. **Fuel Ethanol Losses and Co-products:** Calculated as fuel ethanol feedstock minus fuel ethanol production. **Fuel Ethanol Production:** • 1981-1992—Fuel ethanol production is equal to fuel ethanol consumption—see sources for "Fuel Ethanol Consumption." • 1993-2004—Calculated as fuel ethanol consumption plus fuel ethanol stock change minus fuel ethanol

net imports. These data differ slightly from the original production data from Energy Information Administration (EIA), Form EIA-819, "Monthly Oxygenate Report," and predecessor form, which were not reconciled and updated to be consistent with the final balance. • 2005 forward—EIA, Form EIA-819, "Monthly Oxygenate Report." **Fuel Ethanol Net Imports, Stocks, and Stock Change:** • 1992-2006—EIA, *Petroleum Supply Annual (PSA)*, annual reports. • 2007—EIA, *Petroleum Supply Monthly (PSM)*, monthly reports. **Fuel Ethanol Consumption:** • 1981-1989—EIA, *Estimates of U.S. Biofuels Consumption 1990*, Table 10; and EIA, Office of Coal, Nuclear, Electric and Alternate Fuels (CNEAF), estimates. • 1990-1992—EIA, *Estimates of U.S. Biomass Energy Consumption 1992*, Table D2; and EIA, CNEAF, estimates. • 1993-2004—EIA, *PSA*, annual reports, Tables 2 and 16. Calculated as ten percent of oxygenated finished motor gasoline field production (Table 2), plus fuel ethanol refinery input (Table 16). • 2005 and 2006—EIA, *PSA*, annual reports, Tables 1 and 15. Calculated as motor gasoline blending components adjustments (Table 1), plus finished motor gasoline adjustments (Table 1), plus fuel ethanol refinery and blender net inputs (Table 15). • 2007—EIA, *PSM*, monthly reports, Tables 1 and 27. Calculated as motor gasoline blending components adjustments (Table 1), plus finished motor gasoline adjustments (Table 1), plus fuel ethanol refinery and blender net inputs (Table 27). **Biodiesel Feedstock:** Calculated as biodiesel production in thousand barrels multiplied by the approximate heat content of biodiesel feedstock—see Table A3. **Biodiesel Losses and Co-products:** Calculated as biodiesel feedstock minus biodiesel production. **Biodiesel 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," Table 3A, data for soybean oil consumed in methyl esters (biodiesel). In addition, EIA, Office of Integrated Analysis and Forecasting, estimates that 14.4 million gallons of yellow grease were consumed in methyl esters (biodiesel). EIA assumes that 7.65 pounds of vegetable oil are needed to make one gallon of biodiesel. • 2007—U.S. Department of Commerce, Bureau of the Census, "M311K - Fats and Oils: Production, Consumption, and Stocks," Table 3A, data for all fats and oils consumed in methyl esters (biodiesel). EIA assumes that 7.65 pounds of vegetable oil are needed to make one gallon of biodiesel.