

Table 16.3 World CO₂ Emissions from Fossil Fuel Consumption and Cemer Manufacturing, 1755-1995

Source: Carbon Dioxide Information Analysis Center

Year	Carbon dioxide emissions (million metric tons)						Total	Cumulative Total	Annual Per Capita Emissions (metric tons)
	Solid	Liquid	Gas	Cement Manufacturing	Gas Flaring	Gas			
1755	11	0	0	X	X	X	11	55	X
1760	11	0	0	X	X	X	11	110	X
1765	11	0	0	X	X	X	11	165	X
1770	11	0	0	X	X	X	11	220	X
1775	15	0	0	X	X	X	15	293	X
1780	15	0	0	X	X	X	15	366	X
1785	18	0	0	X	X	X	18	458	X
1790	18	0	0	X	X	X	18	550	X
1795	22	0	0	X	X	X	22	660	X
1800	29	0	0	X	X	X	29	788	X
1805	33	0	0	X	X	X	33	953	X
1810	37	0	0	X	X	X	37	1,136	X
1815	44	0	0	X	X	X	44	1,341	X
1820	51	0	0	X	X	X	51	1,594	X
1825	62	0	0	X	X	X	62	1,880	X
1830	88	0	0	X	X	X	88	2,228	X
1835	92	0	0	X	X	X	92	2,664	X
1840	121	0	0	X	X	X	121	3,221	X
1845	158	0	0	X	X	X	158	3,913	X
1850	198	0	0	X	X	X	198	4,793	X
1855	260	0	0	X	X	X	260	5,928	X
1860	333	0	0	X	X	X	333	7,412	X
1865	436	0	0	X	X	X	436	9,343	X
1870	535	4	0	X	X	X	539	11,820	X
1875	685	4	0	X	X	X	689	15,026	X
1880	854	11	0	X	X	X	865	18,789	X
1885	1,000	15	4	X	X	X	1,015	23,636	X
1890	1,264	29	11	X	X	X	1,304	29,448	X
1895	1,440	40	7	X	X	X	1,488	36,453	X
1900	1,887	59	11	X	X	X	1,960	45,126	X
1905	2,330	88	18	X	X	X	2,433	56,217	X
1910	2,851	191	26	X	X	X	3,067	70,459	X
1915	2,873	224	33	X	X	X	3,129	86,683	X
1920	3,089	311	44	X	X	X	3,444	103,482	X
1925	3,085	454	66	X	X	X	3,605	120,359	X
1930	3,158	634	110	37	X	X	3,935	140,111	X
1935	2,972	1,205	220	33	X	X	4,433	158,527	X
1940	3,726	1,572	304	40	X	X	5,643	184,391	X
1945	3,004	1,803	432	26	X	X	5,265	212,750	X
1950	3,920	1,550	355	66	73	73	5,961	243,348	2
1951	4,137	1,755	421	73	81	81	6,467	249,815	3
1952	4,100	1,847	454	81	84	84	6,570	256,385	3
1953	4,122	1,953	480	88	81	81	6,731	263,116	3
1954	4,089	2,041	506	99	77	77	6,811	269,927	3
1955	4,426	2,290	550	110	95	95	7,471	277,398	3
1956	4,664	2,488	590	117	110	110	7,969	285,367	3
1957	4,800	2,616	652	125	106	106	8,295	293,662	3
1958	4,895	2,682	703	132	95	95	8,508	302,170	3
1959	5,064	2,895	784	147	92	92	8,984	311,154	3
1960	5,170	3,114	861	158	88	88	9,391	320,545	3
1961	4,943	3,316	931	165	88	88	9,442	329,987	3
1962	4,950	3,594	1,015	180	84	84	9,823	339,810	3
1963	5,119	3,858	1,099	187	92	92	10,354	350,165	3
1964	5,258	4,170	1,202	209	114	114	10,952	361,117	3
1965	5,353	4,474	1,286	216	132	132	11,457	372,574	3
1966	5,415	4,855	1,392	231	143	143	12,036	384,610	4
1967	5,305	5,218	1,502	238	191	191	12,454	397,064	4
1968	5,305	5,687	1,630	256	205	205	13,084	410,148	4
1969	5,448	6,134	1,784	271	245	245	13,883	424,031	4
1970	5,701	6,734	1,891	286	278	278	14,890	438,922	4
1971	5,701	7,130	2,030	308	322	322	15,488	454,409	4
1972	5,760	7,530	2,136	326	344	344	16,103	470,513	4
1973	5,789	8,207	2,228	348	403	403	16,975	487,488	4
1974	5,778	8,222	2,264	352	392	392	17,005	504,492	4
1975	6,123	7,808	2,283	348	341	341	16,902	521,395	4
1976	6,258	8,475	2,371	377	399	399	17,880	539,275	4
1977	6,485	8,753	2,367	396	381	381	18,386	557,661	4
1978	6,544	8,731	2,470	425	392	392	18,562	576,223	4
1979	6,896	9,285	2,616	436	366	366	19,595	595,818	4
1980	7,101	8,819	2,660	440	326	326	19,342	615,160	4
1981	6,998	8,321	2,697	443	264	264	18,719	633,879	4
1982	7,229	7,973	2,678	443	253	253	18,573	652,452	4
1983	7,247	7,918	2,686	458	231	231	18,540	670,992	4
1984	7,584	8,006	2,898	469	213	213	19,166	690,158	4
1985	8,152	7,951	3,012	480	209	209	19,800	709,959	4
1986	8,376	8,350	3,078	502	198	198	20,504	730,462	4
1987	8,563	8,387	3,309	524	187	187	20,969	751,431	4
1988	8,797	8,764	3,477	557	194	194	21,790	773,221	4
1989	8,918	8,900	3,602	572	183	183	22,178	795,399	4
1990	8,698	9,153	3,737	575	220	220	22,383	817,783	4
1991	8,468	9,548	3,774	590	256	256	22,636	840,419	4
1992	8,563	9,149	3,734	619	227	227	22,292	862,711	4
1993	8,336	9,153	3,811	649	231	231	22,178	884,889	4
1994	8,922	9,310	3,898	689	234	234	23,054	907,943	4
1995	9,307	9,409	4,177	707	234	234	23,838	931,781	4

Note: Mass of carbon dioxide.

Table 16.3 World CO₂ Emissions from Fossil Fuel Consumption and Cement Manufacturing, 1755-1995

Source: Carbon Dioxide Information Analysis Center (CDIAC), Environmental Sciences Division, Oak Ridge National Laboratory, "Global CO₂ Emissions from Fossil-Fuel Burning, Cement Manufacture, and Gas Flaring: 1751--1995," prepared by Gregg Marland and Tom Boden (CDIAC), Bob Andres (University of Alaska-Fairbanks), and Cathy Johnston (University of Tennessee); and "1995 Estimates of CO₂ Emissions from Fossil Fuel Burning and Cement Manufacturing Based on the United Nations Energy Statistics and the U.S. Geological Survey Cement Manufacturing Data," ORNL/CDIAC-25, NDP-030 (an Internet-accessible numerical database), available at <http://cdiac.ESD.ORNL.GOV/ndps/ndp030r6.html> (Oak Ridge, Tennessee, September 1995).

For years after 1950, CDIAC calculates world emissions from data on the global production of fossil fuels (based on the World Energy Data Set maintained by the United Nations Statistical Division), and from data on world cement manufacturing (based on the Cement Manufacturing Data Set maintained by the U.S. Geological Survey). Emissions are calculated using global average fuel chemistry and usage. These data account for all fuels including "bunker fuels" not accounted for in the totals in Data Table AC.1, which are also shown separately. For further information, see the Technical Notes for Data Table AC.1.

For years prior to 1950, estimates are based on CDIAC's historical database of national emissions.