

## OFFSTREAM USE

### Total Water Use

402,000 million gallons per day

Total fresh and saline withdrawals during 1995 are estimated to have been 402,000 million gallons per day (Mgal/d) for all offstream water-use categories (public supply, domestic, commercial, irrigation, livestock, industrial, mining, thermoelectric power), which is nearly 2 percent less than the withdrawal estimate for 1990. Total freshwater withdrawals were an estimated 341,000 Mgal/d during 1995, which is about the same as during 1990. Per-capita use for all offstream uses in 1995 was 1,500 gallons per day (gal/d) of fresh- and saline water combined and 1,280 gal/d of freshwater, compared to 1990 when per-capita use was 1,620 gal/d of fresh- and saline water and 1,340 gal/d of freshwater (Solley and others, 1993).

Estimates of withdrawals by source indicate that during 1995, total surface-water withdrawals were 324,000 Mgal/d, which is about the same as during 1990. About 59,700 Mgal/d of surface water withdrawn was saline water. Total ground-water withdrawals were 77,500 Mgal/d, or 4 percent less than during 1990. About 99 percent of ground water withdrawn was freshwater.

A comparison of total withdrawals by water-resources region (figure 1; table 1) indicates that the California, South Atlantic-Gulf, and Mid-Atlantic regions account for one-third of the total water withdrawn in the United States. The largest amount of irrigation occurs in the California, Pacific Northwest, and Missouri regions; and the largest withdrawals (fresh and saline) for thermoelectric power occur in the Mid-Atlantic and South Atlantic-Gulf regions. A similar comparison of total withdrawals by State (figure 2; table 2) indicates that California accounts for the largest withdrawals, 45,900 Mgal/d, followed by Texas, Illinois, and Florida. Some 24 States and Puerto Rico had less water withdrawn for offstream uses during 1995 than during 1990.

The two largest water-use categories continue to be thermoelectric power and irrigation. During 1995, the most water (190,000 Mgal/d, of which 57,900 Mgal/d was saline) was withdrawn for thermoelectric power cooling, whereas the most freshwater (134,000 Mgal/d) was withdrawn for irrigation (tables 3, 4). California accounts for the largest irrigation withdrawals; whereas, Illinois accounts for the largest thermoelectric freshwater withdrawals (table 4).

Surface-water withdrawals by water-use category are shown by water-resources region in table 5 and by State in table 6. Ground-water withdrawals by water-use category are shown by water-resources region in table 7 and by State in table 8.

Total freshwater consumptive use was about 100,000 Mgal/d during 1995, or 6 percent more than during 1990. Freshwater consumptive use in the East (water-resource regions east of and including the Mississippi regions) is about 12 percent of freshwater withdrawn in the East and accounts for only 20 percent of Nation's consumptive use (figure 3; table 1). By comparison, freshwater consumptive use in the West is about 47 percent of freshwater withdrawals. The higher consumptive use in the West is attributable to the 90 percent of the water withdrawn for irrigation that occurs in the West and irrigation accounts for the largest part of consumptive use. California accounts for the largest consumptive use (figure 4) because it has the largest amount of irrigation.

The distribution of per-capita freshwater withdrawals by State is shown in figure 5 and table 2. High per-capita values are characteristic of thinly populated states having large acreages of irrigated land such as Idaho, Montana, and Wyoming. In contrast, figure 6 shows the intensity of freshwater withdrawals by State in million gallons per day per square mile. The smaller states in the northeast show the most intense withdrawals by area.



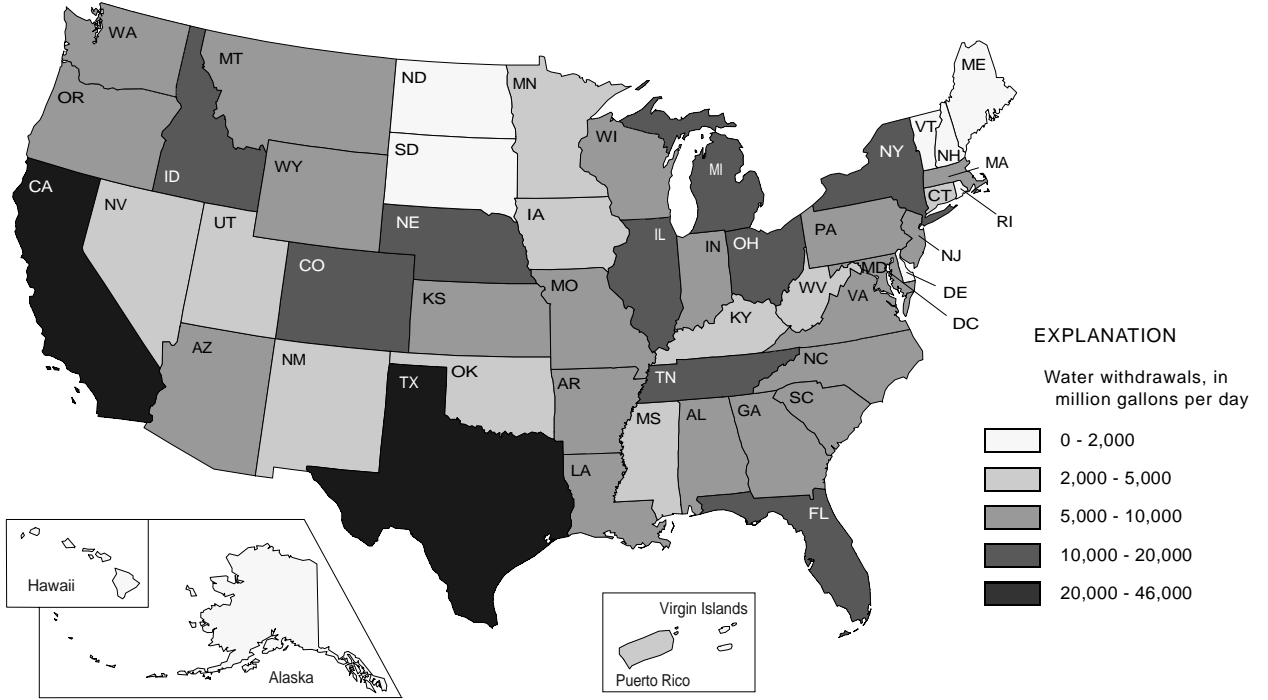
Figure 1. Total water withdrawals by water-resources region, 1995.

Table 1. Total offshore water use by water-resources region, 1995

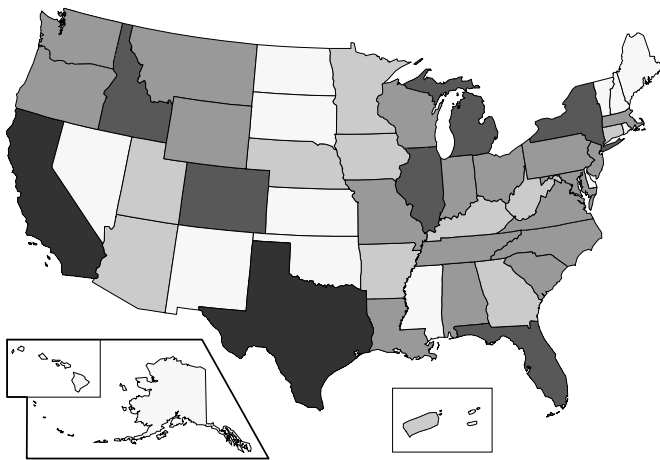
[Figures may not add to totals because of independent rounding. Mgal/d = million gallons per day; gal/d = gallons per day]

REGION	POPULATION, in thousands	PER CAPITA USE, fresh-water, in gal/d	WITHDRAWALS, in Mgal/d (includes irrigation conveyance losses)									RECLAIMED WASTE-WATER, in Mgal/d	CONVEYANCE LOSSES, in Mgal/d	CONSUMPTIVE USE, fresh-water, in Mgal/d			
			By source and type												Total	Total	Total
			Ground water			Surface water			Fresh	Saline	Total						
			Fresh	Saline	Total	Fresh	Saline	Total									
New England . . . . .	12,849	289	725	0	725	2,980	8,800	11,800	3,710	8,800	12,500	0	0	388			
Mid-Atlantic . . . . .	42,412	509	2,690	1.0	2,690	18,900	20,300	39,200	21,600	20,300	41,900	72	1.9	1,170			
South Atlantic-Gulf . . . . .	37,845	848	7,110	16	7,120	25,000	12,700	37,700	32,100	12,700	44,800	237	33	5,570			
Great Lakes . . . . .	21,836	1,500	1,510	4.6	1,520	31,100	6.5	31,100	32,700	11	32,700	0	.1	1,580			
Ohio . . . . .	22,631	1,330	1,980	22	2,000	28,100	.6	28,100	30,100	23	30,100	1.1	.7	1,870			
Tennessee . . . . .	4,198	2,140	258	0	258	8,730	0	8,730	8,980	0	8,980	.3	0	289			
Upper Mississippi . . . . .	22,268	1,050	2,570	4.2	2,570	20,700	0	20,700	23,300	4.2	23,300	11	0	1,660			
Lower Mississippi . . . . .	7,324	2,720	9,180	0	9,180	10,800	0	10,800	20,000	0	20,000	.7	553	7,740			
Souris-Red-Rainy . . . . .	693	364	115	0	115	138	0	138	253	0	253	0	1.8	122			
Missouri Basin . . . . .	10,664	3,380	9,320	38	9,360	26,700	0	26,700	36,000	38	36,100	22	7,840	14,200			
Arkansas-White-Red . . . . .	8,931	1,800	7,490	284	7,780	8,590	0	8,590	16,100	284	16,400	37	944	8,190			
Texas-Gulf . . . . .	16,755	1,050	5,960	324	6,280	11,700	4,860	16,600	17,700	5,190	22,900	71	390	7,340			
Rio Grande . . . . .	2,566	2,600	1,930	61	1,990	4,740	0	4,740	6,670	61	6,730	7.2	1,360	2,960			
Upper Colorado . . . . .	714	10,400	116	14	130	7,310	0	7,310	7,420	14	7,440	1.7	1,940	2,520			
Lower Colorado . . . . .	5,318	1,500	3,000	12	3,010	4,970	2.3	4,970	7,960	14	7,980	187	1,090	4,520			
Great Basin . . . . .	2,405	2,510	1,610	56	1,660	4,420	143	4,560	6,030	199	6,230	33	1,140	3,260			
Pacific Northwest . . . . .	9,948	3,220	5,500	0	5,500	26,500	38	26,500	32,000	38	32,000	.1	8,050	10,600			
California . . . . .	32,060	1,140	14,600	185	14,800	21,900	9,450	31,300	36,500	9,640	46,100	330	1,860	25,300			
Alaska . . . . .	604	350	58	75	132	154	43	196	211	117	329	0	.1	25			
Hawaii . . . . .	1,187	853	515	16	531	497	906	1,400	1,010	922	1,930	6.2	98	542			
Caribbean . . . . .	3,858	152	156	.2	156	433	2,450	2,880	588	2,450	3,040	0	15	189			
<b>Total . . . . .</b>	<b>267,068</b>	<b>1,280</b>	<b>76,400</b>	<b>1,110</b>	<b>77,500</b>	<b>264,000</b>	<b>59,700</b>	<b>324,000</b>	<b>341,000</b>	<b>60,800</b>	<b>402,000</b>	<b>1,020</b>	<b>25,300</b>	<b>100,000</b>			

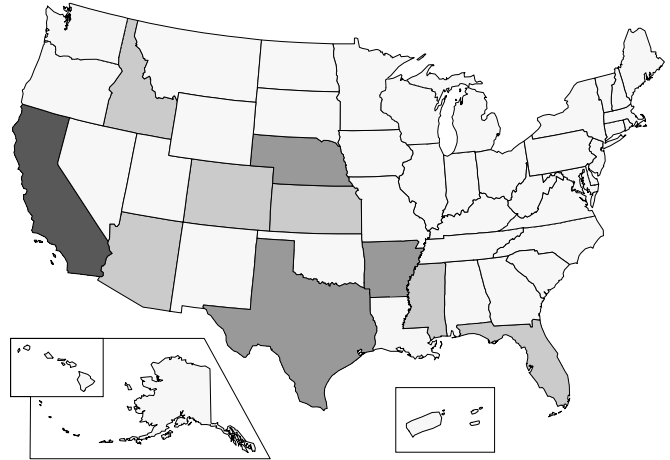
### TOTAL WITHDRAWALS



### SURFACE-WATER WITHDRAWALS



### GROUND-WATER WITHDRAWALS



**Figure 2.** Total water withdrawals by source and State, 1995.

**Table 2. Total offshore water use by State, 1995**

[Figures may not add to totals because of independent rounding. Mgal/d = million gallons per day; gal/d = gallons per day]

STATE	POPULATION, in thousands	PER CAPITA USE, fresh-water, in gal/d	WITHDRAWALS, in Mgal/d (includes irrigation conveyance losses)									RECLAIMED WASTE-WATER, in Mgal/d	CONVEYANCE LOSSES, in Mgal/d	CONSUMPTIVE USE, fresh-water, in Mgal/d
			By source and type						Total					
			Ground water			Surface water			Fresh	Saline	Total			
			Fresh	Saline	Total	Fresh	Saline	Total						
Alabama	4,253	1,670	436	9.1	445	6,650	0	6,650	7,090	9.1	7,100	0.1	0	532
Alaska	604	350	58	75	132	154	43	196	211	117	329	0	.1	25
Arizona	4,218	1,620	2,830	12	2,840	3,980	2.3	3,990	6,820	14	6,830	180	1,030	3,830
Arkansas	2,484	3,530	5,460	0	5,460	3,310	0	3,310	8,770	0	8,770	0	416	4,760
California	32,063	1,130	14,500	185	14,700	21,800	9,450	31,300	36,300	9,640	45,900	334	1,670	25,500
Colorado	3,747	3,690	2,260	17	2,270	11,600	0	11,600	13,800	17	13,800	11	3,770	5,230
Connecticut	3,275	389	166	0	166	1,110	3,180	4,290	1,280	3,180	4,450	0	0	97
Delaware	717	1,050	110	0	110	642	743	1,390	752	743	1,500	0	0	71
D.C.	554	18	.5	0	.5	9.7	0	9.7	10	0	10	0	0	15
Florida	14,166	509	4,340	4.6	4,340	2,880	11,000	13,800	7,210	11,000	18,200	236	32	2,780
Georgia	7,201	799	1,190	0	1,190	4,560	64	4,630	5,750	64	5,820	.6	0	1,170
Hawaii	1,187	853	515	16	531	497	906	1,400	1,010	922	1,930	6.2	98	542
Idaho	1,163	13,000	2,830	0	2,830	12,300	0	12,300	15,100	0	15,100	0	5,480	4,340
Illinois	11,830	1,680	928	25	953	19,000	0	19,000	19,900	25	19,900	2.0	0	857
Indiana	5,803	1,570	709	0	709	8,430	0	8,430	9,140	0	9,140	0	0	505
Iowa	2,842	1,070	528	0	528	2,510	0	2,510	3,030	0	3,030	0	0	290
Kansas	2,565	2,040	3,510	0	3,510	1,720	0	1,720	5,240	0	5,240	6.8	143	3,620
Kentucky	3,860	1,150	226	0	226	4,190	0	4,190	4,420	0	4,420	0	.5	318
Louisiana	4,342	2,270	1,350	0	1,350	8,500	0	8,500	9,850	0	9,850	0	166	1,930
Maine	1,241	178	80	0	80	141	105	246	221	105	326	0	0	48
Maryland	5,042	289	246	0	246	1,210	6,270	7,480	1,460	6,270	7,730	70	0	150
Massachusetts	6,074	189	351	0	351	795	4,370	5,160	1,150	4,370	5,510	0	0	180
Michigan	9,549	1,260	858	4.4	862	11,200	0	11,200	12,100	4.4	12,100	0	0	667
Minnesota	4,610	736	714	0	714	2,680	0	2,680	3,390	0	3,390	0	0	417
Mississippi	2,697	1,140	2,590	0	2,590	502	112	614	3,090	112	3,200	0	17	1,570
Missouri	5,324	1,320	891	0	891	6,140	0	6,140	7,030	0	7,030	11	0	692
Montana	870	10,200	204	13	217	8,640	0	8,640	8,850	13	8,860	0	4,410	1,960
Nebraska	1,637	6,440	6,200	4.7	6,200	4,350	0	4,350	10,500	4.7	10,500	2.0	906	7,020
Nevada	1,530	1,480	855	42	896	1,400	0	1,400	2,260	42	2,300	24	473	1,340
New Hampshire	1,148	388	81	0	81	364	877	1,240	446	877	1,320	0	0	35
New Jersey	7,945	269	580	0	580	1,560	3,980	5,530	2,140	3,980	6,110	1.1	0	210
New Mexico	1,686	2,080	1,700	0	1,700	1,800	0	1,800	3,510	0	3,510	0	628	1,980
New York	18,136	567	1,010	1.5	1,010	9,270	6,500	15,800	10,300	6,500	16,800	0	0	469
North Carolina	7,195	1,070	535	2.1	535	7,200	1,550	8,750	7,730	1,560	9,290	1.0	0	713
North Dakota	641	1,750	122	0	122	1,000	0	1,000	1,120	0	1,120	0	5.1	181
Ohio	11,151	944	905	0	905	9,620	0	9,620	10,500	0	10,500	0	.2	791
Oklahoma	3,278	543	959	259	1,220	822	0	822	1,780	259	2,040	0	4.9	716
Oregon	3,140	2,520	1,050	0	1,050	6,860	0	6,860	7,910	0	7,910	0	1,300	3,210
Pennsylvania	12,072	802	860	0	860	8,820	0	8,820	9,680	0	9,680	1.1	0	565
Rhode Island	990	138	27	0	27	109	275	383	136	275	411	0	0	19
South Carolina	3,673	1,690	322	0	322	5,880	0	5,880	6,200	0	6,200	0	0	321
South Dakota	729	631	187	0	187	273	0	273	460	0	460	0	54	249
Tennessee	5,256	1,920	435	0	435	9,640	0	9,640	10,100	0	10,100	.5	0	233
Texas	18,724	1,300	8,370	411	8,780	16,000	4,860	20,800	24,300	5,280	29,600	109	540	10,500
Utah	1,951	2,200	776	14	790	3,530	143	3,670	4,300	157	4,460	14	612	2,200
Vermont	585	967	50	0	50	515	0	515	565	0	565	0	0	24
Virginia	6,618	826	358	0	358	5,110	2,800	7,900	5,470	2,800	8,260	0	2.9	218
Washington	5,431	1,620	1,760	0	1,760	7,060	38	7,100	8,820	38	8,860	0	1,090	3,080
West Virginia	1,828	2,530	146	.5	146	4,470	0	4,470	4,620	.5	4,620	0	0	352
Wisconsin	5,102	1,420	759	0	759	6,490	0	6,490	7,250	0	7,250	0	0	443
Wyoming	480	14,700	317	18	335	6,720	0	6,720	7,040	18	7,060	9.1	2,470	2,800
Puerto Rico	3,755	154	155	0	155	422	2,260	2,680	576	2,260	2,840	0	15	187
Virgin Islands	103	113	.5	.2	.7	11	190	201	12	190	202	0	0	1.9
Total	267,068	1,280	76,400	1,110	77,500	264,000	59,700	324,000	341,000	60,800	402,000	1,020	25,300	100,000

**Table 3.** Total water withdrawals by water-use category and water-resources region, 1995

[Figures may not add to totals because of independent rounding. All values in million gallons per day]

REGION	PUBLIC SUPPLY	DOMESTIC	COMMER- CIAL	IRRIGATION	LIVESTOCK	INDUSTRIAL		MINING		THERMOELECTRIC		TOTAL	
	Fresh	Fresh	Fresh	Fresh	Fresh	Fresh	Saline	Fresh	Saline	Fresh	Saline	Fresh	Saline
New England . . . . .	1,440	169	90	146	19	153	0	24	0	1,670	8,800	3,710	8,800
Mid-Atlantic . . . . .	6,000	486	283	293	134	1,430	526	321	8.6	12,600	19,700	21,600	20,300
South Atlantic-Gulf . . . . .	5,470	719	130	4,600	405	2,790	40	339	9.1	17,600	12,700	32,100	12,700
Great Lakes . . . . .	4,420	355	152	315	70	4,170	3.6	390	7.6	22,800	0	32,700	11
Ohio . . . . .	2,680	328	170	104	141	3,690	0	327	23	22,600	0	30,100	23
Tennessee . . . . .	574	64	22	48	205	1,070	0	11	0	6,990	0	8,980	0
Upper Mississippi . . . . .	1,880	311	208	484	255	988	0	134	4.2	19,100	0	23,300	4.2
Lower Mississippi . . . . .	1,070	73	36	8,130	1,010	2,890	0	5.3	0	6,730	0	20,000	0
Souris-Red-Rainy . . . . .	66	17	.3	88	20	22	0	1.4	0	38	0	253	0
Missouri Basin . . . . .	1,570	138	34	24,600	426	152	0	306	38	8,800	0	36,000	38
Arkansas-White-Red . . . . .	1,550	105	115	9,250	395	438	0	56	284	4,170	0	16,100	284
Texas-Gulf . . . . .	2,840	115	42	5,530	208	1,060	996	197	324	7,680	3,870	17,700	5,190
Rio Grande . . . . .	487	25	19	6,020	35	10	0	55	60	18	1.0	6,670	61
Upper Colorado . . . . .	141	12	6.2	7,030	54	6.4	0	23	14	146	0	7,420	14
Lower Colorado . . . . .	1,170	45	30	6,410	40	47	0	152	14	63	0	7,960	14
Great Basin . . . . .	605	14	25	5,110	86	91	.1	74	162	24	37	6,030	199
Pacific Northwest . . . . .	1,910	260	1,070	25,700	1,510	1,080	38	35	0	385	0	32,000	38
California . . . . .	5,610	124	396	29,100	453	541	36	78	151	205	9,450	36,500	9,640
Alaska . . . . .	81	8.7	11	.6	.5	55	1.8	24	116	31	0	211	117
Hawaii . . . . .	214	3.7	46	652	10	19	.9	.5	0	67	903	1,010	922
Caribbean . . . . .	437	13	3.4	107	6.4	14	17	4.5	0	2.2	2,440	588	2,450
Total . . . . .	40,200	3,390	2,890	134,000	5,490	20,700	1,660	2,560	1,210	132,000	57,900	341,000	60,800

**Table 4. Total water withdrawals by water-use category and State, 1995**

[Figures may not add to totals because of independent rounding. All values in million gallons per day]

STATE	PUBLIC SUPPLY	DOMESTIC	COMMER-		LIVESTOCK	INDUSTRIAL		MINING		THERMOELECTRIC		TOTAL	
	Fresh	Fresh	Fresh	IRRIGATION		Fresh	Saline	Fresh	Saline	Fresh	Saline	Fresh	Saline
Alabama	813	62	4.9	139	129	733	0	11	9.1	5,200	0	7,090	9.1
Alaska	81	8.6	11	.6	.5	55	1.8	24	116	31	0	211	117
Arizona	807	39	21	5,670	32	39	0	144	14	62	0	6,820	14
Arkansas	381	38	100	5,940	354	187	0	.1	0	1,770	0	8,800	0
California	5,620	120	385	28,900	459	538	36	76	151	205	9,450	36,300	9,640
Colorado	705	27	8.6	12,700	59	123	0	52	17	114	0	13,800	17
Connecticut	393	55	27	28	1.4	9.6	0	1.7	0	760	3,180	1,280	3,180
Delaware	89	12	2.8	48	4.1	61	3.2	0	0	534	740	752	743
D.C.	0	0	0	0	0	.5	0	0	0	9.7	0	10	0
Florida	2,070	297	50	3,470	56	345	8.0	296	0	636	11,000	7,210	11,000
Georgia	1,150	99	46	722	48	633	32	12	0	3,040	33	5,750	64
Hawaii	214	3.7	46	652	10	19	.9	.5	0	67	903	1,010	922
Idaho	189	65	306	13,000	1,460	47	0	29	0	0	0	15,100	0
Illinois	1,820	129	104	180	56	452	0	50	25	17,100	0	19,900	25
Indiana	669	115	93	116	46	2,270	0	137	0	5,690	0	9,140	0
Iowa	373	45	43	39	110	258	0	43	0	2,120	0	3,030	0
Kansas	370	24	5.2	3,380	109	53	0	24	0	1,270	0	5,240	0
Kentucky	496	25	22	12	46	347	0	28	0	3,440	0	4,420	0
Louisiana	638	39	11	769	325	2,580	0	1.8	0	5,480	0	9,850	0
Maine	100	35	11	27	1.9	11	0	5.0	0	30	105	221	105
Maryland	834	73	24	62	35	65	261	5.2	0	360	6,000	1,460	6,270
Massachusetts	725	34	12	82	10	85	0	3.2	0	196	4,370	1,150	4,370
Michigan	1,300	194	41	227	14	1,850	3.6	58	.8	8,370	0	12,100	4.4
Minnesota	485	88	66	157	62	140	0	298	0	2,090	0	3,390	0
Mississippi	344	33	18	1,740	396	290	0	3.7	0	263	112	3,090	112
Missouri	699	58	14	567	76	39	0	24	0	5,550	0	7,030	0
Montana	143	18	0	8,550	52	60	0	6.6	13	22	0	8,850	13
Nebraska	286	42	.3	7,550	142	30	0	141	4.7	2,350	0	10,500	4.7
Nevada	468	11	21	1,640	5.7	15	0	68	11	27	30	2,260	42
New Hampshire	98	32	30	6.3	.8	43	0	7.0	0	229	877	446	877
New Jersey	1,040	86	18	125	1.5	201	195	90	0	580	3,780	2,140	3,980
New Mexico	311	26	20	2,990	30	8.3	0	61	0	56	0	3,510	0
New York	3,000	144	200	30	34	259	0	45	16	6,570	6,490	10,300	6,500
North Carolina	769	172	7.6	239	297	369	0	16	0	5,860	1,550	7,730	1,560
North Dakota	73	12	.2	117	24	11	0	5.8	0	880	0	1,120	0
Ohio	1,420	140	68	27	27	557	0	93	0	8,190	0	10,500	0
Oklahoma	567	30	23	864	147	21	0	5.4	259	124	0	1,780	259
Oregon	504	68	756	6,170	23	378	0	1.2	0	9.0	0	7,910	0
Pennsylvania	1,550	181	30	16	55	1,680	0	252	0	5,920	0	9,680	0
Rhode Island	114	7.3	1.5	2.3	3.6	1.1	0	6.2	0	0	275	136	275
South Carolina	543	71	1.7	52	25	700	0	2.9	0	4,810	0	6,200	0
South Dakota	88	9.4	10	269	46	5.1	0	27	0	5.4	0	460	0
Tennessee	777	54	20	24	37	863	0	5.5	0	8,300	0	10,100	0
Texas	3,290	130	44	9,450	315	1,300	996	211	409	9,590	3,870	24,300	5,280
Utah	497	9.4	3.8	3,530	108	86	.1	16	150	48	6.7	4,300	157
Vermont	47	19	26	3.9	5.3	9.4	0	3.0	0	453	0	565	0
Virginia	786	125	41	30	36	516	67	39	0	3,890	2,730	5,470	2,800
Washington	1,180	125	24	6,470	34	611	38	3.5	0	376	0	8,820	38
West Virginia	176	41	46	0	18	1,320	0	11	.5	3,010	0	4,620	.5
Wisconsin	600	92	17	169	92	441	0	12	0	5,830	0	7,250	0
Wyoming	90	10	1.6	6,590	25	2.8	0	96	18	220	0	7,040	18
Puerto Rico	431	12	2.7	107	6.3	11	0	4.2	0	2.2	2,260	576	2,260
Virgin Islands	6.5	1.4	.8	0	.1	3.0	17	0	0	0	173	12	190
Total	40,200	3,390	2,890	134,000	5,490	20,700	1,660	2,560	1,210	132,000	57,900	341,000	60,800

**Table 5.** Surface-water withdrawals by water-use category and water-resources region, 1995

[Figures may not add to totals because of independent rounding. All values in million gallons per day]

STATE	PUBLIC SUPPLY	DOMESTIC	COMMER- CIAL		LIVESTOCK	INDUSTRIAL		MINING		THERMOELECTRIC		TOTAL	
	Fresh	Fresh	Fresh	Fresh		Fresh	Saline	Fresh	Saline	Fresh	Saline	Fresh	Saline
New England . . . . .	1,100	0.5	26	99	13	100	0	21	0	1,620	8,800	2,980	8,800
Mid-Atlantic . . . . .	4,730	.6	65	165	55	1,090	526	163	7.5	12,600	19,700	18,900	20,300
South Atlantic-Gulf . . . . .	2,710	0	16	2,320	217	2,010	40	162	0	17,500	12,700	25,000	12,700
Great Lakes . . . . .	3,830	1.0	108	145	20	3,900	0	356	6.5	22,800	0	31,100	6.5
Ohio . . . . .	1,800	5.0	80	43	81	3,310	0	212	.6	22,600	0	28,100	.6
Tennessee . . . . .	449	0	18	39	187	1,030	0	7.2	0	6,990	0	8,730	0
Upper Mississippi . . . . .	731	0	114	54	39	660	0	112	0	19,000	0	20,700	0
Lower Mississippi . . . . .	330	.1	21	1,200	272	2,280	0	2.2	0	6,670	0	10,800	0
Souris-Red-Rainy . . . . .	32	0	.1	43	3.0	20	0	1.0	0	38	0	138	0
Missouri Basin . . . . .	926	1.2	15	16,600	173	50	0	201	0	8,770	0	26,700	0
Arkansas-White-Red . . . . .	1,170	0	99	2,590	205	360	0	26	0	4,140	0	8,590	0
Texas-Gulf . . . . .	1,860	0	8.0	1,170	126	846	996	79	0	7,630	3,870	11,700	4,860
Rio Grande . . . . .	131	0	1.8	4,600	8.5	.1	0	2.1	0	2.2	0	4,740	0
Upper Colorado . . . . .	106	.4	.7	6,990	50	4.0	0	3.5	0	146	0	7,310	0
Lower Colorado . . . . .	698	.2	7.5	4,200	6.8	5.5	0	26	2.3	17	0	4,970	2.3
Great Basin . . . . .	254	1.6	15	4,020	77	31	0	2.8	143	21	0	4,420	143
Pacific Northwest . . . . .	993	7.3	1,030	21,700	1,470	866	38	29	0	384	0	26,500	38
California . . . . .	2,880	12	319	18,200	222	19	26	62	0	202	9,430	21,900	9,450
Alaska . . . . .	50	.4	.1	.5	.4	51	1.8	24	41	26	0	154	43
Hawaii . . . . .	14	1.3	.4	479	2.6	0	0	.1	0	0	903	497	906
Caribbean . . . . .	342	6.9	2.1	75	1.8	4.0	17	1.1	0	0	2,440	433	2,450
Total . . . . .	25,100	38	1,950	84,700	3,230	16,700	1,640	1,490	201	131,000	57,900	264,000	59,700

**Table 6. Surface-water withdrawals by water-use category and State, 1995**

[Figures may not add to totals because of independent rounding. All values in million gallons per day]

STATE	PUBLIC SUPPLY	DOMESTIC	COMMER- CIAL IRRIGATION		LIVESTOCK	INDUSTRIAL		MINING		THERMOELECTRIC		TOTAL	
	Fresh	Fresh	Fresh	Fresh	Fresh	Fresh	Saline	Fresh	Saline	Fresh	Saline	Fresh	Saline
Alabama	560	0	0	88	107	699	0	7.0	0	5,190	0	6,650	0
Alaska	50	.3	.1	.5	.4	51	1.8	24	41	26	0	154	43
Arizona	398	0	0	3,540	2.4	0	0	25	2.3	20	0	3,980	2.3
Arkansas	246	0	100	1,010	110	80	0	.1	0	1,770	0	3,310	0
California	2,880	12	309	18,100	225	16	26	62	0	202	9,430	21,800	9,450
Colorado	605	0	.9	10,700	36	86	0	27	0	93	0	11,600	0
Connecticut	329	0	1.5	12	.1	6.2	0	1.4	0	760	3,180	1,110	3,180
Delaware	49	0	0	15	.4	43	3.2	0	0	534	740	642	743
D.C.	0	0	0	0	0	0	0	0	0	9.7	0	9.7	0
Florida	210	0	.2	1,800	5.9	106	8.0	148	0	615	11,000	2,880	11,000
Georgia	890	0	13	243	38	337	32	2.9	0	3,040	33	4,560	64
Hawaii	14	1.3	.4	479	2.6	0	0	.1	0	0	903	497	906
Idaho	9.9	0	297	10,500	1,440	7.9	0	27	0	0	0	12,300	0
Illinois	1,450	0	88	0	2.2	290	0	44	0	17,100	0	19,000	0
Indiana	350	0	48	55	18	2,160	0	126	0	5,680	0	8,430	0
Iowa	116	0	25	3.6	27	184	0	42	0	2,110	0	2,510	0
Kansas	209	0	.3	230	19	3.2	0	11	0	1,250	0	1,720	0
Kentucky	441	2.5	14	11	44	255	0	21	0	3,410	0	4,190	0
Louisiana	344	0	.7	294	181	2,230	0	1.4	0	5,450	0	8,500	0
Maine	75	0	1.7	24	.5	5.9	0	3.7	0	30	105	141	105
Maryland	751	0	4.9	26	23	45	261	4.3	0	358	6,000	1,210	6,270
Massachusetts	533	0	0	54	8.5	47	0	2.7	0	150	4,370	795	4,370
Michigan	952	.1	25	127	1.4	1,670	0	51	0	8,370	0	11,200	0
Minnesota	154	0	20	37	0	83	0	292	0	2,090	0	2,680	0
Mississippi	41	0	0	97	19	124	0	.2	0	220	112	502	112
Missouri	473	0	.5	33	57	18	0	15	0	5,540	0	6,140	0
Montana	89	1.0	0	8,460	35	29	0	3.8	0	22	0	8,640	0
Nebraska	53	0	0	1,770	33	4.4	0	134	0	2,350	0	4,350	0
Nevada	351	.2	14	1,000	4.7	7.5	0	3.5	0	21	0	1,400	0
New Hampshire	66	.5	18	6.1	.2	38	0	7.0	0	228	877	364	877
New Jersey	640	0	1.2	93	0	158	195	87	0	578	3,780	1,560	3,980
New Mexico	34	0	1.6	1,710	3.6	2.0	0	.7	0	46	0	1,800	0
New York	2,450	0	65	14	12	132	0	34	15	6,570	6,490	9,270	6,500
North Carolina	633	0	.3	181	207	308	0	4.3	0	5,860	1,550	7,200	1,550
North Dakota	43	0	.2	57	9.9	7.9	0	2.0	0	879	0	1,000	0
Ohio	923	2.8	41	16	19	399	0	46	0	8,170	0	9,620	0
Oklahoma	468	0	16	98	101	17	0	0	0	121	0	822	0
Oregon	417	7.2	752	5,290	20	365	0	0	0	9.0	0	6,860	0
Pennsylvania	1,300	0	14	7.7	7.1	1,530	0	41	0	5,920	0	8,820	0
Rhode Island	99	0	0	1.6	3.1	0	0	5.7	0	0	275	109	275
South Carolina	436	0	0	25	12	640	0	0	0	4,770	0	5,880	0
South Dakota	35	0	4.1	184	28	1.0	0	20	0	1.9	0	273	0
Tennessee	500	0	18	15	15	795	0	2.7	0	8,300	0	9,640	0
Texas	2,160	0	11	2,920	176	1,070	996	83	0	9,530	3,870	16,000	4,860
Utah	204	1.7	0	3,140	100	31	0	.9	143	48	0	3,530	143
Vermont	32	.4	16	3.5	1.3	7.4	0	2.8	0	452	0	515	0
Virginia	704	0	13	24	28	410	67	37	0	3,890	2,730	5,110	2,800
Washington	548	0	.4	5,650	11	478	38	.7	0	375	0	7,060	38
West Virginia	139	.8	9.2	0	3.6	1,300	0	7.5	0	3,010	0	4,470	0
Wisconsin	289	0	0	1.5	13	363	0	4.3	0	5,820	0	6,490	0
Wyoming	52	.5	.6	6,410	11	1.2	0	25	0	219	0	6,720	0
Puerto Rico	336	5.5	1.5	75	1.8	1.1	0	1.4	0	0	2,260	422	2,260
Virgin Islands	6.2	1.4	.6	0	0	2.9	17	0	0	0	173	11	190
Total	25,100	38	1,950	84,700	3,230	16,700	1,640	1,490	201	131,000	57,900	264,000	59,700



**Table 7.** Ground-water withdrawals by water-use category and water-resources region, 1995  
 [Figures may not add to totals because of independent rounding. All values in million gallons per day]

REGION	PUBLIC SUPPLY	COMMERCIAL				INDUSTRIAL		MINING		THERMOELECTRIC		TOTAL	
	Fresh	Fresh	Fresh	Fresh	Fresh	Fresh	Saline	Fresh	Saline	Fresh	Fresh	Saline	
New England . . . . .	335	168	64	47	6.4	53	0	2.9	0	48	725	0	
Mid-Atlantic . . . . .	1,270	485	217	128	79	344	0	159	1.0	11	2,690	1.0	
South Atlantic-Gulf . . . . .	2,760	719	114	2,280	188	787	0	177	9.1	79	7,110	16	
Great Lakes . . . . .	585	354	44	170	50	270	3.6	34	1.0	7.6	1,510	4.6	
Ohio . . . . .	880	323	91	61	60	379	0	115	22	70	1,980	22	
Tennessee . . . . .	125	64	3.6	8.7	19	35	0	3.7	0	0	258	0	
Upper Mississippi . . . . .	1,150	311	94	430	216	328	0	22	4.2	24	2,570	4.2	
Lower Mississippi . . . . .	741	73	15	6,930	740	611	0	3.1	0	69	9,180	0	
Souris-Red-Rainy . . . . .	34	17	.2	45	17	1.7	0	.4	0	0	115	0	
Missouri Basin . . . . .	643	137	19	8,030	253	102	0	104	38	30	9,320	38	
Arkansas-White-Red . . . . .	378	105	16	6,660	190	78	0	30	284	37	7,490	284	
Texas-Gulf . . . . .	978	115	34	4,370	82	214	.5	118	324	50	5,960	324	
Rio Grande . . . . .	356	25	17	1,420	27	10	0	53	60	16	1,930	61	
Upper Colorado . . . . .	35	11	5.6	38	4.2	2.4	0	20	14	0	116	14	
Lower Colorado . . . . .	476	44	22	2,210	33	42	0	126	12	45	3,000	12	
Great Basin . . . . .	350	13	10	1,090	9.2	60	.1	71	19	2.6	1,610	56	
Pacific Northwest . . . . .	917	253	37	4,030	44	215	0	6.5	0	.5	5,500	0	
California . . . . .	2,730	112	77	10,900	231	522	10	16	151	3.6	14,600	185	
Alaska . . . . .	30	8.3	11	.1	.1	3.8	0	0	75	4.2	58	75	
Hawaii . . . . .	200	2.4	45	173	7.5	19	.9	.5	0	67	515	16	
Caribbean . . . . .	95	6.4	1.3	33	4.5	10	.2	3.4	0	2.2	156	.2	
Total . . . . .	15,100	3,350	939	49,000	2,260	4,090	15	1,070	1,010	565	76,400	1,110	

**Table 8.** Ground-water withdrawals by water-use category and State, 1995

[Figures may not add to totals because of independent rounding. All values in million gallons per day]

STATE	PUBLIC SUPPLY	DOMESTIC	COMMER- CIAL		IRRIGATION	LIVESTOCK	INDUSTRIAL		MINING		THERMO- ELECTRIC	TOTAL	
	Fresh	Fresh	Fresh	Fresh	Fresh	Fresh	Saline	Fresh	Saline	Fresh	Fresh	Saline	
Alabama	253	62	4.9	51	22	34	0	4.0	9.1	6.0	436	9.1	
Alaska	30	8.3	11	.1	.1	3.8	0	0	75	4.2	58	75	
Arizona	409	39	21	2,130	29	39	0	119	12	42	2,830	12	
Arkansas	135	38	.4	4,930	244	108	0	0	0	5.2	5,460	0	
California	2,740	108	77	10,800	234	522	10	14	151	3.6	14,500	185	
Colorado	100	27	7.7	2,020	23	37	0	25	17	22	2,260	17	
Connecticut	65	55	25	16	1.4	3.5	0	.3	0	.2	166	0	
Delaware	40	12	2.8	34	3.8	17	0	0	0	.2	110	0	
D.C.	0	0	0	0	0	.5	0	0	0	0	0	.5	
Florida	1,860	297	50	1,670	50	240	0	148	0	21	4,340	4.6	
Georgia	263	99	33	479	9.7	295	0	8.7	0	4.8	1,190	0	
Hawaii	200	2.4	45	173	7.5	19	.9	.5	0	67	515	16	
Idaho	180	65	9.8	2,520	17	39	0	1.2	0	0	2,830	0	
Illinois	371	129	16	180	54	162	0	5.5	25	11	928	25	
Indiana	319	115	45	61	28	119	0	10	0	11	709	0	
Iowa	257	45	18	35	82	74	0	1.1	0	15	528	0	
Kansas	161	24	4.9	3,150	91	50	0	13	0	14	3,510	0	
Kentucky	55	23	8.0	.5	2.3	92	0	7.4	0	38	226	0	
Louisiana	294	39	10	475	144	356	0	.4	0	31	1,350	0	
Maine	25	35	9.8	2.6	1.4	4.6	0	1.3	0	.7	80	0	
Maryland	83	73	19	37	13	19	0	.9	0	1.8	246	0	
Massachusetts	192	34	12	28	1.5	38	0	.5	0	46	351	0	
Michigan	348	194	16	101	13	177	3.6	7.1	.8	3.0	858	4.4	
Minnesota	331	88	46	120	62	58	0	6.3	0	1.9	714	0	
Mississippi	302	33	18	1,640	377	166	0	3.5	0	42	2,590	0	
Missouri	226	58	13	535	20	21	0	8.6	0	9.5	891	0	
Montana	55	17	0	82	16	31	0	2.8	13	0	204	13	
Nebraska	232	42	.3	5,780	108	26	0	6.1	4.7	4.4	6,200	4.7	
Nevada	117	11	7.1	641	1.0	7.4	0	65	11	6.3	855	42	
New Hampshire	31	31	12	.3	.6	5.6	0	0	0	.8	81	0	
New Jersey	397	86	17	32	1.5	43	0	2.4	0	1.9	580	0	
New Mexico	277	26	18	1,280	26	6.3	0	61	0	9.3	1,700	0	
New York	552	144	136	16	22	127	0	11	1.5	0	1,010	1.5	
North Carolina	136	172	7.3	57	89	61	0	12	0	.1	535	2.1	
North Dakota	30	12	.1	59	14	3.6	0	3.8	0	.3	122	0	
Ohio	497	138	28	12	7.6	158	0	47	0	19	905	0	
Oklahoma	99	30	6.6	766	45	3.8	0	5.4	259	3.5	959	259	
Oregon	87	61	4.4	878	3.4	13	0	1.2	0	0	1,050	0	
Pennsylvania	243	181	16	8.2	48	147	0	211	0	6.2	860	0	
Rhode Island	16	7.3	1.5	.7	.5	1.1	0	.5	0	0	27	0	
South Carolina	107	71	1.7	27	12	60	0	2.9	0	39	322	0	
South Dakota	53	9.3	6.1	85	18	4.1	0	7.8	0	3.4	187	0	
Tennessee	277	54	2.0	9.9	21	68	0	2.8	0	0	435	0	
Texas	1,130	130	33	6,530	139	226	.5	128	409	59	8,370	411	
Utah	293	7.7	3.8	393	7.6	55	.1	16	7.3	0	776	14	
Vermont	15	18	9.6	.4	4.0	1.9	0	.3	0	.4	50	0	
Virginia	82	125	28	5.6	7.8	107	0	2.6	0	.4	358	0	
Washington	631	125	24	819	24	133	0	2.8	0	.5	1,760	0	
West Virginia	38	40	36	0	15	13	0	3.7	.5	.5	146	.5	
Wisconsin	311	92	17	167	79	78	0	7.9	0	5.8	759	0	
Wyoming	38	9.7	.9	181	13	1.6	0	71	18	1.0	317	18	
Puerto Rico	95	6.4	1.2	33	4.5	10	0	2.8	0	2.2	155	0	
Virgin Islands	.3	0	.1	0	.1	.1	.2	0	0	0	.5	.2	
Total	15,100	3,350	939	49,000	2,260	4,090	15	1,070	1,010	565	76,400	1,110	

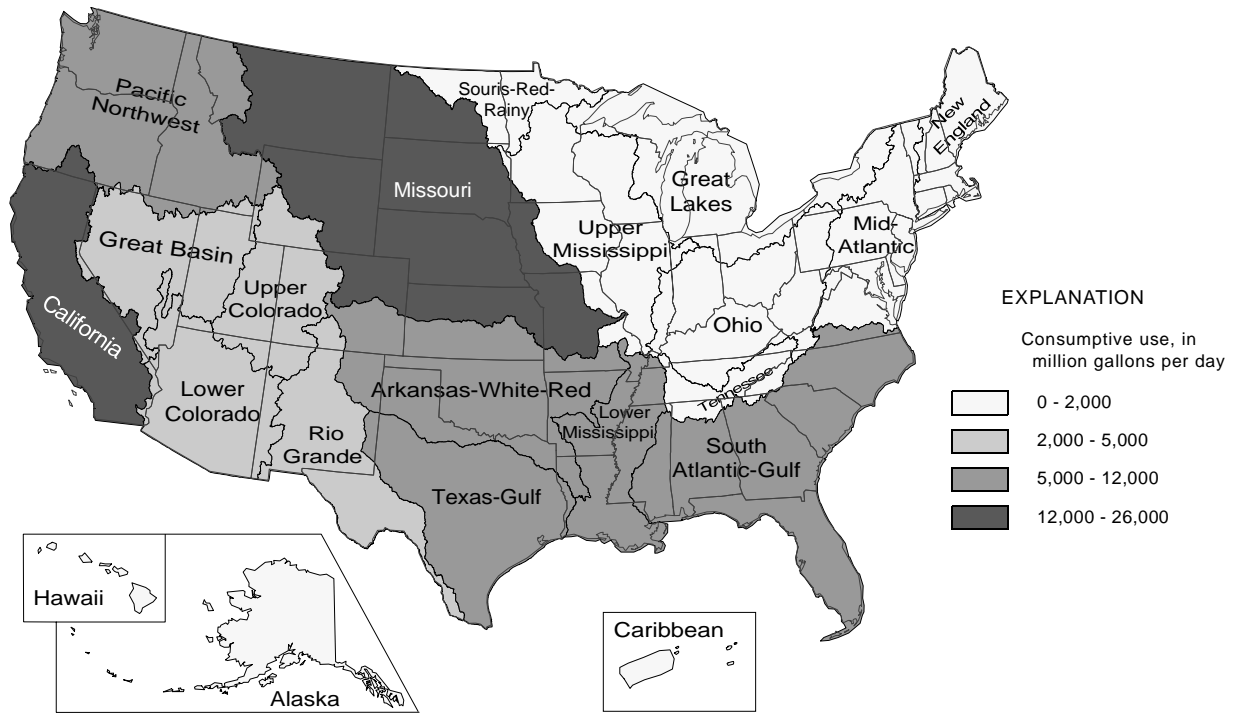


Figure 3. Freshwater consumptive use by water-resources region, 1995.

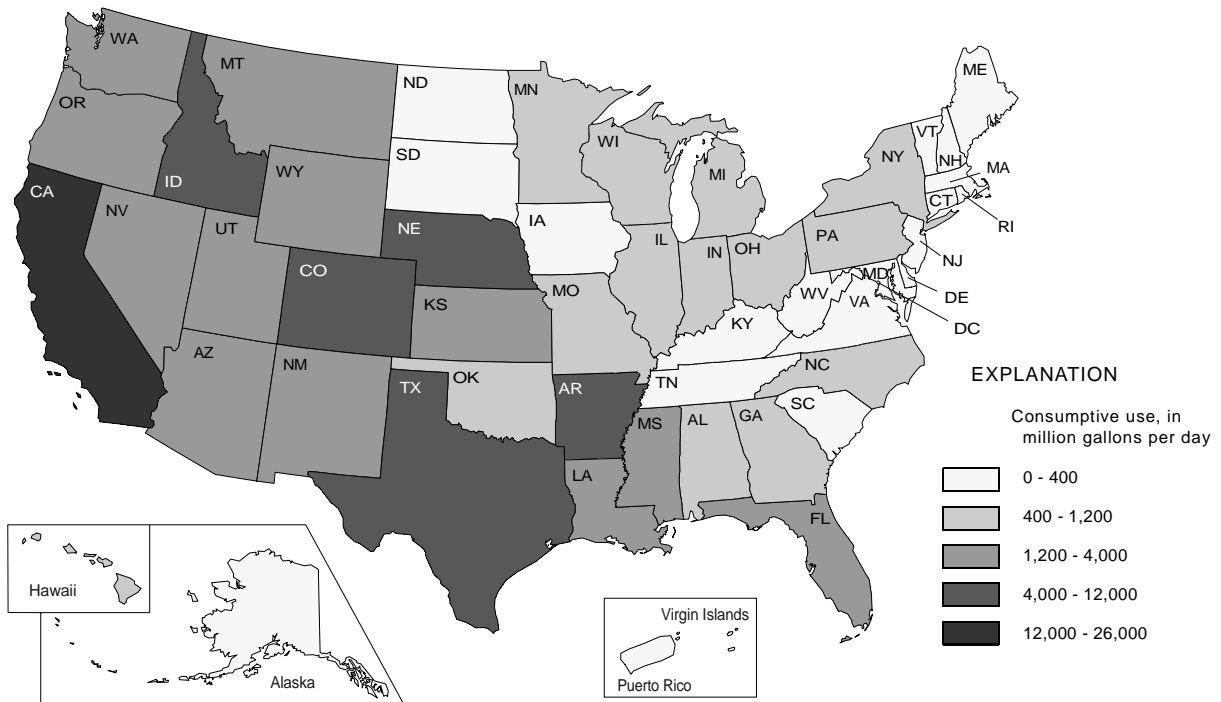
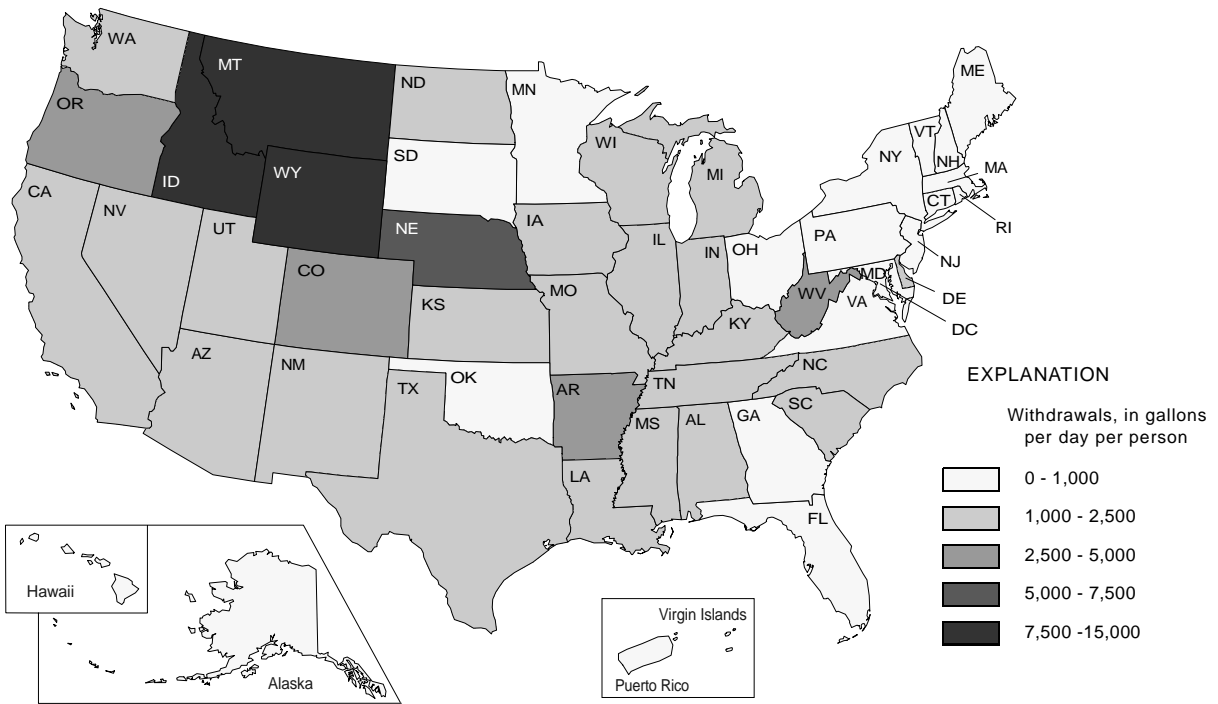
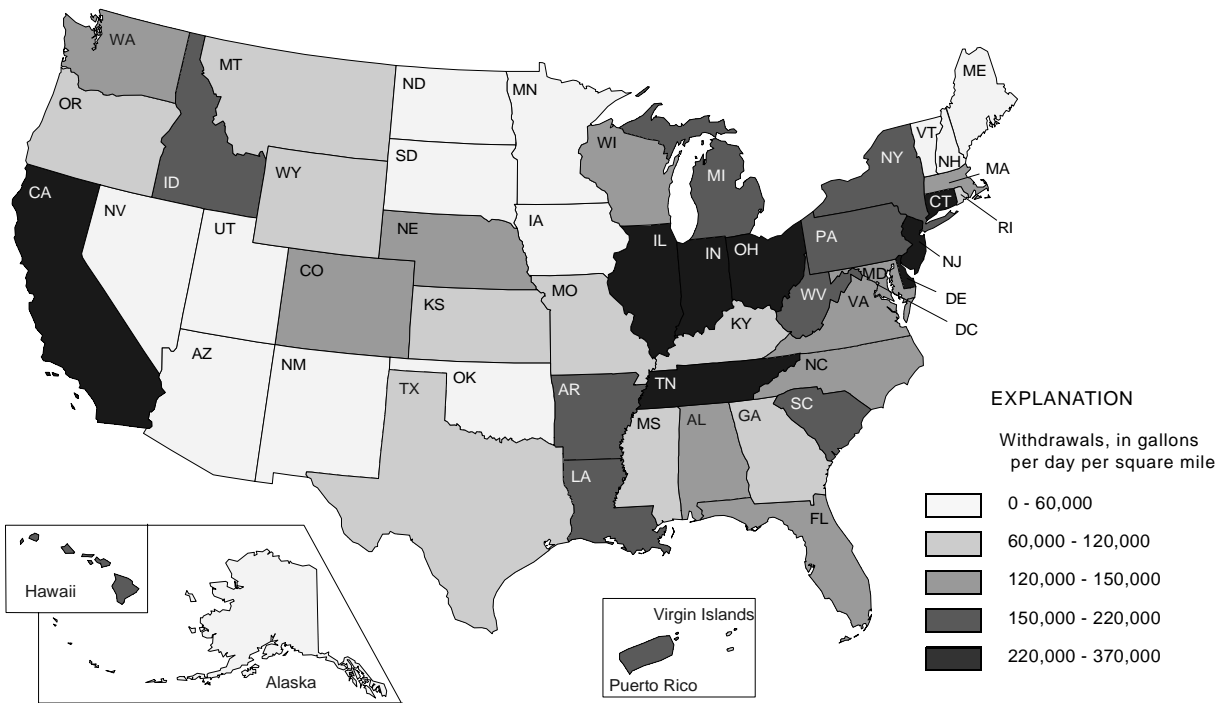


Figure 4. Freshwater consumptive use by State, 1995.



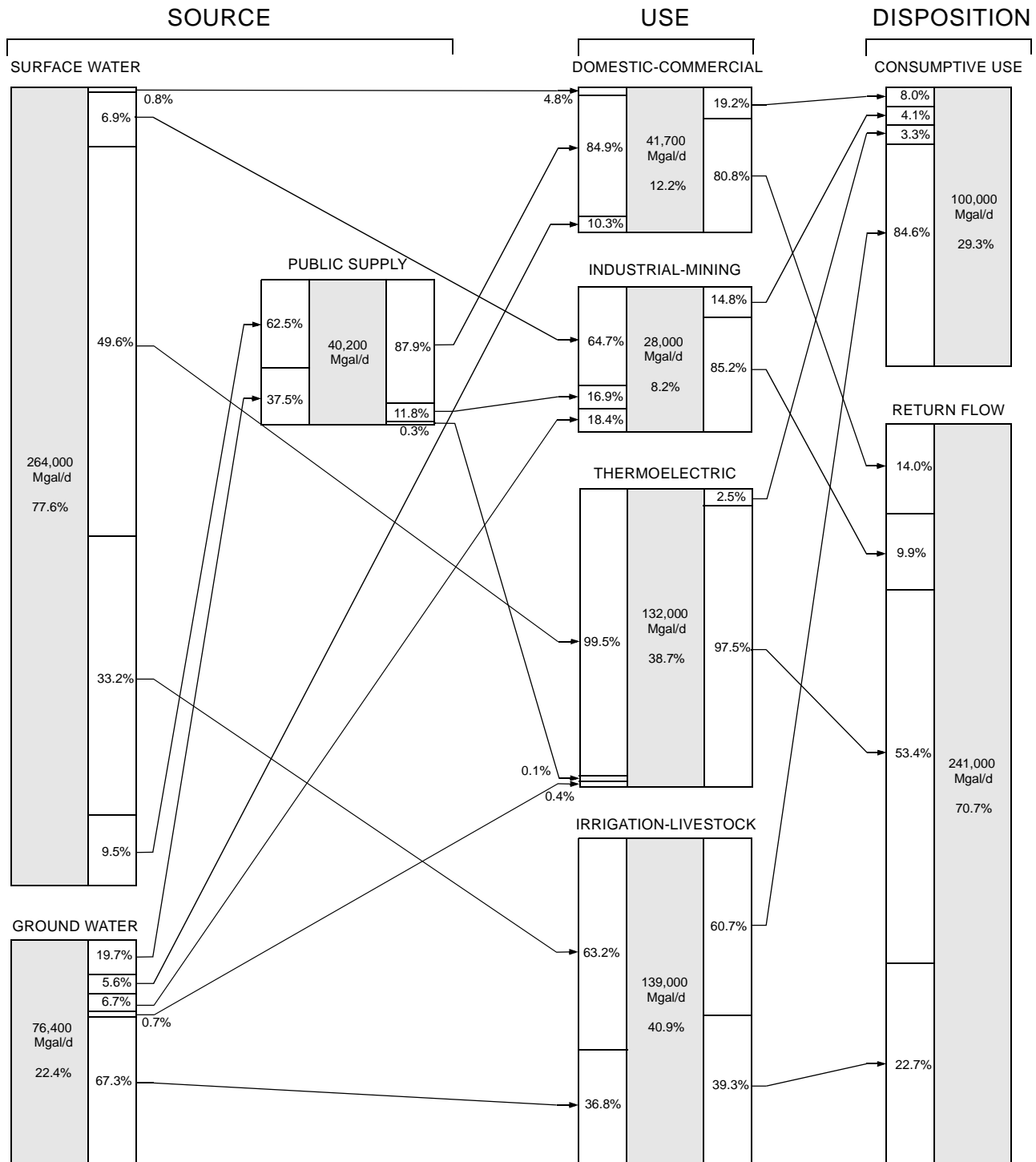
**Figure 5.** Intensity of freshwater withdrawals per capita by State, 1995.



**Figure 6.** Intensity of freshwater withdrawals per area by State, 1995.

For an overview of how the 341,000 Mgal/d of freshwater withdrawn in the United States during 1995 was used (table 2), the eight offstream categories mentioned above have been combined into five major categories: public supply, domestic and commercial, irrigation and livestock, industrial and mining, and thermoelectric power. The source (withdrawals), use (withdrawals, deliveries), and disposition of freshwater for each category of use are summarized in figure 7. The source column shows the proportion of withdrawals by source and the distribution of withdrawals by water-use category. Source data indicate, for example, that surface water was the source of 264,000 Mgal/d of freshwater (table 2), or 77.6 percent of total freshwater withdrawals. Of the 264,000 Mgal/d of surface water withdrawn, 49.6 percent was for thermoelectric power. Public supply is considered a source of water and figure 7 shows the total quantity of water withdrawn by public supply, the percentage of surface and ground water withdrawn, and the percentage of water delivered to the other water-use categories. The use column shows total freshwater use for

each category, and the percentage each category represents total offstream water use. In addition, the use column shows the proportion of the source (surface water, ground water, public supply) and disposition (consumptive use, return flow) for each category. The use data indicate, for example, that domestic and commercial use totaled 41,700 Mgal/d (tables 12 and 14), (including losses in the public-supply distribution system), or 12.2 percent of the Nation's total freshwater withdrawals. Of this 41,700 Mgal/d, 84.9 percent was supplied by public-supply systems, and 80.8 percent was returned to a surface- or ground-water source after use. The disposition column shows the quantity of consumptive use and return flow after use (figure 7). The disposition data indicate that of the total freshwater withdrawn, consumptive use was 100,000 Mgal/d (table 2), or 29.3 percent, and return flow was 241,000 Mgal/d, or 70.7 percent (including 25,300 Mgal/d of irrigation conveyance losses) (figure 7). Irrigation-Livestock accounted for 84.6 percent of consumptive use and thermoelectric power accounted for 53.4 percent of return flow.



**Figure 7. Source, use, and disposition of freshwater in the United States, 1995.** For each water-use category, this diagram shows the relative proportion of water source and disposition and the general distribution of water from source to disposition. The lines and arrows indicate the distribution of water from source to disposition for each category; for example, surface water was 77.6 percent of total freshwater withdrawn, and going from “Source” to “Use” columns, the line from the surface-water block to the domestic and commercial block indicates that 0.8 percent of all surface water withdrawn was the source for 4.8 percent of total water (self-supplied withdrawals, public-supply deliveries) for domestic and commercial purposes. In addition, going from the “Use” to “Disposition” columns, the line from the domestic and commercial block to the consumptive use block indicates that 19.2 percent of the water for domestic and commercial purposes was consumptive use; this represents 8.0 percent of total consumptive use by all water-use categories.