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SEWAGE FACILITIES CONSTRUCTION REPORT 1972 1973 1974

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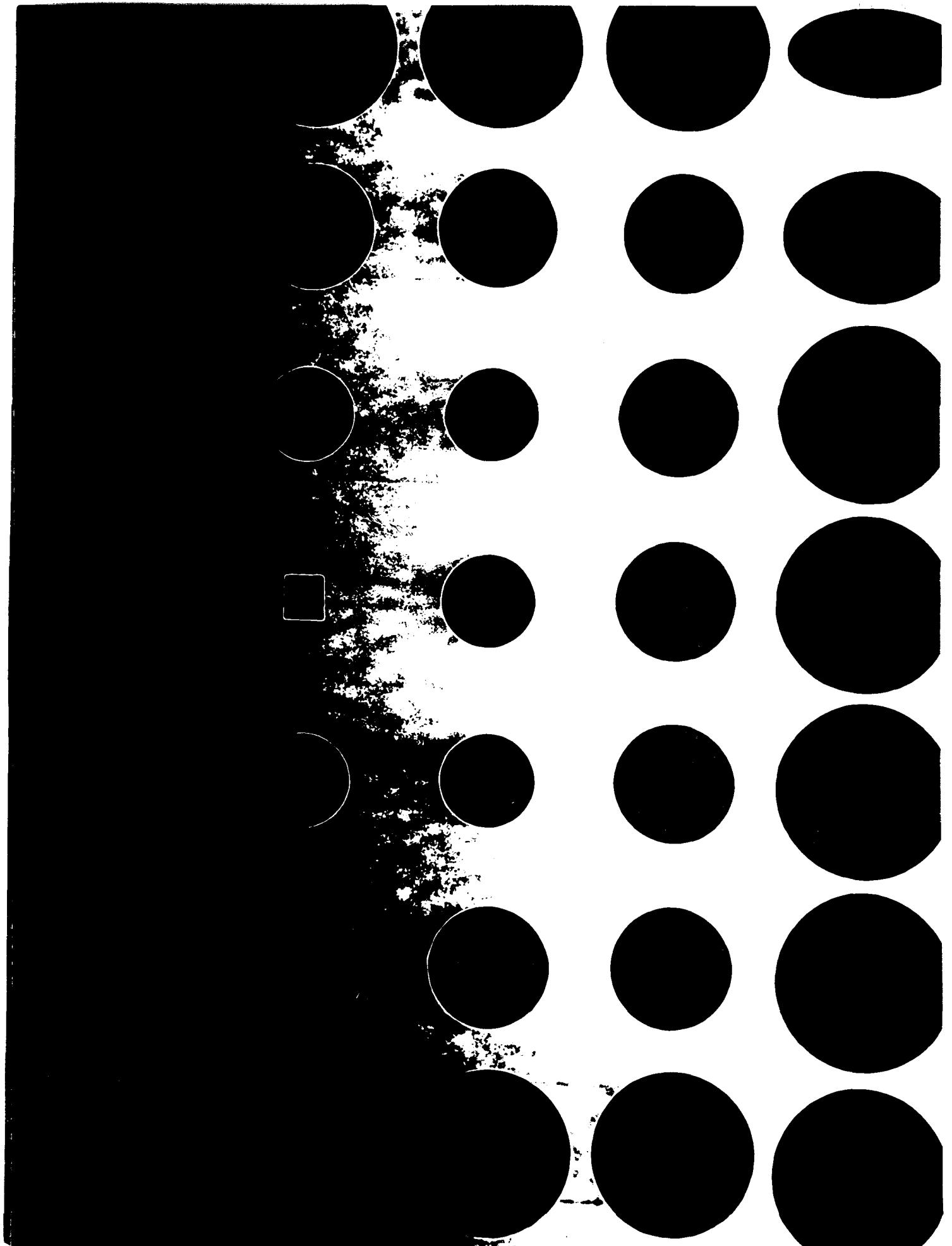
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INTRODUCTION

This publication contains a summary and analysis of contracts awarded during calendar years 1972, 1973 and 1974 for construction of sewage facilities. Previous reports in this series, normally prepared annually, were published for the years 1952 through 1971.

The basic information for this report was collected and recorded, under contract, by the F.W. Dodge Division of McGraw Hill Information Systems Company.*

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SUMMARY

Analysis of the contracts awarded in the three year period, and comparison to those awarded in previous years, result in the following principal observations:

1. In the three year period from 1972 to 1974, contract awards for sewage facilities construction totalled 10.0 billion dollars. This represents 35% of the total dollars (28.7 billion) spent on sewage facilities construction since 1952.
2. The rate of growth in spending for sewage facilities construction has exceeded the rate of inflation and the population growth rate. The annual per capita contract awards measured in constant dollars (1957-1959 base), increased 155 percent from 1957 to 1974.

Figure 1 illustrates the annual increase in contract awards as measured in current and constant (1957-1959) dollars, since 1952. Figure 2 shows the distribution by category of contract awards for 1972, 1973, 1974 as well as the combined total.

CATEGORIES OF FACILITIES CONSTRUCTION

Sewage Treatment Facilities: This category is made up of new plants (treatment plants, stabilization and oxidation ponds, lagoons and leaching systems, etc.) additions and/or replacements to existing plants, and an "other" classification which includes intercepting sewers, outfalls and pumping stations.

Collecting Sewers: This category includes lateral sewers, trunk sewers, extension force mains, lift stations on collecting or trunk lines, and combined sewers. Storm sewers are not included. In cases where combined collecting and storm sewers were part of the same contract and the costs could not be separated, one half of the contract award was assigned to the collecting sewers category.

Combinations: This category consists of projects where the breakdown in costs between sewage treatment facilities and collecting sewers was not specified.

BASIC STATISTICS

1972: Contract awards for sewage facilities construction in 1972 totalled 2.763 billion dollars (Tables 1 and 2). Of this total, 1.753 billion dollars or 63 percent was awarded for treatment facilities, 627 million dollars or 23 percent for collecting sewers, and the remaining 14 percent, 384 million dollars, was for combination projects where the breakdown in costs between the two categories was not specified. In Tables 1 and 2 the costs of the combination group were apportioned between sewage treatment facilities and collecting sewers in the same ratio as those for which such descriptions are available, making the figures 2.016 billion and 747 million, respectively.

1973: The total contract awards for sewage facilities construction in 1973 was 3.267 billion dollars (Tables 1 and 2). Sewage treatment facilities accounted for 1.894 billion dollars or 58 percent of the total. Collecting sewers made up 736 million dollars or 22.5 percent of the total contract awards in 1973. The remaining 19.5 percent, 637 million dollars, was for combination projects. When the costs of the combination projects were apportioned as for 1972 above, the figures were 2.305 billion for sewage treatment facilities and 962 million for collecting sewers (Tables 1 & 2).

1974: In 1974, 3.977 billion dollars were spent on sewage facilities construction (Tables 1 and 5c). Of this total, 63.4 percent, or 2.520 billion dollars, was awarded for sewage treatment facilities. Collecting sewers accounted for 886 million dollars, or 22.3 percent, and the remaining 14.3 percent, 571 million dollars, was awarded for combination projects. When the costs of the combination constructions were apportioned as for 1972 and 1973 above, sewage treatment facilities and collecting sewer awards increased to 2.904 and 1.073 billion dollars, respectively (Tables 1 & 2).

NATIONAL TRENDS

Annual contract awards for sewage facilities construction have increased steadily since 1957 both on a total and on a per capita basis. Even when the dollar is converted to a 1957-1959 base to adjust for inflation, this trend is observed. Since 1957 the annual amount spent on sewage construction, as measured in constant dollars (1957-1959 base), has risen from 616 million in 1957 to 1.909 billion in 1974, an increase of 209.90 percent.

Annual contract awards have also increased from 1972 to 1973 and 1973 to 1974 on a total and per capita basis, when measured in both annual and constant dollars (Table 3).

Per capita expenditures for sewage facilities construction in constant dollars have risen from \$3.57 in 1957 to \$9.11 in 1974, an increase of 155.2 percent (Table 2). The rate of increase in contract award dollars is higher over the last

6 years than it was in the preceding two six-year periods. This trend can be noted by taking the six year averages of the data for the last 18 years. The effect of year to year fluctuations are reduced by this method of analysis. The growth in per capita awards using constant dollars was 57.1 percent from the 1963-1968 period to the 1969-1974 period, as compared to a 16.7 percent growth from the 1957-1962 period to the 1963-1968 period (Table 4).

AWARDS BY STATE

1972—The state of New York had the highest total awards for 1972 (\$963 million) and the highest awards for each of the two major categories: Treatment facilities (\$747 million); and collecting sewers (\$78 million).

New York also had the highest total per capita awards (\$52.41), and the highest per capita awards (\$40.68) for sewage treatment facilities, while Alaska had the highest per capita awards (\$19.97) for collecting sewers (Table 5A).

1973—The State of New York also has the highest total awards for 1973 (\$526 million) and the highest awards for each of the two major categories: sewage treatment facilities (\$149 million), and collecting sewers (\$75 million). Alaska had the highest total per capita awards (\$59.71) and the highest per capita awards for collecting sewers (\$15.13). Hawaii had the highest per capita awards for sewage treatment facilities (\$38.48) (Table 5B).

1974—New Jersey had the highest total contract awards for 1974 (\$355 million) and the highest awards for sewage treatment facilities (\$282 million). New York had the highest awards for collecting sewers (\$98.3 million). The District of Columbia had the highest total per capita awards (\$114.60) and the highest per capita awards for sewage treatment facilities (\$109.95), while Connecticut had the highest per capita awards for collecting sewers (\$13.71) (Table 5C).

AWARDS BY BASIN

Table 6 shows the annual contract awards for sewage treatment facilities construction by basin for 1957-1974.

The Northeast basin had the highest total cumulative awards for 1972 through 1974 (2.878 billion) (Table 7) as well as the highest yearly awards in 1972 (1.142 billion), 1973 (924 million), and 1974 (812 million) (Tables 8A thru 8C).

The per capita awards for each of the 19 United States drainage basins for

the years 1972 through 1974 were based on the 1971 population for these basins, since these populations were the latest available. The basin with the highest per capita awards in 1972 through 1974 was Alaska, with yearly per capita awards of \$44.59, \$65.68, and \$51.82 respectively. With the exception of Alaska, an area with special technical problems, the basins with highest per capita awards were as follows:

1972—Northeast (\$27.50) and Western Great Lakes (Lakes Michigan, Superior, and Huron) (\$24.00) (Table 8A).

1973—Northeast (\$22.26), the Great Basin in Utah and Nevada (\$20.29), and Hawaii (\$49.44) (Table 8B).

1974—Missouri (\$45.04), Hawaii (\$32.19) and North Atlantic (\$24.58) (Table 8C).

STATISTICAL VARIATIONS

Eighteen tables presenting data in different formats have been included in Appendix—A. Of special interest are Tables A-1 thru A-6 which show percentage changes in annual contract awards dollars per capita in constant and current dollars.

Tables A-7, A-8, and A-9 show the distribution of dollars from combination contract awards for 1972, 1973, and 1974 apportioned between SEWAGE TREATMENT and COLLECTING SEWERS in the same ratio.

Table A-10 is a combined 1972, 1973, and 1974 Contract Awards table by STATE showing average dollars and average per capita for SEWAGE TREATMENT COLLECTING SEWERS, and COMBINATIONS.

Table A-11 is similar to Table A-10 in that it shows cumulative dollars for 1972, 1973, 1974 and per capita which is based on the average of 1972, 1973, and 1974 population.

Table A-12 is similar to A-10 except that the data has been arranged by basin and the basin per capita is based on the 1971 population. Note that the *WESTERN GREAT LAKES line is an aggregate of Lakes Michigan, Huron, and Superior.

Tables A-13 thru A-18 show Contract Awards for 1972, 1973, and 1974 arranged by population size and dollar size groups for Sewage treatment, Collection Sewers and Combinations.

FEDERAL PARTICIPATION

The large increase in spending over the last five years reflects the impact of new environmental legislation and increased Federal aid in funding construction of sewage facilities (Figure 3). The Environmental Protection Agency Grant obligations increased from 214 million dollars in 1969 to 1.363 billion dollars in 1974, an increase of 537%. Before 1969, grant awards as a percentage of total spending was in the range of 7% to 14%. In 1972, the EPA percentage was 32 percent, in 1973, 91 percent, and in 1974, 33 percent.

Prior to 1973, EPA's Federal grant participation was in the range of 30-55% of the cost of each treatment facility constructed; with no provision for contributing to the cost of collecting sewers. The large influx of applicants observed in 1973 was probably due to more monies being made available for Municipal Waste Facilities Construction when new legislation (PL 92-500) changed EPA's participation rate to 75% and authorized, under certain circumstances, this aid for construction of collecting sewers.

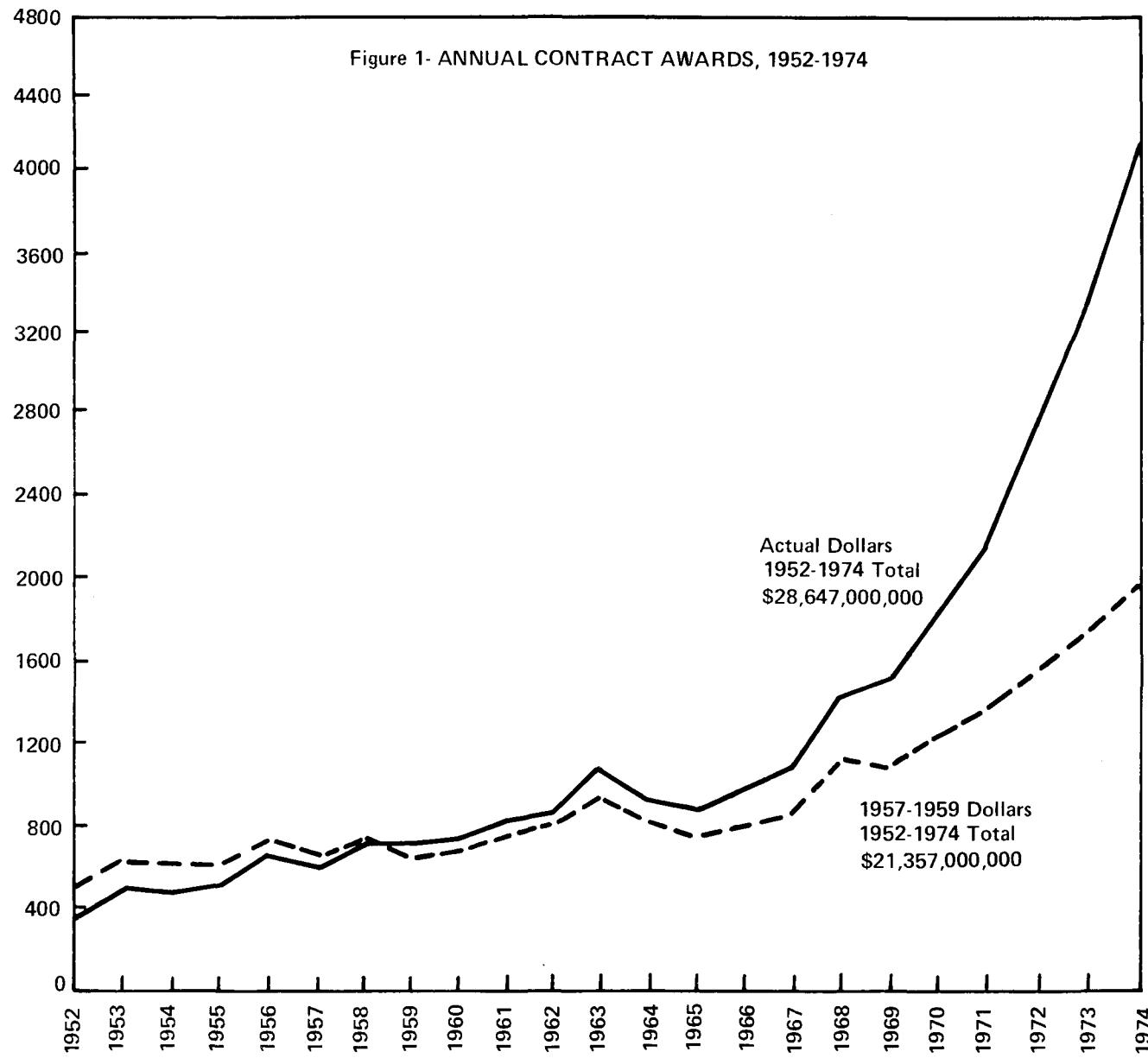


FIGURE 2
CONTRACT AWARD CATEGORIES
(Share of award dollars)



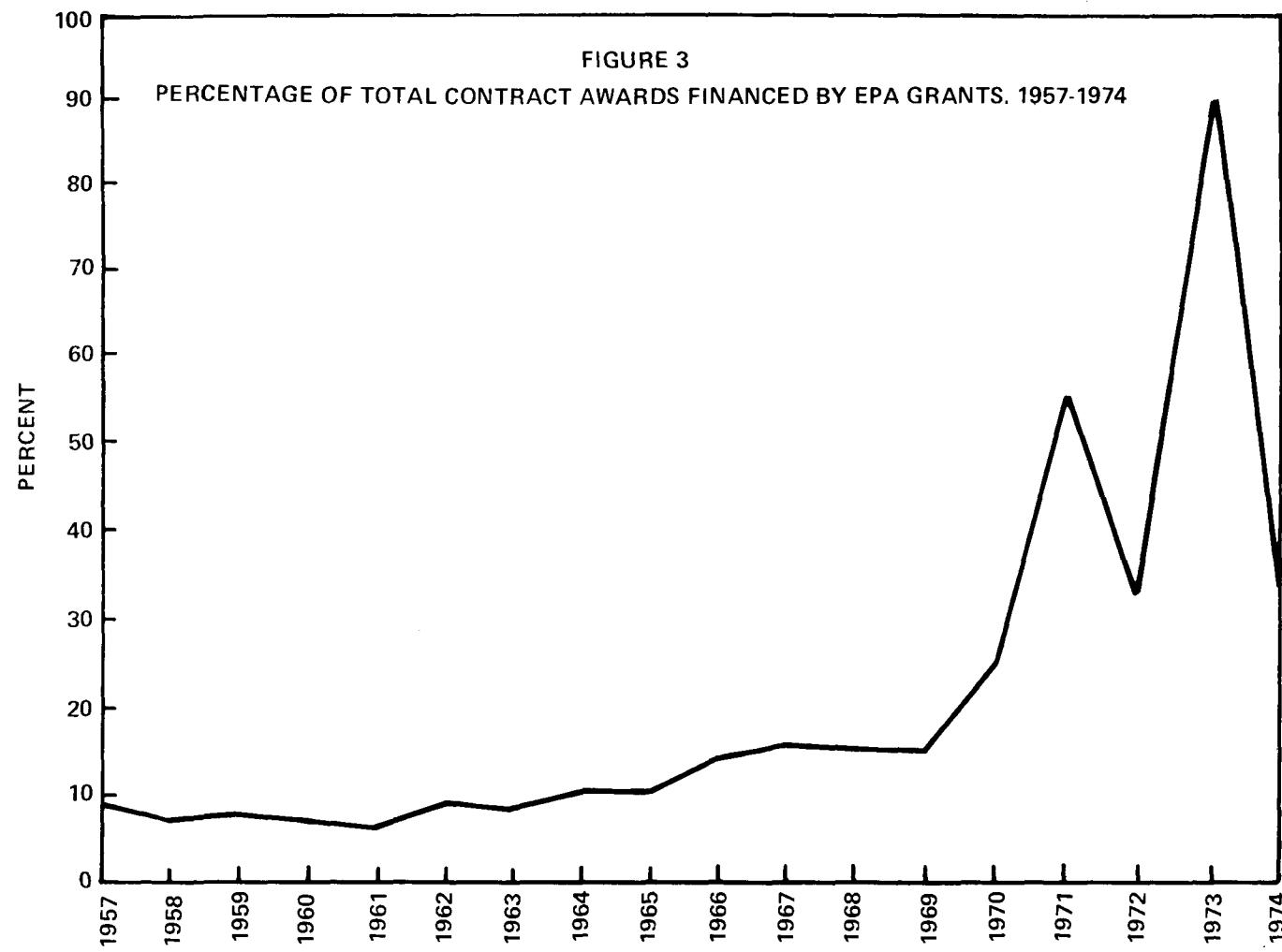


TABLE 1
Annual contract awards—1952–1974
(Millions of dollars)

Year	Sewage treatment		Collecting sewers		Total	
	Current	1957–1959	Current	1957–1959	Current	1957–1959
1952	137	178	225	296	362	474
1953	187	231	286	353	473	584
1954	229	276	244	294	473	570
1955	201	232	301	345	502	577
1956	354	385	305	331	659	716
1957	351	362	247	254	598	616
1958	389	385	310	310	699	695
1959	349	336	336	320	685	656
1960	359	339	359	339	718	678
1961	449	419	380	352	829	771
Sub-Total	3,005	3,143	2,993	3,194	5,998	6,337

NOTES:

1. Constant dollars on a 1957–1959 base were computed as follows: Sewers from PHS Sewer Construction Cost Index (PHS Publication 1132); sewage treatment from PHS Sewage Treatment Plant Construction Cost Index (PHS Publication 1069).

2. The Public Health Service sewage treatment data prior to 1957 are composed of identified contracts only. Beginning with 1957 the figures include an amount apportioned to sewage treatment works from the "combination" contracts.

3. Data on collecting sewers prior to 1957 are obtained by subtracting Public Health Service sewage treatment data from the U.S. Department of Commerce sewer data which includes sanitary and storm sewage systems as well as sewage treatment works. Beginning with 1957 the data for collecting sewers were assembled by the Public Health Service and do not include storm sewers.

Year	Sewage treatment		Collecting sewers		Total	
	Current	1957–1959	Current	1957–1959	Current	1957–1959
1962	545	505	320	291	865	796
1963	679	612	405	358	1,084	970
1964	514	459	396	244	910	803
1965	522	458	356	304	878	762
1966	553	469	399	330	952	799
1967	597	497	448	360	1,045	857
1968	867	694	582	449	1,449	1,143
1969	825	611	684	492	1,509	1,103
1970	1,085	755	738	493	1,823	1,248
1971	1,453	909	674	403	2,127	1,312
Sub-Total	7,640	5,969	5,002	3,724	12,642	9,793

Year	Sewage treatment		Collecting sewers		Total	
	Current	1957–1959	Current	1957–1959	Current	1957–1959
1972	2,016	1,172	747	402	2,763	1,574
1973	2,305	1,262	962	482	3,267	1,744
1974	2,904	1,421	1,073	488	3,977	1,909
Sub-Total	7,225	3,855	2,782	1,372	10,007	5,227
Grand Total	17,870	12,967	10,777	8,290	28,647	21,357

TABLE 2
Contract award trends, 1957-74

	1957	1958	1959	1960	1961	1962	1963	1964
Total number of awards ¹	3,521	4,208	4,320	4,542	4,733	4,794	5,307	5,301
Total award dollars (millions)	598	699	685	718	829	865	1,084	910
Total award dollars (millions, 1957-1959 base)	616	695	656	678	771	796	970	803
Award dollars per capita	3.47	3.99	3.84	3.96	4.50	4.62	5.73	4.73
Award dollars per capita (1957-1959 base)	3.57	3.97	3.68	3.74	4.19	4.25	5.13	4.17
Sewage treatment award dollars (millions)	351	389	349	359	449	545	679	514
New plant award dollars (millions) ²	130	128	95	97	101	117	216	144
Collecting sewers award dollars (millions)	247	310	336	359	380	320	405	396
Federal grant obligations (millions) ³	50	46	47	46	46	80	90	90
Federal grants, percentage of total	8	7	7	6	6	9	8	10

	1965	1966	1967	1968	1969	1970	1971	1972
Total number of awards ¹	5,211	5,202	5,278	5,622	6,258	5,140	5,210	5,321
Total award dollars (millions)	878	952	1,045	1,449	1,509	1,823	2,127	2,763
Total award dollars (millions, 1957-1959 base)	762	799	857	1,143	1,103	1,248	1,312	1,574
Award dollars per capita	4.52	4.85	5.25	7.20	7.43	8.89	10.33	13.27
Award dollars per capita (1957-1959 base)	3.92	4.07	4.31	5.68	5.43	6.09	6.37	7.56
Sewage treatment award dollars (millions)	522	553	597	867	825	1,085	1,453	2,016
New plant award dollars (millions) ²	125	145	133	194	234	277	364	460
Collecting sewers award dollars (millions)	356	399	448	582	684	738	674	747
Federal grant obligations (millions) ³	88	121	150	203	214	438	1,168	872
Federal grants, percentage of total	10	13	14	14	14	24	55	32

	1973	1974	Total
Total number of awards ¹	6,648	6,429	93,045
Total award dollars (millions)	3,267	3,977	26,178
Total award dollars (millions, 1957-1959 base)	1,744	1,909	18,436
Award dollars per capita	15.56	18.95	
Award dollars per capita (1957-1959 base)	8.31	9.11	
Sewage treatment award dollars (millions)	2,305	2,904	
New plant award dollars (millions) ²	626	970	
Collecting sewers award dollars (millions)	962	1,073	
Federal grant obligations (millions) ³	2,996	1,363	
Federal grants, percentage of total	91	33	

¹ Excludes combination contracts for 1957-1968.

² Included in "Sewage Treatment Award Dollars" above.

³ Federal obligations shown on fiscal year basis.

TABLE 3
Contract awards for 1972-1974

	1972	1973	1974
Award dollars (millions) -----	2,763	3,267	3,977
Percentage change from previous year -----	—	18%	22%
Award dollars (millions 1957-1959 dollar base) -----	1,574	1,744	1,909
Percentage change from previous year -----	—	11%	9.5%
U.S. population (Millions) -----	208	210	211
Percentage change from previous year -----	—	5%	5%
Per capita award dollars -----	13.27	15.56	18.95
Percentage change from previous year -----	—	17%	22%
Per capita award dollars (1957-1959 base) -----	7.57	8.30	9.11
Percentage change from previous year -----	—	10%	9.8%

TABLE 4
Contract awards for three 6 year periods 1957-74

	1957-1962	1963-1968	1969-1974
Average award dollars (millions) -----	732	1053	2578
Percentage change from prev. period -----	—	43.9 %	144.8 %
Average award dollars (millions, 1957-1959 base) -----	702	889	1482
Percentage change from prev. period -----	—	26.6 %	66.7 %
Average per capita award dollars -----	4.06	5.38	12.41
Percentage change from prev. period -----	—	32.5 %	130.7 %
Average per capita award dollars (1957-1959 base) -----	3.90	4.55	7.15
Percentage change from prev. period -----	—	16.7 %	57.1 %

TABLE 5A.

Contract awards by state—sewage treatment, collecting sewers & combinations—1972

STATE	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Alabama	32	16,971,767	4.79	14	10,379,133	2.93	15	3,698,109	1.04	3	2,894,525	.81
Alaska	22	13,379,792	40.54	5	2,777,934	8.41	13	6,491,657	19.67	4	4,110,201	12.45
Arizona	39	10,096,608	4.90	2	375,877	.18	32	8,881,749	4.31	5	838,982	.40
Arkansas	39	9,582,374	4.70	13	3,159,503	1.55	15	3,523,171	1.72	11	2,899,700	1.42
California	277	68,271,938	3.31	30	33,560,191	1.62	222	24,745,368	1.20	25	9,965,779	.48
Colorado	40	8,593,019	3.52	13	3,387,235	1.38	18	2,704,156	1.10	9	2,501,628	1.02
Connecticut	114	56,810,121	18.46	14	24,399,135	7.93	94	27,677,964	8.99	6	4,733,022	1.53
Delaware	10	10,446,992	18.13	2	8,774,752	15.23	8	1,672,240	2.90	0	0	.00
District of Columbia	4	16,826,194	22.55	4	16,826,194	22.55	0	0	.00	0	0	.00
Florida	161	66,271,376	8.63	36	24,615,043	3.20	98	27,364,082	3.56	27	14,292,251	1.86
Georgia	117	81,364,697	17.00	52	62,242,922	13.00	43	10,947,502	2.28	22	8,174,273	1.70
Hawaii	7	912,000	1.09	5	194,000	.23	0	0	.00	2	718,000	.86
Idaho	10	5,596,012	7.26	3	5,038,212	6.54	6	532,657	.69	1	25,143	.03
Illinois	228	142,612,786	12.69	85	101,332,225	9.01	121	23,820,618	2.12	22	17,459,943	1.55
Indiana	119	46,700,653	8.78	47	32,927,065	6.19	64	10,026,808	1.88	8	3,746,780	.70
Iowa	136	27,360,902	9.42	34	16,325,968	5.62	85	8,145,350	2.80	17	2,889,584	.99
Kansas	122	13,231,635	5.80	23	6,595,412	2.89	91	5,576,366	2.44	8	1,059,851	.46
Kentucky	58	71,996,649	21.54	16	64,397,233	19.26	34	5,999,231	1.79	8	1,600,185	.47
Louisiana	69	9,999,169	2.65	7	731,474	.19	52	8,108,466	2.15	10	1,159,229	.30
Maine	43	19,933,438	19.39	13	12,898,042	12.54	19	1,676,541	1.63	11	5,358,855	5.21
Maryland	295	39,328,913	9.66	16	12,418,698	3.05	207	19,770,438	4.85	72	7,139,777	1.75
Massachusetts	129	34,765,889	5.97	20	11,008,830	1.89	91	19,281,258	3.31	18	4,475,801	.76
Michigan	305	240,937,340	26.64	71	158,915,153	17.57	189	61,368,624	6.78	45	20,653,563	2.28
Minnesota	247	50,807,147	13.03	23	14,579,846	3.74	138	22,893,745	5.87	86	13,333,556	3.42
Mississippi	50	13,089,449	5.73	10	2,629,627	1.15	27	6,154,429	2.69	13	4,305,393	1.88
Missouri	116	21,364,185	4.49	26	11,602,901	2.43	81	8,409,950	1.76	9	1,351,334	.28
Montana	8	923,570	1.28	1	73,202	.10	4	485,972	.67	3	364,396	.50
Nebraska	136	15,953,042	10.34	28	9,936,307	6.44	91	5,011,323	3.24	17	1,005,412	.65
Nevada	6	933,619	1.70	2	882,040	1.60	4	51,579	.09	0	0	.00
New Hampshire	27	24,007,667	30.35	14	17,753,451	22.44	11	928,009	1.17	2	5,326,207	6.73
New Jersey	159	48,723,164	6.61	35	21,119,250	2.86	105	19,971,705	2.71	19	7,632,209	1.03
New Mexico	16	7,416,449	6.70	8	5,495,414	4.96	6	923,427	.83	2	997,608	.90
New York	263	962,748,817	52.71	49	747,231,362	40.91	178	78,114,462	4.27	36	137,402,993	7.52
North Carolina	108	44,086,803	8.36	34	29,722,478	5.63	44	7,400,292	4.40	30	6,964,033	1.32
North Dakota	42	6,482,382	10.12	4	2,890,673	4.51	18	1,819,544	2.84	20	1,772,165	2.76
Ohio	221	65,781,692	6.13	38	30,306,637	2.82	161	21,344,093	1.98	22	14,130,962	1.31
Oklahoma	63	15,788,056	5.92	8	6,096,739	2.28	38	6,165,097	2.31	17	3,526,220	1.32
Oregon	80	26,479,973	11.90	15	18,966,742	8.52	56	6,276,782	2.82	9	1,236,449	.55
Pennsylvania	270	116,444,380	9.78	67	50,810,275	4.26	190	53,664,775	4.50	13	11,969,330	1.00
Rhode Island	16	4,091,259	4.20	2	647,720	.66	12	3,068,903	3.15	2	374,636	.38
South Carolina	47	25,721,159	9.43	14	10,839,906	3.97	23	7,911,964	2.90	10	6,969,289	2.55
South Dakota	26	2,276,219	3.32	3	99,519	.14	10	846,820	1.23	13	1,329,880	1.94
Tennessee	86	39,140,438	9.48	11	11,427,116	2.76	58	12,495,006	3.02	17	15,218,316	3.68
Texas	341	98,860,324	8.38	69	49,568,310	4.20	194	31,259,202	2.65	78	18,032,812	1.52
Utah	6	1,266,633	1.09	3	449,634	.38	1	245,085	.21	2	571,914	.49
Vermont	21	9,370,375	20.19	12	7,182,647	15.47	7	1,888,374	4.06	2	299,454	.64
Virginia	114	24,120,802	5.01	31	14,402,235	2.99	69	6,608,259	1.37	14	3,110,308	.64
Washington	118	44,303,677	12.92	33	20,716,832	6.04	77	20,314,783	5.92	8	3,272,062	.95
West Virginia	9	1,545,916	.86	4	1,018,618	.56	5	527,298	.29	0	0	.00
Wisconsin	344	77,549,205	16.97	62	52,850,856	11.56	225	19,790,432	4.33	57	4,907,917	1.07
Wyoming	5	2,178,232	6.17	1	704,408	1.99	0	0	.00	4	1,473,824	4.17
TOTALS	5,321	2,763,444,898	13.16	1,132	1,753,285,482	8.35	3,350	626,583,665	2.98	839	383,575,751	1.82

PERCENTAGE OF TOTAL

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63.44%

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22.67%

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13.88%

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TABLE 5B.

Contract awards by state—sewage treatment, collecting sewers & combinations—1973

STATE	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Alabama	69	21,606,768	6.10	13	4,882,998	1.37	35	10,882,556	3.07	21	5,841,214	1.65
Alaska	16	19,706,675	59.71	4	12,652,977	38.34	7	4,995,728	15.13	5	2,057,970	6.23
Arizona	60	28,881,164	14.03	6	15,531,814	7.54	43	8,386,098	4.07	11	4,963,252	2.41
Arkansas	48	18,122,253	8.89	9	3,571,854	1.75	18	6,909,160	3.39	21	7,641,239	3.75
California	418	225,589,282	10.95	94	148,562,424	7.21	246	35,686,171	1.73	78	41,340,687	2.00
Colorado	62	18,143,742	7.44	26	10,178,027	4.17	14	1,073,357	.44	22	6,892,358	2.82
Connecticut	164	85,445,278	27.77	21	47,780,876	15.53	119	27,911,188	9.07	24	9,753,214	3.17
Delaware	27	9,733,342	16.89	3	506,207	.87	17	6,074,222	10.54	7	3,152,913	5.47
District of Columbia	7	7,128,602	9.55	1	1,329,400	1.78	3	3,115,820	4.17	3	2,683,382	3.59
Florida	224	128,101,602	16.68	71	42,043,855	5.47	105	69,813,351	9.09	48	16,244,396	2.11
Georgia	130	78,505,799	16.40	51	41,295,720	8.62	40	16,865,213	3.52	39	20,344,866	4.25
Hawaii	19	39,555,000	47.54	6	32,021,000	38.48	12	7,291,000	8.76	1	243,000	.29
Idaho	15	12,836,148	16.67	8	9,944,266	12.91	3	729,455	.94	4	2,162,427	2.80
Illinois	295	172,369,607	15.34	109	124,992,433	11.12	138	26,045,524	2.31	48	21,331,650	1.89
Indiana	137	66,268,380	12.46	50	45,287,686	8.51	74	14,572,341	2.74	13	6,408,353	1.20
Iowa	160	28,370,277	9.78	33	11,704,289	4.03	95	12,772,703	4.39	32	3,893,285	1.34
Kansas	109	8,590,745	3.76	8	328,027	.14	87	6,338,343	2.78	14	1,924,375	.84
Kentucky	80	16,998,382	5.08	21	5,504,978	1.64	46	8,914,401	2.66	13	2,579,003	.77
Louisiana	115	50,181,372	13.33	12	32,111,957	8.53	51	10,904,192	2.89	52	7,165,223	1.90
Maine	39	37,469,810	36.44	17	24,400,181	23.73	9	1,698,846	1.65	13	11,370,783	11.06
Maryland	356	133,561,951	32.81	35	85,988,993	21.12	113	27,015,522	6.63	208	20,557,436	5.05
Massachusetts	192	180,675,051	31.05	52	145,860,836	25.07	114	19,170,109	3.29	26	15,644,106	2.68
Michigan	286	60,684,476	6.70	28	13,171,917	1.45	169	27,122,538	2.99	89	20,390,021	2.25
Minnesota	326	56,692,427	14.54	27	12,510,673	3.21	99	13,008,927	3.33	200	31,172,827	7.99
Mississippi	42	32,409,771	14.20	13	14,827,459	6.50	15	2,467,594	1.08	14	15,114,718	6.62
Missouri	141	40,175,975	8.44	31	23,926,593	5.02	83	9,674,833	2.03	27	6,574,549	1.38
Montana	9	11,601,592	16.09	6	10,967,992	15.21	1	96,022	.13	2	537,578	.74
Nebraska	153	15,717,772	10.19	24	5,964,632	3.86	91	6,243,049	4.04	38	3,510,091	2.27
Nevada	14	9,295,674	16.96	3	1,860,871	3.39	7	5,523,531	10.07	4	1,911,272	3.48
New Hampshire	8	23,093,938	29.19	3	22,178,685	28.03	5	915,253	1.15	0	0	.00
New Jersey	190	60,703,614	8.24	55	26,484,480	3.59	104	25,854,232	3.51	31	8,364,902	1.13
New Mexico	15	16,918,644	15.29	7	14,780,203	13.36	5	503,906	.45	3	1,634,535	1.47
New York	329	526,210,996	28.80	53	342,751,061	18.76	200	74,849,238	4.09	76	108,610,697	5.94
North Carolina	88	33,673,840	6.38	24	22,714,952	4.30	32	3,177,674	.60	32	7,781,214	1.47
North Dakota	64	5,657,239	8.83	9	1,024,466	1.60	18	1,051,388	1.64	37	3,581,385	5.59
Ohio	343	214,864,039	20.02	77	149,037,670	13.88	206	43,532,345	4.05	60	22,294,024	2.07
Oklahoma	67	15,833,666	5.94	14	9,230,089	3.46	33	3,331,716	1.25	20	3,271,861	1.22
Oregon	62	33,397,822	15.01	16	14,676,860	6.59	35	14,113,395	6.34	11	4,607,567	2.07
Pennsylvania	343	155,604,324	13.07	86	70,682,630	5.93	188	29,622,089	2.48	69	55,299,605	4.64
Rhode Island	28	24,039,010	24.70	6	9,284,028	9.54	14	10,367,609	10.65	8	4,387,373	4.50
South Carolina	45	26,896,988	9.86	17	9,389,080	3.44	21	11,829,780	4.33	7	5,678,128	2.08
South Dakota	31	5,055,734	7.38	4	1,069,103	1.56	18	671,460	.98	9	3,315,171	4.83
Tennessee	147	72,270,885	17.51	27	34,642,853	8.39	86	28,211,916	6.83	34	9,416,116	2.28
Texas	432	146,385,432	12.41	97	67,531,545	5.72	145	29,053,168	2.46	190	49,800,719	4.22
Utah	24	8,705,160	7.52	0	0	0	5	502,485	.43	19	8,202,675	7.08
Vermont	11	5,000,594	10.77	4	3,710,400	7.99	3	536,995	1.15	4	753,199	1.62
Virginia	200	137,585,899	28.59	46	96,337,637	20.02	102	24,637,487	5.12	52	16,610,775	3.45
Washington	97	37,305,441	10.87	27	17,510,391	5.10	49	12,569,543	3.66	21	7,225,507	2.10
West Virginia	16	6,807,600	3.79	7	4,412,286	2.45	6	1,445,640	.80	3	949,674	.52
Wisconsin	392	96,383,556	21.09	29	46,904,620	10.26	202	27,525,848	6.02	161	21,953,088	4.80
Wyoming	3	426,161	1.20	2	346,479	.98	1	79,682	.22	0	0	.00
TOTALS	6,648	3,267,239,499	15.56	1,392	1,894,410,453	9.02	3,332	735,684,643	3.50	1,924	637,144,403	3.03

PERCENTAGE OF TOTAL

57.98%

22.51%

19.50%

TABLE 5C.

Contract awards by state—Sewage treatment, collecting sewers & combinations—1974

STATE	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Alabama	59	27,624,065	7.80	13	16,748,207	4.73	32	3,765,439	1.06	14	7,110,419	2.00
Alaska	16	15,547,604	47.11	2	1,183,799	3.58	9	2,721,813	8.24	5	11,641,992	35.27
Arizona	46	24,567,190	11.93	10	18,607,421	9.04	31	4,903,588	2.38	5	1,056,181	.51
Arkansas	61	27,440,554	13.47	16	13,657,634	6.70	20	8,428,094	4.13	25	5,354,826	2.62
California	437	312,006,890	15.14	132	252,553,726	12.25	248	43,870,364	2.12	57	15,582,800	.75
Colorado	65	54,202,088	22.24	29	42,222,120	17.32	16	3,454,723	1.41	20	8,525,245	3.49
Connecticut	137	57,908,924	18.82	14	9,436,056	3.06	112	42,201,041	13.71	11	6,271,827	2.03
Delaware	25	11,413,620	19.81	3	2,427,470	4.21	16	2,810,988	4.88	6	6,175,162	10.72
District of Columbia	6	85,493,813	114.60	3	82,022,700	109.95	2	3,167,123	4.24	1	303,990	.40
Florida	226	246,629,573	32.12	59	139,241,103	18.13	101	71,814,839	9.35	66	35,573,631	4.63
Georgia	115	68,081,725	14.22	48	40,107,102	8.38	40	19,122,634	3.99	27	8,851,989	1.84
Hawaii	16	25,754,000	30.95	9	21,221,000	25.50	5	704,000	.84	2	3,829,000	4.60
Idaho	18	12,075,015	15.68	13	10,562,297	13.71	2	684,218	.88	3	828,500	1.07
Illinois	261	174,840,298	15.56	85	124,766,036	11.10	129	37,328,942	3.32	47	12,745,320	1.13
Indiana	113	76,724,752	14.43	24	41,869,176	7.87	68	18,942,215	3.56	21	15,913,361	2.99
Iowa	168	77,949,553	26.84	42	60,382,306	20.79	102	14,931,235	5.14	24	2,636,012	.90
Kansas	135	23,734,849	10.41	21	15,345,319	6.73	99	7,220,943	3.16	15	1,168,587	.51
Kentucky	86	55,231,896	16.52	26	32,838,931	9.82	53	21,038,620	6.29	7	1,354,345	.40
Louisiana	130	64,893,462	17.24	27	30,383,715	8.07	59	17,582,498	4.67	44	16,927,249	4.49
Maine	50	26,159,600	25.44	14	20,000,893	19.45	28	3,176,142	3.08	8	2,982,565	2.90
Maryland	285	87,416,164	21.47	22	28,336,424	6.96	120	33,608,698	8.25	143	25,471,042	6.25
Massachusetts	163	100,007,109	17.18	42	69,695,633	11.97	92	18,272,960	3.14	29	12,038,516	2.06
Michigan	284	235,206,312	26.00	47	170,047,725	18.80	159	41,200,961	4.55	78	23,957,626	2.64
Minnesota	307	157,784,174	40.48	18	78,072,518	20.03	71	12,059,402	3.09	218	67,652,254	17.36
Mississippi	47	11,219,786	4.91	13	4,290,902	1.88	17	1,651,104	.72	17	5,277,780	2.31
Missouri	136	59,499,896	12.50	32	42,090,280	8.84	82	11,481,809	2.41	22	5,927,807	1.24
Montana	18	7,437,131	24.18	5	16,038,110	22.24	9	999,498	1.38	4	399,523	.55
Nebraska	146	53,753,496	34.85	34	44,885,589	29.10	82	6,392,148	4.14	30	2,475,759	1.60
Nevada	15	2,594,354	4.73	3	1,358,582	2.47	9	922,150	1.68	3	313,622	.57
New Hampshire	22	16,914,331	21.38	10	11,991,760	15.16	8	1,883,552	2.38	4	3,039,019	3.84
New Jersey	217	354,564,060	48.16	74	281,863,970	38.29	116	56,233,909	7.63	27	16,466,181	2.23
New Mexico	12	1,777,879	1.60	5	376,011	.33	1	10,850	.00	6	1,391,018	1.25
New York	308	251,829,436	13.78	43	114,688,152	6.27	205	98,267,075	5.38	60	38,874,209	2.12
North Carolina	108	70,273,026	13.32	35	50,859,908	9.64	44	8,153,444	1.54	29	11,259,674	2.13
North Dakota	60	6,183,993	9.66	4	407,433	.63	12	809,786	1.26	44	4,966,774	7.76
Ohio	318	194,448,754	18.12	56	142,154,396	13.24	218	43,850,915	4.08	44	8,443,443	.78
Oklahoma	76	31,856,722	11.96	9	16,963,594	6.37	49	9,939,755	3.73	18	4,953,373	1.86
Oregon	81	49,447,004	22.22	22	33,448,702	15.03	46	9,589,076	4.30	13	6,409,226	2.88
Pennsylvania	333	187,169,174	15.72	91	111,103,106	9.33	185	44,865,955	3.76	57	31,200,113	2.62
Rhode Island	21	17,762,473	18.25	2	3,138,321	3.22	14	3,647,810	3.74	5	10,976,342	11.28
South Carolina	47	35,046,284	12.85	8	19,865,356	7.28	22	7,124,633	2.61	17	8,056,295	2.95
South Dakota	43	3,797,310	5.54	4	1,360,822	1.98	18	361,030	.52	21	2,075,458	3.02
Tennessee	106	62,596,216	15.17	18	20,700,484	5.01	61	20,273,214	4.91	27	21,622,518	5.24
Texas	373	180,674,948	15.31	73	81,944,987	6.94	151	46,156,580	3.91	149	52,573,381	4.45
Utah	6	4,443,407	3.84	2	1,736,685	1.50	1	1,153,968	.99	3	1,552,754	1.34
Vermont	9	4,247,491	9.15	2	1,997,000	4.30	5	1,712,316	3.69	2	538,175	1.15
Virginia	212	147,971,097	30.75	62	105,680,050	21.96	106	27,554,573	5.72	44	14,736,474	3.06
Washington	105	54,074,934	15.76	32	30,164,648	8.79	43	12,180,573	3.55	30	11,729,713	3.42
West Virginia	23	10,484,819	5.84	7	4,948,337	2.75	12	4,568,558	2.54	4	967,924	.53
Wisconsin	375	94,232,334	20.62	37	50,948,302	11.15	189	32,730,436	7.16	149	10,553,596	2.30
Wyoming	3	3,746,645	10.61	1	3,289,700	9.31	1	74,308	.21	1	382,637	1.08
TOTALS	6,429	3,976,740,230	18.95	1,403	2,520,024,498	12.00	3,320	885,600,505	4.22	1,706	571,115,227	2.72

PERCENTAGE OF TOTAL

-- -- -- -- -- 63.36% 22.26% -- -- -- 14.36% --

TABLE 6

Contract awards by basin, 1957-74*

Basin	1957	1958	1959	1960	1961	1962	1963	1964	1965	1966	1967	1968	1969	1970	1971	Sub Total	1972	1973	1974	Sub Total	Grand Total	
Northeast	10	35	20	23	14	38	60	37	66	66	81	182	266	280	426	1,604	829	614	504	1,947	3,551	
North Atlantic	59	63	50	70	68	77	116	87	48	58	99	100	59	109	94	1,157	97	190	292	579	1,736	
Southeast	22	31	35	32	30	35	57	53	56	47	60	76	69	73	118	788	142	167	273	582	1,370	
Tennessee River	4	7	6	6	5	3	6	11	11	6	9	14	11	10	10	119	4	29	16	49	168	
Ohio River	54	57	62	47	60	55	58	48	56	41	46	87	38	62	117	888	117	175	206	498	1,386	
Lake Erie	14	7	7	9	10	5	12	11	14	10	17	20	26	26	35	223	29	56	156	241	464	
Upper Mississippi	36	37	47	28	28	42	85	40	67	74	75	85	79	104	128	955	142	147	249	538	1,493	
Western Great Lakes	14	22	22	21	28	74	34	30	24	42	16	47	80	129	163	746	202	79	146	427	1,173	
Missouri River	11	14	13	17	28	22	22	41	26	32	19	36	19	12	16	328	37	40	155	232	560	
Southwest-Lower Mississippi	16	23	14	18	18	4	48	28	15	28	29	30	33	35	36	375	19	63	70	152	527	
Colorado River	4	4	3	4	3	16	12	7	6	6	6	6	6	15	6	<1	98	2	22	21	45	143
Western Gulf	9	18	9	16	11	30	19	21	22	18	18	23	28	31	22	295	51	75	80	206	501	
Pacific Northwest	8	11	9	9	17	51	39	20	27	22	19	17	15	16	48	328	45	44	74	163	491	
California	59	28	25	23	55	2	18	15	28	54	36	39	31	58	88	559	33	145	250	428	987	
Great Basin	8	2	3	5	3	<1	7	6	4	8	12	6	2	4	—	8	3	26	3	13	12	85
Alaska	—	—	—	1	2	1	3	8	5	3	5	4	3	5	<1	—	40	<1	32	21	53	93
TOTALS	328	359	326	331	381	463	595	461	474	517	546	775	776	963	1,307	8,602	1,754	1,896	2,519	6,169	14,771	

* Sewage treatment facilities only.

TABLE 7.

Cumulative contract awards by basin—sewage treatment, collecting sewers & combinations—1972-1973-1974

Drainage Basin	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per** capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Northeast	2,478	2,877,698,696	69.34	499	1,947,004,248	46.91	1,594	522,946,416	12.60	385	407,748,032	9.82
North Atlantic	2,229	1,038,401,155	54.36	417	578,481,437	30.28	1,132	270,170,064	14.14	680	189,749,654	9.93
Southeast	1,665	1,046,215,345	41.51	529	581,633,326	23.08	721	281,980,297	11.18	415	182,601,722	7.24
Tennessee River	166	95,961,443	29.98	40	49,455,734	15.45	86	27,741,125	8.66	40	18,764,584	5.86
Ohio River	1,533	777,514,163	38.11	392	497,686,514	24.39	935	193,231,755	9.47	206	86,595,894	4.24
Lake Erie	706	372,508,823	39.21	126	241,455,229	25.41	449	87,803,291	9.24	131	43,250,303	4.55
Upper Mississippi	2,591	895,458,864	48.40	505	539,122,468	29.14	1,183	188,404,811	10.18	903	167,931,585	9.07
*Western Great Lakes	1,400	694,664,880	55.13	205	426,875,948	33.87	828	163,347,156	12.96	367	104,441,776	8.28
Lake Michigan	1,207	526,609,236	.00	172	325,861,120	.00	728	138,305,508	.00	307	62,442,608	.00
Lake Huron	142	111,236,781	.00	22	71,087,349	.00	77	23,421,678	.00	43	16,727,754	.00
Lake Superior	51	56,818,863	.00	11	29,927,479	.00	23	1,619,970	.00	17	25,271,414	.00
Missouri River	1,224	336,948,934	78.36	253	232,192,997	53.99	699	64,284,530	14.94	272	40,471,407	9.41
South Central Lower Mississippi	1,191	331,377,711	27.16	218	151,398,830	12.40	666	105,629,884	8.65	307	74,348,997	6.09
Colorado River	227	82,086,811	35.68	47	44,274,166	19.24	137	24,696,533	10.73	43	13,116,112	5.70
Western Gulf	1,119	435,385,654	39.22	229	205,593,909	18.52	479	106,570,361	9.60	411	123,221,384	11.10
Pacific Northwest	592	277,715,341	43.39	170	162,548,774	25.39	320	76,912,621	12.01	102	38,253,946	5.97
California	1,066	586,968,694	43.80	238	428,000,979	31.94	681	98,145,241	7.32	147	60,822,474	4.53
Great Basin	115	43,663,042	33.58	28	11,945,164	9.18	46	13,800,530	10.61	41	17,917,348	13.78
Alaska	54	48,634,071	162.11	11	16,614,710	55.38	29	14,209,198	47.36	14	17,810,163	59.36
Hawaii	42	66,221,000	82.77	20	53,436,000	66.79	17	7,995,000	9.99	5	4,790,000	5.98
TOTALS	18,398	10,007,424,627	49.51	3,927	6,167,720,433	30.51	10,002	2,247,868,813	11.12	4,469	1,591,835,381	7.87

PERCENTAGE OF TOTAL

61.63%

22.46%

15.90%

*Aggregate of Lakes Michigan, Huron, & Superior.

**Based on 1971 basin population.

TABLE 8A.

Contract awards by basin—sewage treatment, collecting sewers & combinations—1972

Drainage Basin	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per** capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Northeast -----	710	1,141,593,522	27.50	138	828,925,741	19.97	489	149,145,328	3.59	83	163,522,453	3.94
North Atlantic -----	635	194,908,490	10.20	103	96,755,199	5.06	426	77,318,462	4.04	106	20,834,829	1.09
Southeast -----	503	244,032,950	9.68	165	142,133,035	5.64	237	59,293,125	2.35	101	42,606,790	1.69
Tennessee River -----	41	19,364,925	6.05	8	4,495,707	1.40	22	10,158,502	3.17	11	4,710,716	1.47
Ohio River -----	399	177,731,960	8.71	105	117,070,927	5.73	262	36,307,742	1.77	32	24,353,291	1.19
Lake Erie -----	161	55,963,017	5.89	32	28,876,085	3.03	108	16,699,675	1.75	21	10,387,257	1.09
Upper Mississippi -----	753	228,587,799	12.35	173	142,144,338	7.68	417	57,030,320	3.08	163	29,413,141	1.58
*Western Great Lakes -----	502	302,468,139	24.00	102	202,229,197	16.04	334	72,419,265	5.74	66	27,819,677	2.20
Lake Michigan -----	486	276,213,662	.00	98	179,886,597	.00	327	71,575,044	.00	61	24,752,021	.00
Lake Huron -----	15	26,234,879	.00	4	22,342,600	.00	6	824,623	.00	5	3,067,656	.00
Lake Superior -----	1	19,598	.00	0	0	.00	1	19,598	.00	0	0	.00
Missouri River -----	369	67,697,580	15.74	72	37,193,108	8.64	233	21,777,505	5.06	64	8,726,967	2.02
South Central Lower Mississippi -----	337	56,392,608	4.62	67	18,548,614	1.52	217	27,062,922	2.21	53	10,781,072	.88
Colorado River -----	55	13,519,111	5.87	5	1,524,351	.66	40	9,374,677	4.07	10	2,620,083	1.13
Western Gulf -----	330	99,741,934	8.98	66	50,867,403	4.58	187	30,994,962	2.79	77	17,879,569	1.61
Pacific Northwest -----	212	76,842,927	12.00	52	44,794,988	6.99	142	27,519,070	4.29	18	4,528,869	.70
California -----	258	62,203,176	4.64	27	32,539,208	2.42	208	22,123,044	1.65	23	7,540,924	.56
Great Basin -----	27	8,104,968	6.23	7	2,215,647	1.70	15	2,867,409	2.20	5	3,021,912	2.32
Alaska -----	22	13,379,792	44.59	5	2,777,934	9.25	13	6,491,657	21.63	4	4,110,201	13.70
Hawaii -----	7	912,000	1.14	5	194,000	.24	0	0	.00	2	718,000	.89
TOTALS -----	5,321	2,763,444,898	13.67	1,132	1,753,285,482	8.67	3,350	626,583,665	3.10	839	383,575,751	1.89

PERCENTAGE OF TOTAL ----- ----- ----- 63.44% ----- -----

22.67% ----- ----- 13.88% -----

*Aggregate of Lakes Michigan, Huron, & Superior.

**Based on 1971 basin population.

TABLE 8B.

Contract awards by basin—sewage treatment, collecting sewers & combinations—1973

Drainage Basin	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per ** capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Northeast	887	923,867,543	22.26	179	613,768,142	14.78	543	155,763,884	3.75	165	154,335,517	3.71
North Atlantic	843	373,846,620	19.57	160	189,679,886	9.93	349	87,809,849	4.59	334	96,356,885	5.04
Southeast	576	344,526,710	13.67	186	166,565,795	6.60	238	111,543,802	4.42	152	66,417,113	2.63
Tennessee River	74	46,336,963	14.48	19	28,705,090	8.97	36	12,462,259	3.89	19	5,169,614	1.61
Ohio River	598	276,125,760	13.53	158	174,521,270	8.55	344	66,460,101	3.25	96	35,144,389	1.72
Lake Erie	258	105,128,254	11.06	41	56,205,861	5.91	166	31,608,313	3.32	51	17,314,080	1.82
Upper Mississippi	953	278,914,829	15.07	174	147,589,269	7.97	407	68,485,777	3.70	372	62,839,783	3.39
*Western Great Lakes	469	140,204,948	11.12	52	78,986,733	6.26	255	31,863,878	2.52	162	29,354,337	2.32
Lake Michigan	379	117,588,195	.00	41	74,426,342	.00	205	22,188,924	.00	133	20,972,929	.00
Lake Huron	64	17,131,478	.00	6	2,220,500	.00	39	9,242,906	.00	19	5,668,072	.00
Lake Superior	26	5,485,275	.00	5	2,339,891	.00	11	432,048	.00	10	2,713,336	.00
Missouri River	408	75,557,230	17.57	80	39,855,561	9.26	230	18,977,875	4.41	98	16,723,794	3.88
South Central Lower Mississippi	406	122,284,321	10.02	68	63,114,928	5.17	214	31,739,981	2.60	124	27,429,412	2.24
Colorado River	91	38,619,487	16.79	21	21,643,930	9.41	50	8,790,221	3.82	20	8,185,336	3.55
Western Gulf	427	154,492,584	13.91	95	74,620,995	6.72	143	29,586,014	2.66	189	50,285,575	4.53
Pacific Northwest	174	85,037,988	13.28	52	43,924,431	6.86	85	26,738,556	4.17	37	14,375,001	2.24
California	389	216,656,816	16.16	84	145,565,705	10.86	233	32,819,874	2.44	72	38,271,237	2.85
Great Basin	60	26,377,771	20.29	13	4,988,880	3.83	20	8,747,531	6.72	27	12,641,360	9.72
Alaska	16	19,706,675	65.68	4	12,652,977	42.17	7	4,995,728	16.65	5	2,057,970	6.85
Hawaii	19	39,555,000	49.44	6	32,021,000	40.02	12	7,291,000	9.11	1	243,000	.30
TOTALS	6,648	3,267,239,499	16.16	1,392	1,894,410,453	9.37	3,332	735,684,643	3.64	1,924	637,144,403	3.15

PERCENTAGE OF TOTAL

57.98%

22.51%

19.50%

*Aggregate of Lakes Michigan, Huron, & Superior.

**Based on 1971 basin population.

TABLE 8C.

Contract awards by basin—sewage treatment, collecting sewers & combinations—1974

Drainage Basin	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per ** capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Northeast -----	881	812,237,631	19.57	182	504,310,365	12.15	562	218,037,204	5.25	137	89,890,062	2.16
North Atlantic -----	751	469,646,045	24.58	154	292,046,352	15.29	357	105,041,753	5.49	240	72,557,940	3.79
Southeast -----	586	457,655,685	18.16	178	272,934,496	10.83	246	111,143,370	4.41	162	73,577,819	2.91
Tennessee River -----	51	30,259,555	9.45	13	16,254,937	5.07	28	5,120,364	1.60	10	8,884,254	2.77
Ohio River -----	536	323,656,443	15.86	129	206,094,317	10.10	329	90,463,912	4.43	78	27,098,214	1.32
Lake Erie -----	287	211,417,552	22.25	53	156,373,283	16.46	175	39,495,303	4.15	59	15,548,966	1.63
Upper Mississippi -----	885	387,956,236	20.97	158	249,388,861	13.48	359	62,888,714	3.39	368	75,678,661	4.09
*Western Great Lakes -----	429	251,991,793	19.99	51	145,660,018	11.56	239	59,064,013	4.68	139	47,267,762	3.75
Lake Michigan -----	342	132,807,379	.00	33	71,548,181	.00	196	44,541,540	.00	113	16,717,658	.00
Lake Huron -----	63	67,870,424	.00	12	46,524,249	.00	32	13,354,149	.00	19	7,992,026	.00
Lake Superior -----	24	51,313,990	.00	6	27,587,588	.00	11	1,168,324	.00	7	22,558,078	.00
Missouri River -----	447	193,694,124	45.04	101	155,144,328	36.08	236	23,529,150	5.47	110	15,020,646	3.49
South Central Lower Mississippi -----	448	152,700,782	12.51	83	69,735,288	5.71	235	46,826,981	3.83	130	36,138,513	2.96
Colorado River -----	81	29,948,213	13.02	21	21,105,885	9.17	47	6,531,635	2.83	13	2,310,693	1.00
Western Gulf -----	362	181,151,136	16.31	68	80,105,511	7.21	149	45,989,385	4.14	145	55,056,240	4.96
Pacific Northwest -----	206	115,834,426	18.09	66	73,829,355	11.53	93	22,654,995	3.53	47	19,350,076	3.02
California -----	419	308,108,702	22.99	127	249,896,066	18.64	240	43,202,323	3.22	52	15,010,313	1.12
Great Basin -----	28	9,180,303	7.06	8	4,740,637	3.64	11	2,185,590	1.68	9	2,254,076	1.73
Alaska -----	16	15,547,604	51.82	2	1,183,799	3.94	9	2,721,813	9.07	5	11,641,992	38.80
Hawaii -----	16	25,754,000	32.19	9	21,221,000	26.52	5	704,000	.88	2	3,829,000	4.78
TOTALS -----	6,429	3,976,740,230	19.67	1,403	2,520,024,498	12.46	3,320	885,600,505	4.38	1,706	571,115,227	2.82

PERCENTAGE OF TOTAL ----- -- -- --

63.36%

22.26%

14.36% --

*Aggregate of Lakes Michigan, Huron, & Superior.

**Based on 1971 basin population.

APPENDIX A

TABLE A-1

Percentage change—annual contract awards dollars per capita (1957–1974—constant dollars)

TABLE A-2

Percentage change—annual contract awards dollars per capita (1957–1974—current dollars)

TABLE A-3

Percentage change—annual contract awards (1952–1974 current dollars)

	1952	1953	1954	1955	1956	1957	1958	1959	1960	1961	1962	1963	1964	1965	1966	1967	1968	1969	1970	1971	1972	1973	1974
1952	—	30.7	30.7	38.7	82.0	65.2	93.1	89.2	98.3	129.0	139.0	199.4	151.4	142.6	163.0	188.7	217.4	316.9	403.6	487.6	663.3	802.5	998.6
1953	—	—	0.0	6.1	39.3	26.4	47.8	44.8	51.8	75.3	82.9	129.2	92.4	85.6	101.3	121.0	142.9	219.0	285.4	349.7	484.1	590.7	740.8
1954	—	—	6.1	39.3	26.4	47.8	44.8	51.8	75.3	82.9	129.2	92.4	85.6	101.3	121.0	142.9	219.0	285.4	349.7	484.1	590.7	740.8	
1955	—	—	—	31.3	19.1	39.2	36.5	43.0	65.1	72.3	115.9	81.3	74.9	89.6	108.2	128.9	200.6	263.1	323.7	450.4	550.8	692.2	
1956	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1957	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1958	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1959	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1960	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1961	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1962	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1963	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1964	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1965	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1966	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1967	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1968	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1969	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1970	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1971	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1972	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1973	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1974	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

TABLE A-4

Percentage change—annual contract awards 1952–1974—constant dollars (1957–1959 base)

	1952	1953	1954	1955	1956	1957	1958	1959	1960	1961	1962	1963	1964	1965	1966	1967	1968	1969	1970	1971	1972	1973	1974
1952	—	23.2	20.3	21.7	51.1	30.0	46.6	38.4	43.0	62.7	67.9	104.6	69.4	60.8	68.6	80.8	141.1	132.7	163.3	176.8	232.1	267.9	302.7
1953	—	—	-2.4	-1.2	22.6	5.5	19.0	12.3	16.1	32.0	36.6	66.1	37.5	30.5	36.8	46.7	95.7	88.9	113.7	124.7	169.5	198.6	226.9
1954	—	—	—	1.2	25.6	8.1	21.9	15.1	18.9	35.3	39.6	70.2	40.9	33.7	40.2	50.4	100.5	93.5	118.9	130.2	176.1	206.0	234.9
1955	—	—	—	—	24.1	6.8	20.4	13.7	17.5	33.6	38.0	68.1	39.2	32.1	38.5	48.5	98.1	91.2	116.3	127.4	172.8	202.3	230.8
1956	—	—	—	—	—	14.0	-2.9	-8.4	-5.3	7.7	11.2	35.5	12.2	6.4	11.6	19.7	59.6	54.1	74.3	83.2	119.8	143.6	166.6
1957	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1958	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1959	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1960	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1961	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1962	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1963	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1964	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1965	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1966	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1967	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1968	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1969	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1970	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1971	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1972	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1973	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1974	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

TABLE A-5

Percentage change—distributed sewage treatment awards (1952–1974 dollars)

TABLE A-6

Percentage change distributed collecting sewers award dollars (1952-1974 current dollars)

TABLE A-7.

Contract awards (distributed) by states for year 1972

	Total	Sewage Treatment	Collecting Sewers
Alabama	16,971,766	12,361,303	4,610,463
Alaska	13,379,791	5,592,599	7,787,192
Arizona	10,096,607	950,411	9,146,196
Arkansas	9,582,373	5,145,217	4,437,156
California	68,271,937	40,385,356	27,886,581
Colorado	8,593,018	5,100,349	3,492,669
Connecticut	56,810,120	27,640,308	29,169,812
Delaware	10,446,992	8,774,752	1,672,240
District of Columbia	16,826,194	16,826,194	0
Florida	66,271,375	34,402,376	31,868,999
Georgia	81,364,696	67,840,664	13,524,032
Hawaii	911,999	685,686	226,313
Idaho	5,596,011	5,055,429	540,582
Illinois	142,612,785	113,288,793	29,323,992
Indiana	46,700,652	35,492,859	11,207,793
Iowa	27,360,901	18,304,755	9,056,146
Kansas	13,231,634	7,321,203	5,910,431
Kentucky	71,996,648	65,493,039	6,503,609
Louisiana	9,999,168	1,525,314	8,473,854
Maine	19,933,437	16,567,785	3,365,652
Maryland	39,328,912	17,308,017	22,020,895
Massachusetts	34,765,888	14,073,858	20,692,030
Michigan	240,937,339	173,058,712	67,878,627
Minnesota	50,807,146	23,710,665	27,096,481
Mississippi	13,089,448	5,577,960	7,511,488
Missouri	21,364,184	12,528,294	8,835,890
Montana	923,569	322,740	600,829
Nebraska	15,953,041	10,624,813	5,328,228
Nevada	933,619	882,040	51,579
New Hampshire	24,007,666	21,400,837	2,606,829
New Jersey	48,723,163	26,345,786	22,377,377
New Mexico	7,416,448	6,178,575	1,237,873
New York	962,748,816	841,324,931	121,423,885
North Carolina	44,086,802	34,491,447	9,595,355
North Dakota	6,482,381	4,104,251	2,378,130
Ohio	65,781,691	39,983,519	25,798,172
Oklahoma	15,788,055	8,511,494	7,276,561
Oregon	26,479,972	19,813,462	6,666,510
Pennsylvania	116,444,379	59,006,872	57,437,507
Rhode Island	4,091,258	904,270	3,186,988
South Carolina	25,721,158	15,612,475	10,108,683
South Dakota	2,276,218	1,010,220	1,265,998
Tennessee	39,140,437	21,848,618	17,291,819
Texas	98,860,323	61,917,179	36,943,144
Utah	1,266,632	841,280	425,352
Vermont	9,370,374	7,387,613	1,982,761
Virginia	24,120,801	16,532,173	7,588,628
Washington	44,303,676	22,957,540	21,346,136
West Virginia	1,545,916	1,018,618	527,298
Wisconsin	77,549,204	56,211,797	21,337,407
Wyoming	2,178,231	1,713,682	464,549
TOTALS	2,763,444,851	2,015,958,130	747,486,721

NOTE: The cost of the combination group were apportioned between sewage treatment facilities and collecting sewers in the same ratio as those for which such descriptions are available.

TABLE A-8.

Contract awards (distributed) by states for year 1973

	Total	Sewage Treatment	Collecting Sewers	
Alabama	21,606,767	8,647,660	12,959,107	
Alaska	19,706,674	13,979,338	5,727,336	
Arizona	28,881,163	18,730,629	10,150,534	
Arkansas	18,122,252	8,496,632	9,625,620	
California	225,589,281	175,206,496	50,382,785	
Colorado	18,143,741	14,620,151	3,523,590	
Connecticut	85,445,277	54,066,822	31,378,455	
Delaware	9,733,341	2,538,259	7,195,082	
District of Columbia	7,128,601	3,058,839	4,069,762	
Florida	128,101,601	52,513,368	75,588,233	
Georgia	78,505,798	54,407,986	24,097,812	
Hawaii	39,554,999	32,177,613	7,377,386	
Idaho	12,836,147	11,337,950	1,498,197	
Illinois	172,369,606	138,740,681	33,628,925	
Indiana	66,268,379	49,417,869	16,850,510	
Iowa	28,370,276	14,213,511	14,156,765	
Kansas	8,590,744	1,568,286	7,022,458	
Kentucky	16,998,381	7,167,145	9,831,236	
Louisiana	50,181,371	36,729,943	13,451,428	
Maine	37,469,809	31,728,650	5,741,159	
Maryland	133,561,950	99,238,260	34,323,690	
Massachusetts	180,675,050	155,943,462	24,731,588	
Michigan	60,684,475	26,313,285	34,371,190	
Minnesota	56,692,426	32,601,560	24,090,866	
Mississippi	32,409,770	24,568,894	7,840,876	
Missouri	40,175,974	28,163,889	12,012,085	
Montana	11,601,591	11,314,461	287,130	
Nebraska	15,717,771	8,226,885	7,490,886	
Nevada	9,295,673	3,092,685	6,202,988	
New Hampshire	23,093,938	22,178,685	915,253	
New Jersey	60,703,613	31,875,659	28,827,954	
New Mexico	16,918,643	15,833,660	1,084,983	
New York	526,210,995	412,750,655	113,460,340	
North Carolina	33,673,839	27,729,944	5,943,895	
North Dakota	5,657,238	3,332,668	2,324,570	
Ohio	214,864,038	163,406,168	51,457,870	
Oklahoma	15,833,665	11,338,803	4,494,862	
Oregon	33,397,821	17,646,436	15,751,385	
Pennsylvania	155,604,323	106,323,225	49,281,098	
Rhode Island	24,039,009	12,111,689	11,927,320	
South Carolina	26,896,987	13,048,633	13,848,354	
South Dakota	5,055,733	3,205,730	1,850,003	
Tennessee	72,270,884	40,711,539	31,559,345	
Texas	146,385,431	99,628,108	46,757,323	
Utah	8,705,159	5,286,624	3,418,535	
Vermont	5,000,593	4,195,836	804,757	
Virginia	137,585,898	107,043,281	30,542,617	
Washington	37,305,440	22,167,230	15,138,210	
West Virginia	6,807,599	5,024,350	1,783,249	
Wisconsin	96,383,555	61,053,385	35,330,170	
Wyoming	426,161	346,479	79,682	
TOTALS	3,267,239,450	2,305,049,996	962,189,454	

NOTE: The cost of the combination group were apportioned between sewage treatment facilities and collecting sewers in the same ratio as those for which such descriptions are available.

TABLE A-9.

Contract awards (distributed) by states for year 1974

	Total	Sewage Treatment	Collecting Sewers
Alabama	27,624,064	21,526,408	6,097,656
Alaska	15,547,603	9,007,217	6,540,386
Arizona	24,567,189	19,317,174	5,250,015
Arkansas	27,440,553	17,256,077	10,184,476
California	312,006,889	263,025,367	48,981,522
Colorado	54,202,087	47,951,084	6,251,003
Connecticut	57,908,923	13,650,723	44,258,200
Delaware	11,413,619	6,577,178	4,836,441
District of Columbia	85,493,812	82,226,981	3,266,831
Florida	246,629,572	163,146,583	83,482,989
Georgia	68,081,724	46,055,638	22,026,086
Hawaii	25,754,000	23,794,088	1,959,912
Idaho	12,075,015	11,119,049	955,966
Illinois	174,840,297	133,330,891	41,509,406
Indiana	76,724,751	52,562,954	24,161,797
Iowa	77,949,552	62,153,706	15,795,846
Kansas	23,734,848	16,130,609	7,604,239
Kentucky	55,231,895	33,749,050	21,482,845
Louisiana	64,893,461	41,758,826	23,134,635
Maine	26,159,599	22,005,176	4,154,423
Maryland	87,416,163	45,452,964	41,963,199
Massachusetts	100,007,108	77,785,515	22,221,593
Michigan	235,206,311	186,147,249	49,059,062
Minnesota	157,784,173	123,534,832	34,249,341
Mississippi	11,219,785	7,837,570	3,382,215
Missouri	59,499,895	46,073,766	13,426,129
Montana	17,437,130	16,306,589	1,130,541
Nebraska	53,753,495	46,549,299	7,204,196
Nevada	2,594,353	1,569,335	1,025,018
New Hampshire	16,914,330	14,033,980	2,880,350
New Jersey	354,564,059	292,929,243	61,634,816
New Mexico	1,777,878	1,310,775	467,103
New York	251,829,435	140,811,620	111,017,815
North Carolina	70,273,025	58,426,408	11,846,617
North Dakota	6,183,992	3,745,105	2,438,887
Ohio	194,448,753	147,828,389	46,620,364
Oklahoma	31,856,721	20,292,260	11,564,461
Oregon	49,447,003	37,755,701	11,691,302
Pennsylvania	187,169,173	132,069,581	55,099,592
Rhode Island	17,762,472	10,514,422	7,248,050
South Carolina	35,046,283	25,279,186	9,767,097
South Dakota	3,797,309	2,755,529	1,041,780
Tennessee	62,596,215	35,230,816	27,365,399
Texas	180,674,947	117,274,299	63,400,648
Utah	4,443,406	2,780,135	1,663,271
Vermont	4,247,490	2,358,653	1,888,837
Virginia	147,971,096	115,582,960	32,388,136
Washington	54,074,933	38,047,015	16,027,918
West Virginia	10,484,818	5,598,781	4,886,037
Wisconsin	94,232,333	58,040,318	36,192,015
Wyoming	3,746,644	3,546,832	199,812
TOTALS	3,976,740,181	2,903,813,906	1,072,926,275

NOTE: The cost of the combination group were apportioned between sewage treatment facilities and collecting sewers in the same ratio as those for which such descriptions are available.

TABLE A-10.

Combined 1972, 1973, 1974 average contract awards by state—sewage treatment, collecting sewers & combination

State	Total			Sewage Treatment			Collecting Sewers			Combinations		
	Total no.	Average dollars	Av per capita	Total no.	Average dollars	Av per capita	Total no.	Average dollars	Av per capita	Total no.	Average dollars	Av per capita
Alabama	160	22,067,533	6.22	40	10,670,112	3.00	82	6,115,368	1.72	38	5,282,052	1.48
Alaska	54	16,211,357	49.03	11	5,538,236	16.75	29	4,736,399	14.32	14	5,936,721	17.95
Arizona	145	21,181,654	10.30	18	11,505,037	5.59	106	7,390,478	3.59	21	2,286,138	1.11
Arkansas	148	18,381,727	9.03	38	6,796,330	3.33	53	6,286,808	3.08	57	5,298,588	2.60
California	1,132	201,956,036	9.78	256	144,892,313	7.02	716	34,767,301	1.68	160	22,296,422	1.08
Colorado	167	26,979,616	11.09	68	18,595,794	7.64	48	2,410,745	.99	51	5,973,077	2.45
Connecticut	415	66,721,441	21.65	49	27,205,355	8.82	325	32,596,731	10.57	41	6,919,354	2.24
Delaware	62	10,531,318	18.36	8	3,902,809	6.80	41	3,519,150	6.13	13	3,109,358	5.42
District of Columbia	17	36,482,869	49.29	8	33,392,764	45.11	5	2,094,314	2.82	4	995,790	1.34
Florida	611	147,000,850	19.10	166	68,633,333	8.92	304	56,330,757	7.32	141	22,036,759	2.86
Georgia	362	75,984,073	15.83	151	47,881,914	9.97	123	15,645,116	3.25	88	12,457,042	2.59
Hawaii	42	22,073,666	26.54	20	17,812,000	21.42	17	2,665,000	3.20	5	1,596,666	1.92
Idaho	43	10,169,058	13.13	24	8,514,925	10.99	11	648,776	.83	8	1,005,356	1.29
Illinois	784	163,274,230	14.57	279	117,030,231	10.44	388	29,065,028	2.59	117	17,178,971	1.53
Indiana	369	63,231,261	11.90	121	40,027,975	7.53	206	14,513,788	2.73	42	8,689,498	1.63
Iowa	464	44,560,244	15.46	109	29,470,854	10.22	282	11,949,762	4.14	73	3,139,627	1.08
Kansas	366	15,185,743	6.68	52	7,422,921	3.26	277	6,378,550	2.80	37	1,384,271	.60
Kentucky	224	48,075,642	14.41	63	34,247,047	10.26	133	11,984,084	3.59	28	1,844,511	.55
Louisiana	314	41,691,334	11.10	46	21,075,715	5.61	162	12,198,385	3.24	106	8,417,233	2.24
Maine	132	27,854,282	26.94	44	19,099,705	18.47	56	2,183,843	2.11	32	6,570,734	6.35
Maryland	936	86,769,009	21.31	73	42,248,038	10.37	440	26,798,219	6.58	423	17,722,751	4.35
Massachusetts	484	105,149,349	18.11	114	75,521,766	13.01	297	18,908,109	3.25	73	10,719,474	1.84
Michigan	875	178,942,709	19.76	146	114,044,931	12.59	517	43,230,707	4.77	212	21,667,070	2.39
Minnesota	880	88,427,916	22.69	68	35,054,345	8.99	308	15,987,358	4.10	504	37,386,212	9.59
Mississippi	139	18,906,335	8.26	36	7,249,329	3.17	59	3,424,375	1.49	44	8,232,630	3.60
Missouri	393	40,346,685	8.47	89	25,873,258	5.43	246	9,855,530	2.07	58	4,617,896	.97
Montana	35	9,987,431	13.79	12	9,026,434	12.46	14	527,164	.72	9	433,832	.59
Nebraska	435	28,474,770	18.51	86	20,262,176	13.17	264	5,882,173	3.82	85	2,330,420	1.51
Nevada	35	4,274,549	7.76	8	1,367,164	2.48	20	2,165,753	3.93	7	741,631	1.34
New Hampshire	57	21,338,645	27.35	27	17,307,965	22.18	24	1,242,271	1.59	6	2,788,408	3.57
New Jersey	566	154,663,612	21.05	164	109,822,566	14.94	325	34,019,948	4.63	77	10,821,097	1.47
New Mexico	43	8,704,324	7.90	20	6,883,876	6.25	12	479,394	.43	11	1,341,053	1.21
New York	900	580,263,083	31.80	145	401,556,858	22.00	583	83,743,591	4.58	172	94,962,633	5.20
North Carolina	304	49,344,556	9.33	93	34,432,446	6.51	120	6,243,803	1.18	91	8,668,307	1.64
North Dakota	166	6,107,871	9.58	17	1,440,857	2.26	48	1,226,906	1.92	101	3,440,108	5.40
Ohio	882	158,364,828	14.75	171	107,166,234	9.98	585	36,242,451	3.37	126	14,956,143	1.39
Oklahoma	206	21,159,481	7.93	31	10,763,474	4.03	120	6,478,856	2.42	55	3,917,151	1.46
Oregon	223	36,441,599	16.37	53	22,364,101	10.05	137	9,993,084	4.49	33	4,084,414	1.83
Pennsylvania	946	153,072,626	12.88	244	77,532,003	6.52	563	42,717,606	3.59	139	32,823,016	2.76
Rhode Island	65	15,297,580	15.94	10	4,356,689	4.54	40	5,694,774	5.93	15	5,246,117	5.46
South Carolina	139	29,221,477	10.69	39	13,364,780	4.89	66	8,955,459	3.27	34	6,901,237	2.52
South Dakota	100	3,709,754	5.43	11	843,148	1.23	46	626,436	.91	43	2,240,169	3.28
Tennessee	339	58,002,513	14.11	56	22,256,817	5.41	205	20,326,712	4.94	78	15,418,983	3.75
Texas	1,146	141,973,568	12.01	239	66,348,280	5.61	490	35,489,650	3.00	417	40,135,637	3.39
Utah	36	4,805,066	4.17	5	728,773	.63	7	633,846	.55	24	3,442,447	2.98
Vermont	41	6,206,153	13.35	18	4,296,649	9.24	15	1,379,228	2.96	8	530,276	1.14
Virginia	526	103,225,932	21.38	139	72,139,974	14.94	277	19,600,106	4.06	110	11,485,852	2.37
Washington	320	45,228,017	13.14	92	22,797,290	6.62	169	15,021,633	4.36	59	7,409,094	2.15
West Virginia	48	6,279,445	3.50	18	3,459,747	1.92	23	2,180,498	1.21	7	639,199	.35
Wisconsin	1,111	89,388,365	19.63	128	50,234,592	11.03	616	26,682,238	5.85	367	12,471,533	2.73
Wyoming	11	2,117,012	6.00	4	1,446,862	4.10	2	51,330	.14	5	618,820	1.75
TOTALS	18,398	3,335,808,194	797.62	3,927	2,055,906,792	477.98	10,002	749,289,591	177.09	4,469	530,611,778	142.54

PERCENTAGE OF TOTAL

61.63%

22.46%

15.90%

TABLE A-11.

Cumulative 1972, 1973, and 1974 contract awards by state—sewage treatment, collecting sewers & combination

State	Total			Sewage Treatment			Collecting Sewers			Combinations		
	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita	No.	Dollars	Per capita
Alabama	160	66,202,600	18.67	40	32,010,338	9.02	82	18,346,104	5.17	38	15,846,158	4.47
Alaska	54	48,634,071	147.37	11	16,614,710	50.34	29	14,209,198	43.05	14	17,810,163	53.97
Arizona	145	63,544,962	30.87	18	34,515,112	16.77	106	22,171,435	10.77	21	6,858,415	3.33
Arkansas	148	55,145,181	27.09	38	20,388,991	10.01	53	18,860,425	9.26	57	15,895,765	7.81
California	1,132	605,868,110	29.35	256	434,676,941	21.06	716	104,301,903	5.05	160	66,889,266	3.24
Colorado	167	80,938,849	33.28	68	55,787,382	22.93	48	7,232,236	2.97	51	17,919,231	7.36
Connecticut	415	200,164,323	64.96	49	81,616,067	26.49	325	97,790,193	31.73	41	20,758,063	6.73
Delaware	62	31,593,954	55.13	8	11,708,429	20.43	41	10,557,450	18.42	13	9,328,075	16.27
District of Columbia	17	109,448,609	147.90	8	100,178,294	135.37	5	6,282,943	8.49	4	2,987,372	4.03
Florida	611	441,002,551	57.23	166	205,900,001	26.72	304	168,992,272	21.93	141	66,110,278	8.58
Georgia	362	227,952,221	47.49	151	143,645,744	29.92	123	46,935,349	9.77	88	37,371,128	7.78
Hawaii	42	66,221,000	79.68	20	53,436,000	64.30	17	7,995,000	9.62	5	4,790,000	5.76
Idaho	43	30,507,175	39.41	24	25,544,775	33.00	11	1,946,330	2.51	8	3,016,070	3.89
Illinois	784	489,822,691	43.72	279	351,090,694	31.33	388	87,195,084	7.78	117	51,536,913	4.60
Indiana	369	189,693,785	35.72	121	120,083,927	22.61	206	43,541,364	8.19	42	26,068,494	4.90
Iowa	464	133,680,732	46.40	109	88,412,563	30.68	282	35,849,288	12.44	73	9,418,881	3.26
Kansas	366	45,557,229	20.05	52	22,268,764	9.80	277	19,135,652	8.42	37	4,152,813	1.82
Kentucky	224	144,226,927	43.24	63	102,741,142	30.80	133	35,952,252	10.78	28	5,533,533	1.65
Louisiana	314	125,074,003	33.30	46	63,227,146	16.83	162	36,595,156	9.74	106	25,251,701	6.72
Maine	132	83,562,848	80.89	44	57,299,116	55.46	56	6,551,529	6.34	32	19,712,203	19.08
Maryland	936	260,307,028	63.95	73	126,744,115	31.14	440	80,394,658	19.75	423	53,168,255	13.06
Massachusetts	484	315,448,049	54.35	114	226,565,299	39.03	297	56,724,327	9.77	73	32,158,423	5.54
Michigan	875	536,828,128	59.31	146	342,134,795	37.80	517	129,692,123	14.32	212	65,001,210	7.18
Minnesota	880	265,283,748	68.07	68	105,163,037	26.98	308	47,962,074	12.30	504	112,158,637	28.78
Mississippi	139	56,719,006	24.80	36	21,747,988	9.50	59	10,273,127	4.49	44	24,697,891	10.79
Missouri	393	121,040,056	25.42	89	77,619,774	16.30	246	29,566,592	6.21	58	13,853,690	2.91
Montana	35	29,962,293	41.38	12	27,079,304	37.40	14	1,581,492	2.18	9	1,301,497	1.79
Nebraska	435	85,424,310	55.57	86	60,786,528	39.54	264	17,646,520	11.48	85	6,991,262	4.54
Nevada	35	12,823,647	23.27	8	4,101,493	7.44	20	6,497,260	11.79	7	2,224,894	4.03
New Hampshire	57	64,015,936	81.96	27	51,923,896	66.48	24	3,726,814	4.77	6	8,365,226	10.71
New Jersey	566	463,990,838	63.16	164	329,467,700	44.84	325	102,059,846	13.89	77	32,463,292	4.41
New Mexico	43	26,112,972	23.71	20	20,651,628	18.75	12	1,438,183	1.30	11	4,023,161	3.65
New York	900	1,740,789,249	95.40	145	1,204,670,575	66.02	583	251,230,775	13.76	172	284,887,899	15.61
North Carolina	304	148,033,669	28.01	93	103,297,338	19.54	120	18,731,410	3.54	91	26,004,921	4.92
North Dakota	166	18,323,614	28.76	17	4,322,572	6.78	48	3,680,718	5.77	101	10,320,324	16.20
Ohio	882	475,094,485	44.27	171	321,498,703	29.96	585	108,727,353	10.13	126	44,868,429	4.18
Oklahoma	206	63,478,444	23.79	31	32,290,422	12.10	120	19,436,568	7.28	55	11,751,454	4.40
Oregon	223	109,324,799	49.13	53	67,092,304	30.15	137	29,979,253	13.47	33	12,253,242	5.50
Pennsylvania	946	459,217,878	38.65	244	232,596,011	19.57	563	128,152,819	10.78	139	98,469,048	8.28
Rhode Island	65	45,892,742	47.85	10	13,070,069	13.62	40	17,084,322	17.81	15	15,738,351	16.41
South Carolina	139	87,664,431	32.08	39	40,094,342	14.67	66	26,866,377	9.83	34	20,703,712	7.57
South Dakota	100	11,129,263	16.31	11	2,529,444	3.70	46	1,879,310	2.75	43	6,720,509	9.85
Tennessee	339	174,007,539	42.34	56	66,770,453	16.24	205	60,980,136	14.84	78	46,256,950	11.25
Texas	1,146	425,920,704	36.04	239	199,044,842	16.84	490	106,468,950	9.01	417	120,406,912	10.19
Utah	36	14,415,200	12.51	5	2,186,319	1.89	7	1,901,538	1.65	24	10,327,343	8.96
Vermont	41	18,618,460	40.12	18	12,889,947	27.78	15	4,137,685	8.91	8	1,590,828	3.42
Virginia	526	309,677,798	64.14	139	216,419,922	44.82	277	58,800,319	12.17	110	34,457,557	7.13
Washington	320	135,684,052	39.43	92	68,391,871	19.87	169	45,064,899	13.09	59	22,227,282	6.45
West Virginia	48	18,838,335	10.50	18	10,379,241	5.78	23	6,541,496	3.64	7	1,917,598	1.06
Wisconsin	1,111	268,165,095	58.89	128	150,703,778	33.09	616	80,046,716	17.58	367	37,414,601	8.21
Wyoming	11	6,351,038	18.04	4	4,340,587	12.33	2	153,990	.43	5	1,856,461	5.27
TOTALS	18,398	10,007,424,627	47.70	3,927	6,167,720,433	29.39	10,002	2,247,868,813	10.71	4,469	1,591,835,381	7.58

61.63%

22.46%

15.90%

PERCENTAGE OF TOTAL

*Based on average of 1972, 1973, 1974 population.

TABLE A-12.**Combined 1972, 1973, and 1974 average contract awards by basin—sewage treatment, collecting sewers & combination**

Drainage Basin	Total			Sewage Treatment			Collecting sewers			Combinations		
	Total no.	Average dollars	Av per** capita	Total no.	Average dollars	Av per capita	Total no.	Average dollars	Av per capita	Total no.	Average dollars	Av per capita
Northeast -----	2,478	959,232,898	7.70	499	649,001,416	5.21	1,594	174,315,472	1.40	385	135,916,010	1.09
North Atlantic -----	2,229	346,133,718	6.04	417	192,827,145	3.36	1,132	90,056,688	1.57	680	63,249,884	1.10
Southeast -----	1,665	348,738,448	4.61	529	193,877,775	2.56	721	93,993,432	1.24	415	60,867,240	.80
Tennessee River -----	166	31,987,147	3.33	40	16,485,244	1.71	86	9,247,041	.96	40	6,254,861	.65
Ohio River -----	1,533	259,171,387	4.23	392	165,895,504	2.71	935	64,410,585	1.05	206	28,865,298	.47
Lake Erie -----	706	124,169,607	4.35	126	80,485,076	2.82	449	29,267,763	1.02	131	14,416,767	.50
Upper Mississippi -----	2,591	298,486,288	5.37	505	179,707,489	3.23	1,183	62,801,603	1.13	903	55,977,195	1.00
*Western Great Lakes -----	1,400	231,554,960	6.12	205	142,291,982	3.76	828	54,449,052	1.44	367	34,813,925	.92
Lake Michigan -----	1,207	175,536,412	.00	172	108,620,373	.00	728	46,101,836	.00	307	20,814,202	.00
Lake Huron -----	142	37,078,927	.00	22	23,695,783	.00	77	7,807,226	.00	43	5,575,918	.00
Lake Superior -----	51	18,939,621	.00	11	9,975,826	.00	23	539,990	.00	17	8,423,804	.00
Missouri River -----	1,224	112,316,311	8.70	253	77,397,665	5.99	699	21,428,176	1.66	272	13,490,469	1.04
South Central Lower Mississippi -----	1,191	110,459,237	3.01	218	50,466,276	1.37	666	35,209,961	.96	307	24,782,999	.67
Colorado River -----	227	27,362,270	3.96	47	14,758,055	2.13	137	8,232,177	1.19	43	4,372,037	.63
Western Gulf -----	1,119	145,128,551	4.35	229	68,531,303	2.05	479	35,523,453	1.06	411	41,073,794	1.23
Pacific Northwest -----	592	92,571,780	4.82	170	54,182,924	2.82	320	25,637,540	1.33	102	12,751,315	.66
California -----	1,066	195,656,231	4.86	238	142,666,993	3.54	681	32,715,080	.81	147	20,274,158	.50
Great Basin -----	115	14,554,347	3.73	28	3,981,721	1.02	46	4,600,176	1.17	41	5,972,449	1.53
Alaska -----	54	16,211,357	18.01	11	5,538,236	6.15	29	4,736,399	5.26	14	5,936,721	6.59
Hawaii -----	42	22,073,666	9.19	20	17,812,000	7.42	17	2,665,000	1.11	5	1,596,666	.66
TOTALS -----	18,398	3,335,808,203	102.46	3,927	2,055,906,804	57.93	10,002	749,289,598	24.41	4,469	530,611,787	20.11

PERCENTAGE OF TOTAL -----

61.63%

22.46%

15.90%

*Aggregate of Lakes Michigan, Huron, & Superior.

**Based on 1971 basin population.

TABLE A-13.

Contract awards by population size group, 1972

Population Size Group	Total		Sewage Treatment		Collecting Sewers		Combinations	
	Number	Dollars	Number	Dollars	Number	Dollars	Number	Dollars
Under 500	579	229,792,511	116	133,225,381	309	60,002,085	154	36,565,045
500-999	285	66,185,247	75	19,483,404	138	29,474,542	72	17,227,301
1,000-2,499	546	150,846,329	153	79,589,826	262	41,236,057	131	30,020,446
2,500-4,999	443	143,205,735	118	69,681,404	246	53,899,640	79	19,624,691
5,000-9,999	588	243,642,685	120	140,079,168	381	68,323,863	87	35,239,654
10,000-24,999	799	311,667,102	152	164,155,329	552	115,667,190	95	31,844,583
25,000-49,999	563	214,666,928	103	136,015,607	383	58,758,931	77	19,892,390
50,000-99,999	387	189,751,857	74	120,511,445	283	51,738,861	30	17,501,551
100,000-249,999	366	320,568,973	84	171,553,787	243	67,834,487	39	81,180,699
Over 250,000	765	893,117,531	137	718,990,131	553	79,648,009	75	94,479,391
TOTALS	5,321	2,763,444,898	1,132	1,753,285,482	3,350	626,583,665	839	383,575,751

TABLE A-14.

Contract awards by size of contract, 1972

Dollar Size Group	Total		Sewage Treatment		Collecting Sewers		Combinations	
	Number	Dollars	Number	Dollars	Number	Dollars	Number	Dollars
Under 10,000	440	2,625,783	43	271,303	362	2,131,459	35	223,021
10,000-25,000	821	13,881,317	57	948,469	671	11,291,647	93	1,641,201
25,000-49,999	725	26,263,294	81	2,941,144	535	19,367,877	109	3,954,273
50,000-99,999	816	58,932,694	131	9,770,541	542	38,912,495	143	10,249,658
100,000-249,999	1,022	162,462,396	210	34,798,597	609	95,605,547	203	32,058,252
250,000-499,999	640	226,104,696	177	63,781,624	340	118,320,755	123	44,002,317
500,000-999,999	458	320,878,513	189	133,340,038	191	132,905,623	78	54,632,852
1,000,000-4,999,999	343	673,721,551	198	401,986,478	94	173,873,939	51	97,861,134
Over 5,000,000	56	1,278,574,654	46	1,105,447,288	6	34,174,323	4	138,953,043
TOTALS	5,321	2,763,444,898	1,132	1,753,285,482	3,350	626,583,665	839	383,575,751

TABLE A-15.**Contract awards by population size group, 1973**

Population Size Group	Total		Sewage Treatment		Collecting Sewers		Combinations	
	Number	Dollars	Number	Dollars	Number	Dollars	Number	Dollars
Under 500	873	470,900,931	169	297,684,582	323	74,827,398	381	98,388,951
500-999	268	64,556,135	81	21,078,912	88	17,595,356	99	25,881,867
1,000-2,499	613	195,079,786	165	93,248,614	232	46,280,996	216	55,550,176
2,500-4,999	559	168,639,109	143	71,916,164	267	50,124,652	149	46,598,293
5,000-9,999	757	362,344,552	165	208,143,331	377	100,090,269	215	54,110,952
10,000-24,999	947	402,927,930	170	219,586,425	542	103,439,114	235	79,902,391
25,000-49,999	727	373,263,495	146	243,979,056	384	71,062,386	197	58,222,053
50,000-99,999	485	240,257,183	83	137,421,844	306	68,101,419	96	34,733,920
100,000-249,999	527	436,330,795	108	295,955,030	299	94,047,765	120	46,328,000
Over 250,000	892	552,939,583	162	305,396,495	514	110,115,288	216	137,427,800
TOTALS	6,648	3,267,239,499	1,392	1,894,410,453	3,332	735,684,643	1,924	637,144,403

TABLE A-16.**Contract awards by size of contract, 1973**

Dollar Size Group	Total		Sewage Treatment		Collecting Sewers		Combinations	
	Number	Dollars	Number	Dollars	Number	Dollars	Number	Dollars
Under 10,000	559	3,377,770	50	313,528	420	2,501,585	89	562,657
10,000-25,000	870	14,659,301	76	1,284,990	575	9,621,502	219	3,752,809
25,000-49,999	875	31,720,151	105	3,703,237	500	18,186,045	270	9,830,869
50,000-99,999	1,072	76,800,280	150	10,909,773	555	39,370,462	367	26,520,045
100,000-249,999	1,315	212,936,057	272	45,590,681	594	95,526,790	449	71,818,586
250,000-499,999	803	287,864,949	214	76,957,882	348	122,868,704	241	88,038,363
500,000-999,999	571	408,748,993	193	141,698,194	198	140,814,025	180	126,236,774
1,000,000-4,999,999	491	962,624,855	258	550,123,193	134	250,290,061	99	162,211,601
Over 5,000,000	92	1,268,507,143	74	1,063,828,975	8	56,505,469	10	148,172,699
TOTALS	6,648	3,267,239,499	1,392	1,894,410,453	3,332	735,684,643	1,924	637,144,403

TABLE A-17.

Contract awards by population size group, 1974

Population Size Group	Total		Sewage Treatment		Collecting Sewers		Combinations	
	Number	Dollars	Number	Dollars	Number	Dollars	Number	Dollars
Under 500	743	381,251,029	149	215,231,081	312	94,023,732	282	71,996,216
500-999	292	107,887,783	77	36,738,077	105	34,816,784	110	36,332,922
1,000-2,499	615	276,307,227	153	151,392,443	254	65,289,431	208	59,625,353
2,500-4,999	605	215,464,544	156	112,448,572	283	65,958,910	166	37,057,062
5,000-9,999	699	241,915,429	145	137,678,799	368	63,148,681	186	41,087,949
10,000-24,999	964	634,259,020	205	424,188,154	498	132,837,728	261	77,233,138
25,000-49,999	669	413,670,110	124	271,635,250	389	78,193,527	156	63,841,333
50,000-99,999	537	466,663,405	134	355,155,129	318	79,551,361	85	31,956,915
100,000-249,999	474	447,484,066	90	254,070,843	296	112,195,759	88	81,217,464
Over 250,000	831	791,837,617	170	561,486,150	497	159,584,592	164	70,766,875
TOTALS	6,429	3,976,740,230	1,403	2,520,024,498	3,320	885,600,505	1,706	571,115,227

TABLE A-18.

Contract awards by size of contract, 1974

Dollar Size Group	Total		Sewage Treatment		Collecting Sewers		Combinations	
	Number	Dollars	Number	Dollars	Number	Dollars	Number	Dollars
Under 10,000	418	2,656,716	36	235,721	316	2,012,181	66	408,814
10,000-25,000	795	13,742,653	83	1,544,735	538	9,159,537	174	3,038,381
25,000-49,999	875	31,955,008	102	3,769,660	543	19,834,876	230	8,350,472
50,000-99,999	970	71,017,013	127	9,421,149	530	38,541,488	313	23,054,376
100,000-249,999	1,266	204,076,581	232	38,778,420	617	98,374,228	417	66,923,933
250,000-499,999	815	293,261,769	196	72,405,078	360	129,252,238	259	91,604,453
500,000-999,999	589	413,246,279	230	161,551,529	227	159,044,734	132	92,650,016
1,000,000-4,999,999	566	1,134,459,911	279	571,849,817	180	352,698,986	107	209,911,108
Over 5,000,000	135	1,812,324,300	118	1,660,468,389	9	76,682,237	8	75,173,674
TOTALS	6,429	3,976,740,230	1,403	2,520,024,498	3,320	885,600,505	1,706	571,115,227

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