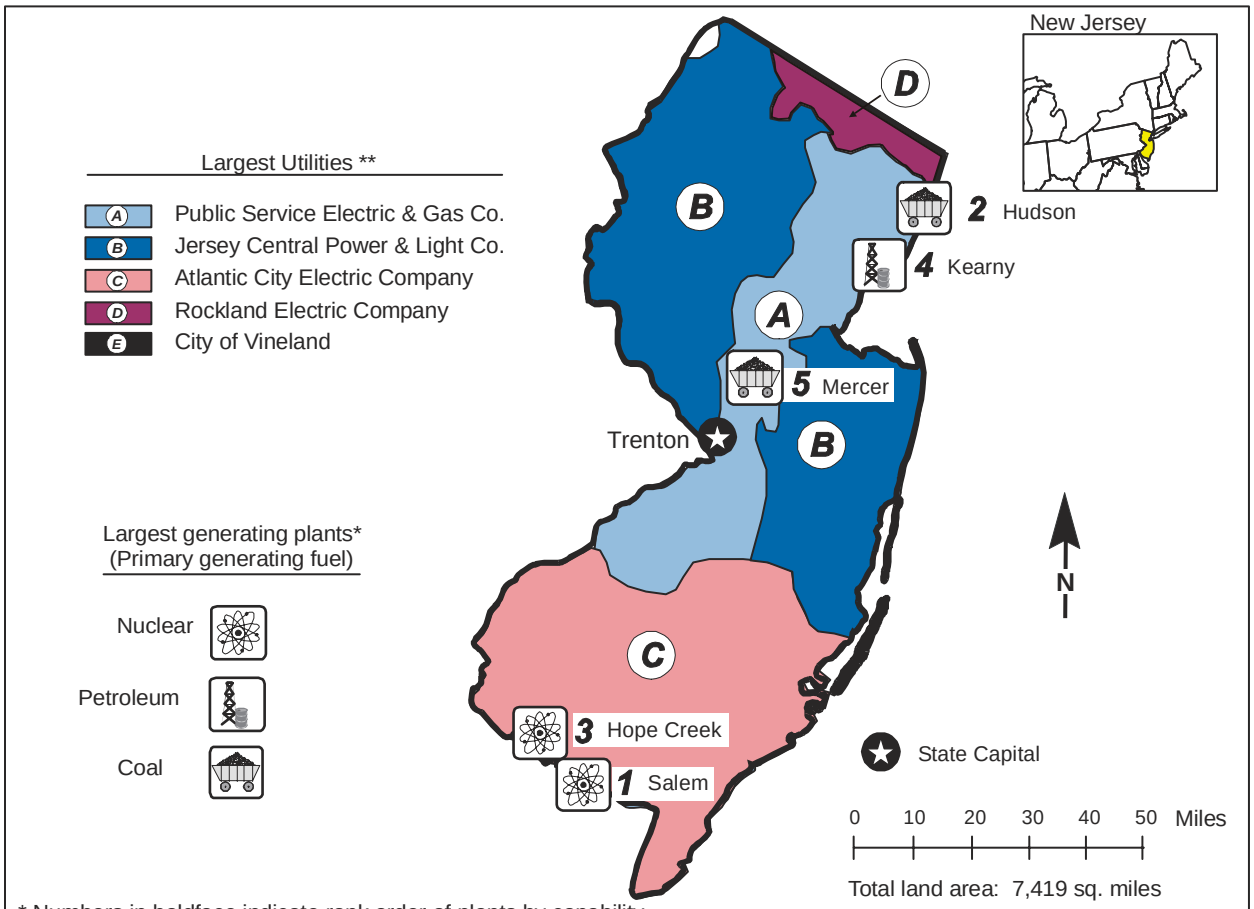
New Jersey



* Numbers in boldface indicate rank order of plants by capability.
** Utilities rank ordered by retail sales within the State. Map shows service areas of investor-owned utilities only.

Table 1. 1999 Summary Statistics

Item	Value	U.S. Rank
NERC Region(s)		MACC
Primary Energy Source		Nuclear
Net Summer Capability (megawatts)	16,651	19
Utility	12,085	24
Nonutility	4,566	7
Net Generation (megawatthours)	56,994,767	23
Utility	38,867,608	30
Nonutility	18,127,159	8
Emissions (thousand short tons)		
Sulfur Dioxide	48	37
Nitrogen Oxide	53	38
Carbon Dioxide	19,688	38
Sulfur Dioxide/sq. mile	6	18
Nitrogen Oxide/sq. mile	7	7
Carbon Dioxide/sq. mile	2,654	11
Electricity Consumption (MWh) (excludes line losses)	73,140,489	19
Utility Retail Electricity Sales (megawatthours)	70,581,680	19
Unregulated Retail Electricity Sales (megawatthours)	121,473	13
Nonutility Retail Sales and Direct Use (megawatthours)	2,437,336	19
Utility Average Retail Price (cents/kWh)	9.99	5

Table 2. Ten Largest Plants by Generating Capability, 1999

Plant	Primary Energy Source(s)	Operating Company	Net Summer Capability (MW)
1. Salem	Petroleum, Nuclear	Public Service Electric & Gas Co	2,250
2. Hudson	Petroleum, Gas, Coal	Public Service Electric & Gas Co	1,120
3. Hope Creek	Nuclear	Public Service Electric & Gas Co	1,031
4. Kearny	Gas, Petroleum	Public Service Electric & Gas Co	804
5. Mercer	Petroleum, Gas, Coal	Public Service Electric & Gas Co	777
6. Bergen	Petroleum, Gas	Public Service Electric & Gas Co	696
7. Linden Cogen Plant	Gas	Cogen Tech Linden Venture LP	679
8. Linden	Petroleum, Gas	Public Service Electric & Gas Co	647
9. Burlington	Petroleum, Gas	Public Service Electric & Gas Co	629
10. Oyster Creek	Nuclear	GPU Nuclear Corp	619

Table 3. Five Largest Utilities by Retail Sales within the State, 1999
(Megawatthours)

Utility	Total	Residential	Commercial	Industrial	Other
A. Public Service Electric & Gas Co	40,289,444	11,747,256	19,932,648	8,229,498	380,042
B. Jersey Central Power & Light Co	18,951,186	7,973,874	7,618,222	3,277,837	81,253
C. Atlantic City Electric Company	8,831,691	3,715,022	3,807,566	1,262,531	46,572
D. Rockland Electric Company	1,432,604	621,167	740,244	64,633	6,560
E. City of Vineland	467,668	130,232	118,774	214,497	4,165
Total	69,972,593	24,187,551	32,217,454	13,048,996	518,592
Percentage of Utility Sales	99	99	99	100	99

Table 4. Electric Power Industry Generating Capability by Primary Energy Source, 1990, 1994, and 1999
(Megawatts)

Plant Type	1990	1994	1999	Average Annual Rate of Growth (Percent)	Percentage Share 1990	Percentage Share 1994	Percentage Share 1999
Total Utility	13,730	13,500	12,085	-1.4	86.7	81.5	72.6
Coal	1,652	1,634	1,643	-0.1	10.4	9.9	9.9
Petroleum	3,784	2,967	2,373	-5.1	23.9	17.9	14.3
Gas	4,101	4,657	3,807	-0.8	25.9	28.1	22.9
Nuclear	3,863	3,862	3,862	0.0	24.4	23.3	23.2
Hydroelectric	330	380	400	2.2	2.1	2.3	2.4
Total Nonutility	2,107	3,055	4,566	9.0	13.3	18.5	27.4
Coal	W	W	477	W	W	W	2.9
Petroleum	10	1	12	2.2	0.1	0.0	0.1
Gas	397	917	915	9.7	2.5	5.5	5.5
Petroleum/Gas Combined	1,519	1,472	2,946	7.6	9.6	8.9	17.7
Hydroelectric	W	W	14	W	W	W	0.1
Other	170	170	203	2.0	1.1	1.0	1.2
Total Industry	15,837	16,555	16,651	0.6	100.0	100.0	100.0
Coal	W	W	2,120	W	W	W	12.7
Petroleum	3,794	2,968	2,385	-5.0	24.0	17.9	14.3
Gas	4,498	5,574	4,722	0.5	28.4	33.7	28.4
Petroleum/Gas Combined	1,519	1,472	2,946	7.6	9.6	8.9	17.7
Nuclear	3,863	3,862	3,862	0.0	24.4	23.3	23.2
Hydroelectric	W	W	414	W	W	W	2.5
Other	170	170	203	2.0	1.1	1.0	1.2

Figure 1. Industry Generating Capability by Primary Energy Source, 1999

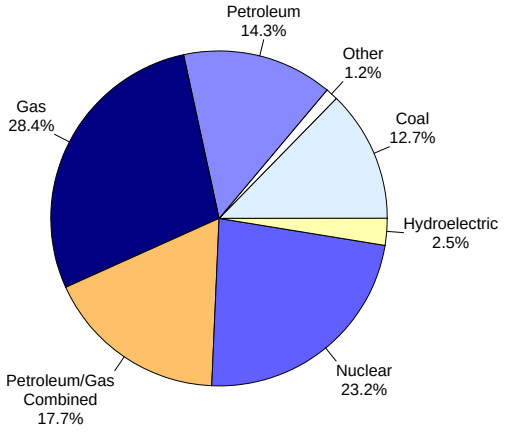


Figure 2. Industry Generation by Energy Source, 1999

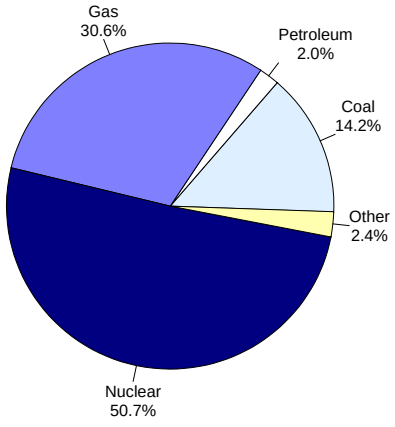


Table 5. Electric Power Industry Generation of Electricity by Energy Source, 1990, 1994, and 1999
(Megawatthours)

Fuel	1990	1994	1999	Average Annual Rate of Change (Percent)	Percentage Share 1990	Percentage Share 1994	Percentage Share 1999
Total Utility	36,488,596	31,931,596	38,867,608	0.7	75.5	65.8	68.2
Coal	7,057,820	4,646,622	6,387,952	-1.1	14.6	9.6	11.2
Petroleum	1,831,935	1,656,066	531,959	-12.8	3.8	3.4	0.9
Gas	3,978,001	3,666,307	3,122,217	-2.7	8.2	7.6	5.5
Nuclear	23,770,387	22,129,335	28,970,893	2.2	49.2	45.6	50.8
Hydroelectric	-149,547	-166,734	-145,413	-0.3	-0.3	-0.3	-0.3
Total Nonutility	11,818,563	16,581,896	18,127,159	4.9	24.5	34.2	31.8
Coal	W	W	1,745,747	W	W	W	3.1
Petroleum	284,120	501,025	638,417	9.4	0.6	1.0	1.1
Gas	11,063,981	13,904,816	14,348,134	2.9	22.9	28.7	25.2
Hydroelectric	W	W	17,303	W	W	W	0.0
Other	438,331	1,135,382	1,377,559	13.6	0.9	2.3	2.4
Total Industry	48,307,159	48,513,492	56,994,767	1.9	100.0	100.0	100.0
Coal	W	W	8,133,699	W	W	W	14.3
Petroleum	2,116,055	2,157,091	1,170,376	-6.4	4.4	4.4	2.1
Gas	15,041,982	17,571,123	17,470,351	1.7	31.1	36.2	30.7
Nuclear	23,770,387	22,129,335	28,970,893	2.2	49.2	45.6	50.8
Hydroelectric	W	W	-128,110	W	W	W	-0.2
Other	438,331	1,135,382	1,377,559	13.6	0.9	2.3	2.4

Table 6. Utility Delivered Fuel Costs and Quality for Coal, Petroleum, and Gas, 1990, 1994, and 1999

Fuel	1990	1994	1999	Average Annual Rate of Change (Percent)
Coal (cents per million Btu) (1999 dollars)	218.3	198.4	145.4	-4.4
Average heat value (Btu per pound)	13,429	13,341	13,150	-0.2
Average sulfur content (percent)	1.2	1.3	1.1	-0.2
Petroleum (cents per million Btu) (1999 dollars)	435.9	316.8	288.2	-4.5
Average heat value (Btu per gallon)	148,299	148,378	149,297	0.1
Average sulfur content (percent)	0.4	0.4	0.4	0.5
Gas (cents per million Btu) (1999 dollars)	263.2	228.8	298.9	1.4
Average heat value (Btu per cubic foot)	1,032	1,035	1,031	0.0

Table 7. Electric Power Industry Emissions Estimates by Fuel, 1990, 1994, and 1999
(Thousand Short Tons)

Emission Type	1990	1994	1999	Average Annual Rate of Change (Percent)
Sulfur Dioxide				
Coal	69	48	46	-4.4
Petroleum	5	4	2	-11.8
Other	0	0	0	0.0
Total	74	53	48	-4.8
Nitrogen Oxide				
Coal	40	27	31	-2.6
Petroleum	3	2	1	-14.4
Gas	6	12	18	12.9
Other	0	3	3	0.0
Total	49	45	53	1.0
Carbon Dioxide				
Coal	7,850	6,331	8,922	1.4
Petroleum	1,796	1,953	782	-8.8
Gas	2,745	7,519	8,970	14.1
Other	0	2,065	1,014	0.0
Total	12,391	17,868	19,688	5.3

Figure 3. Industry Generation of Electricity by Primary Energy Source, 1990-1999

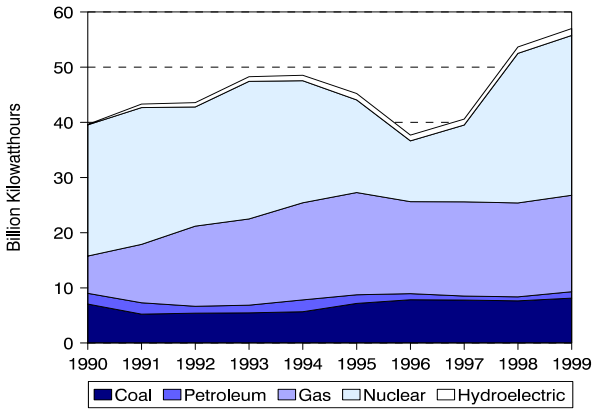


Figure 4. Utility Delivered Fuel Costs for Coal, Petroleum, and Gas, 1990-1999 (1999 Dollars)

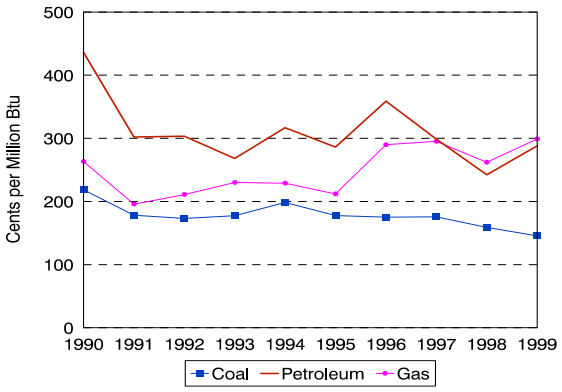


Figure 5. Estimated Sulfur Dioxide Emissions, 1990-1999

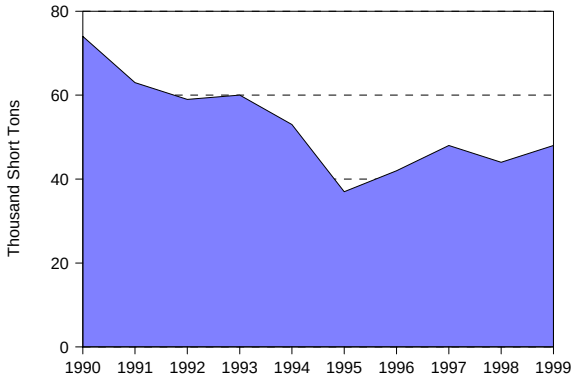


Figure 6. Estimated Nitrogen Oxide Emissions, 1990-1999

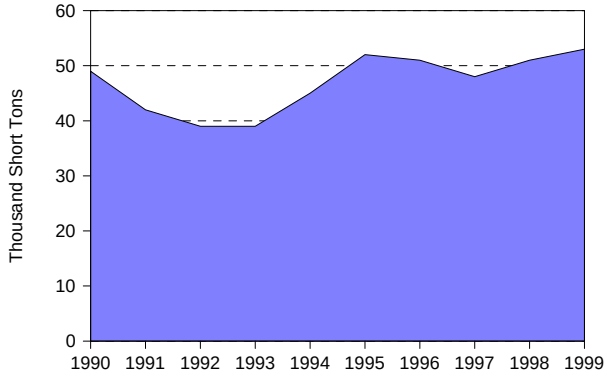


Figure 7. Estimated Carbon Dioxide Emissions, 1990-1999

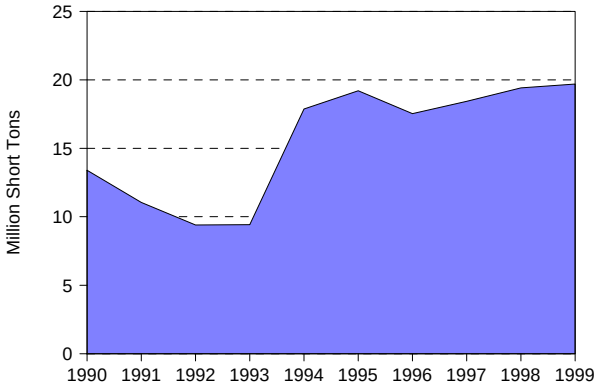


Figure 8. Nuclear Power Capacity Factor Comparison, 1990-1999

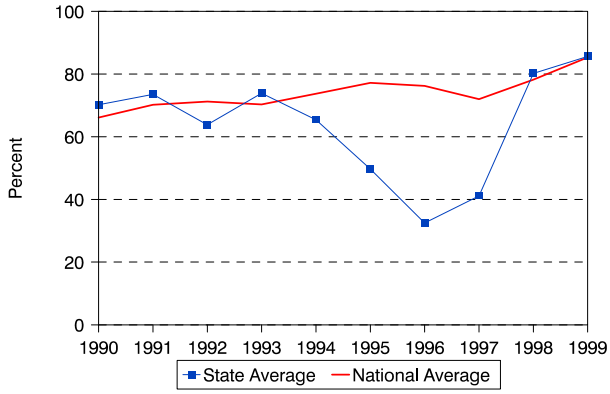


Table 8. Utility Retail Sales, Revenue, and Average Revenue per Kilowatthour by Sector, 1990, 1994, and 1999

	1990	1994	1999	Average Annual Rate of Change (Percent)	Percentage Share 1990	Percentage Share 1994	Percentage Share 1999
Utility Retail Sales							
(thousand megawatthours)							
Residential	20,498	22,154	24,550	2.0	32.6	33.4	34.8
Commercial	26,839	29,358	32,436	2.1	42.7	44.3	45.9
Industrial	15,041	14,251	13,071	-1.5	23.9	21.5	18.5
Other	479	495	525	1.0	0.8	0.8	0.7
Total	62,857	66,258	70,582	1.3	100.0	100.0	100.0
Retail Sales Revenue							
(million 1999 dollars)							
Residential	2,572	2,789	2,798	0.9	37.2	38.3	39.7
Commercial	2,907	3,152	3,160	0.9	42.0	43.3	44.8
Industrial	1,341	1,235	1,005	-3.1	19.4	17.0	14.3
Other	93	96	91	-0.1	1.3	1.3	1.3
Total	6,912	7,273	7,054	0.2	100.0	100.0	100.0
Average Revenue per Kilowatthour							
(cents/kWh) (1999 dollars)							
Residential	12.55	12.59	11.40	NA	NA	NA	NA
Commercial	10.83	10.74	9.74	NA	NA	NA	NA
Industrial	8.92	8.67	7.69	NA	NA	NA	NA
Other	19.33	19.32	17.43	NA	NA	NA	NA
Total	11.00	10.98	9.99	NA	NA	NA	NA

Table 9. Utility Retail Sales, Revenue, and Number of Customers by Type of Utility, 1999

Item	Investor-Owned	Public	Federal	Cooperative	Total
Number of Utilities	4	9	0	1	14
Number of Retail Customers	3,540,274	54,471	0	10,731	3,605,476
Retail Sales (thousand megawatthours)	69,505	954	0	123	70,582
Percentage of Retail Sales	98.47	1.35	0	0.17	100
Revenue from Retail Sales (million dollars)	6,960	82	0	13	7,054
Percentage of Revenue	98.66	1.16	0	0.18	100
Average Revenue per Kilowatthour (cents/kWh)	10.01	8.55	0	10.3	9.99