

## SECTION 16

# Communications, Power, and Science

This section presents statistics relating to postal service, telephones, telegraphs, radio, television, newspapers, electrical and gas power and energy, and scientific resources.

Hawaii is served by all communications media. The most recent statistics indicate 80 post offices, 352,000 telephones, 28 radio stations, 12 television stations, and seven daily newspapers.

Electricity sales exceeded 3.4 billion kilowatt-hours in 1969, or 6,577 per housing unit. Domestic gas sales totalled 34 million therms.

The State is also well served with scientific resources. A 1969 inventory reported 265 companies and agencies with research or scientific capabilities. Employment in these organizations was more than 20,000.

Information on communications, power and science can be obtained from reports and records of the U.S. Post Office Department, Federal Communications Commission, Hawaii State Public Utilities Commission, individual utility companies, and Audit Bureau of Circulations. Similar data for the nation as a whole can be found in the *Statistical Abstract of the United States: 1969*, Sections 18, 19, and 20.

Table 99. -- COMMUNICATIONS: 1940 TO 1969

Subject	1940	1950	1960	1968	1969
Postal:					
Post offices, June 30 .....	95	97	83	80	(NA)
Postal receipts (\$1,000) .....	1,480	3,955	7,732	17,617	(NA)
Telephone service:					
Telephones in operation, Dec. 31	39,179	99,310	208,411	352,196	(NA)
Interisland calls .....	48,103	271,501	538,294	1,649,734	(NA)
Transpacific calls <sup>1</sup> .....	9,799	92,752	303,334	1,613,963	(NA)
Telegraph messages between Hawaii and Mainland .....	336,537	337,984	499,331	463,985	(NA)
Radio and television (Jan. 1):					
AM stations .....	3	8	15	25	24
FM stations .....	--	--	3	3	4
TV stations <sup>2</sup> .....	--	--	6	10	12
Newspaper circulation: <sup>3</sup>					
Honolulu .....	60,157	125,017	168,826	192,329	197,549
Hilo .....	4,674	9,848	9,884	11,645	12,483

NA Not available.

1. In and out, 1940 and 1950; out only, 1960 and thereafter.

2. Excludes unmanned satellite stations.

3. Average daily circulation of English language newspapers, for October 1940 and October-December, 1950 forward. Excludes Sunday editions.

Source: Hawaii State Department of Planning and Economic Development, Communications Statistics for Hawaii, 1964 (Statistical Report 19, May 31, 1964); Annual Report of the Postmaster General; Hawaiian Telephone Company, records; Federal Communications Commission, records; Audit Bureau of Circulations, reports.

Table 100. -- ELECTRICITY AND GAS SOLD, BY COUNTY: 1940 TO 1969

Subject	The State	City & Co. of Honolulu	Hawaii County	Maui County	Kauai County
Electricity sold (1,000 KWH):					
1940 .....	240,272	213,189	15,096	7,708	3,118
1950 .....	604,811	522,325	41,413	26,359	10,412
1960 .....	1,601,322	1,370,880	83,363	96,294	41,108
1968 .....	3,110,006	2,727,627	167,176	124,570	77,542
1969 .....	3,426,052	3,004,187	186,478	145,102	90,285
Average annual residential use (KWH): <sup>1</sup>					
1940 .....	(NA)	1,244	(NA)	(NA)	(NA)
1950 .....	2,388	2,645	1,770	1,743	1,009
1960 .....	4,330	4,803	3,084	3,485	1,724
1968 .....	6,322	6,799	4,591	4,863	4,070
1969 .....	6,577	7,085	4,845	5,013	4,256
Gas sold (1,000 therms): <sup>2</sup>					
1940 .....	(NA)	4,425	(NA)	(NA)	(NA)
1950 .....	(NA)	11,453	(NA)	(NA)	(NA)
1960 .....	18,977	16,538	1,331	447	361
1968 .....	31,146	26,041	2,639	1,398	1,068
1969 .....	34,315	28,546	2,975	1,623	1,171

NA Not available.

1. Based on number of customers at end of year.

2. Either manufactured or bottled.

Source: Hawaii State Department of Regulatory Agencies, Public Utilities Division.

Table 101. -- STATISTICAL SUMMARY OF SCIENTIFIC RESOURCES: 1969

Type of organization	Number reported	Employment		
		Total	Professional or technical	
Total companies and agencies . . . .	265	20,490	5,094	
Organizations with scientific capabilities . . . .	19	7,158	1,339	
Computer sciences . . . . .	27	1,351	637	
Research and development . . . . .	46	3,513	629	
Testing laboratories . . . . .	23	704	415	
Government research agencies . . . . .	101	7,183	1,882	
Federal civilian . . . . .	20	1,703	260	
Military . . . . .	12	806	150	
State, except U. H. . . . .	34	1,950	662	
University of Hawaii . . . . .	22	1,133	622	
County . . . . .	13	1,591	188	
Private research agencies . . . . .	29	581	192	
Type of organization	Number reported	Membership		Scientific books
		Regular	Associate	
Professional associations . . . .	43	10,226	545	--
Scientific libraries . . . . .	27	--	--	656,918

Source: Hawaii State Department of Planning and Economic Development, Hawaii's Scientific Resources, 1969-1970 Directory, Fourth Edition, p. 7.