CENTERS FOR DISEASE CONTROL

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MORBIDITY AND MORTALITY WEEKLY REPORT

Epidemiologic Notes and Reports

A Cluster of Kaposi's Sarcoma and *Pneumocystis carinii* Pneumonia among Homosexual Male Residents of Los Angeles and Orange Counties, California

In the period June 1, 1981-April 12, 1982, CDC received reports of 19 cases of biopsy-confirmed Kaposi's sarcoma (KS) and/or *Pneumocystis carinii* pneumonia (PCP) among previously healthy homosexual male residents of Los Angeles and Orange counties, California. Following an unconfirmed report of possible associations among cases in southern California, interviews were conducted with all 8 of the patients still living and with the close friends of 7 of the other 11 patients who had died.

Data on sexual partners were obtained for 13 patients, 8 with KS and 5 with PCP. For any patient to be considered as a sexual contact of another person, the reported exposures of that patient had to be either substantiated or not denied by the other person involved in the relationship (or by a close friend of that person).

Within 5 years of the onset of symptoms, 9 patients (6 with KS and 3 with PCP) had had sexual contact with other patients with KS or PCP. Seven patients from Los Angeles County had had sexual contact with other patients from Los Angeles County, and 2 from Orange County had had sexual contact with 1 patient who was not a resident of California. Four of the 9 patients had been exposed to more than 1 patient who had KS or PCP. Three of the 6 patients with KS developed their symptoms after sexual contact with persons who already had symptoms of KS. One of these 3 patients developed symptoms of KS 9 months after sexual contact, another patient developed symptoms 13 months after contact, and a third patient developed symptoms 22 months after contact.

Kaposi's Sarcoma — Continued

The other 4 patients in the group of 13 had no known sexual contact with reported cases. However, 1 patient with KS had an apparently healthy sexual partner in common with 2 persons with PCP; 1 patient with KS reported having had sexual contact with 2 friends of the non-Californian with KS; and 2 patients with PCP had most of their anonymous contacts (≥80%) with persons in bathhouses attended frequently by other persons in Los Angeles with KS or PCP.

The 9 patients from Los Angeles and Orange counties directly linked to other patients are part of an interconnected series of cases that may include 15 additional patients (11 with KS and 4 with PCP) from 8 other cities. The non-Californian with KS mentioned earlier is part of this series. In addition to having had sexual contact with 2 patients with KS from Orange County, this patient said he had sexual contact with 1 patient with KS and 1 patient with PCP from New York City and 2 of the 3 patients with PCP from Los Angeles County.

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Editorial Note: An estimated 185,000-415,000 homosexual males live in Los Angeles County.* Assuming that they had a median of 13.5 to 50 different sexual partners per year over the past 5 years,† the probability that 7 of 11 patients with KS or PCP would have sexual contact with any one of the other 16 reported patients in Los Angeles County would seem to be remote. The probability that 2 patients with KS living in different parts of Orange County would have sexual contact with the same non-Californian with KS would appear to be even lower. Thus, observations in Los Angeles and Orange counties imply the existence of an unexpected cluster of cases.

The cluster in Los Angeles and Orange counties was identified on the basis of sexual contact. One hypothesis consistent with the observations reported here is that infectious agents are being sexually transmitted among homosexually active males. Infectious agents not yet identified may cause the acquired cellular immuno-

*Estimates of the homosexual male population are derived from Kinsey *et al.*(*1*) who reported that 8% of adult males are exclusively homosexual and that 18% have at least as much homosexual as heterosexual experience for at least 3 years between the ages of 16 and 55 years; and the U. S. Bureau of the Census, which reported that approximately 2,304,000 males between the ages of 18 and 64 years lived in Los Angeles County in 1980.

†Estimates of sexual activity are derived from data collected by Jay and Young (*2*), indicating that 130 homosexual male respondents in Los Angeles had a median of 13.5 different sexual partners in 1976, and from CDC data showing that 13 patients with KS and/or PCP in the Los Angeles area tended to report having more sexual partners in the year before onset of symptoms (median=50) than did homosexual males surveyed by Jay and Young.

Kaposi's Sarcoma — Continued

deficiency that appears to underlie KS and/or PCP among homosexual males (*3-6*). If infectious agents cause these illnesses, sexual partners of patients may be at increased risk of developing KS and/or PCP.

Another hypothesis to be considered is that sexual contact with patients with KS or PCP does not lead directly to acquired cellular immunodeficiency, but simply indicates a certain style of life. The number of homosexually active males who share this lifestyle may be much smaller than the number of homosexual males in the general population.

Exposure to some substance (rather than an infectious agent) may eventually lead to immunodeficiency among a subset of the homosexual male population that shares a particular style of life. For example, Marmor et al. recently reported that exposure to amyl nitrite was associated with an increased risk of KS in New York City (*7*). Exposure to inhalant sexual stimulants, central-nervous-system stimulants, and a variety of other "street" drugs was common among males belonging to the cluster of cases of KS and PCP in Los Angeles and Orange counties.

References

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Current Trends

Impact of Diabetes Outpatient Education Program — Maine

Diabetes mellitus is an important cause of morbidity and mortality in the United States, affecting 2.4% (almost 6 million people) of the total population and resulting in a direct and indirect outlay of approximately 9.7 billion dollars/year(*1*). Maine has an estimated 27,000 diabetics, and in 1980 diabetes was the sole or a contributing cause for 788 deaths—7.3% of all deaths in the state that year. It is believed that the suffering and economic burden of this disease can be reduced by training persons

Diabetes – Continued

with diabetes extensively in proper self-care and that diabetes will eventually become a model for other chronic diseases in demonstrating the cost-effectiveness of preventive intervention.

An audit of the charts of 898 diabetic patients hospitalized in 1979 at 34 hospitals was conducted to determine the number of hospitalizations for diabetes control that could have been prevented if the patient had been better educated in self management of diabetes and to determine the number of patients whose hospital stay was extended solely for education concerning diabetes. A total of 16.5% of the admissions were found to have been caused by lack of knowledge of self-management skills, and 10.3% had their length of stay extended only for diabetes education. An additional 19.9% were readmissions within the year for the same or similar problems.

The Maine Diabetes Control Project (DCP) established educational sites throughout the state in 1980 to provide improved opportunities for diabetes education and to document the effect of intensive education on diabetes-related morbidity and its

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TABLE I. Summary – cases of specified notifiable diseases, United States

DISEASE	23rd WEEK ENDING			CUMULATIVE, FIRST 23 WEEKS		
	June 12 1982	June 13 1981	MEDIAN 1977-1981	June 12 1982	June 13 1981	MEDIAN 1977-1981
Aseptic meningitis	123	101	77	1,743	1,624	1,167
Brucellosis	11	5	1	64	60	75
Encephalitis: Primary (arthropod-borne & unspec.)	15	17	16	325	312	274
Post-infectious	5	1	7	33	43	90
Gonorrhea: Civilian	18,557	19,565	18,307	395,371	429,036	412,210
Military	597	674	674	11,752	12,826	11,965
Hepatitis: Type A	342	445	511	9,608	11,186	12,589
Type B	350	405	345	8,894	8,682	7,227
Non A, Non B	53	N	N	937	N	N
Unspecified	165	192	192	3,946	4,838	4,413
Legionellosis	4	N	N	172	N	N
Leprosy	2	2	3	84	100	76
Malaria	34	17	17	383	563	243
Measles (rubeola)	70	171	608	779	2,110	10,267
Meningococcal infections: Total	82	61	52	1,599	1,979	1,445
Civilian	82	59	52	1,593	1,971	1,430
Military	–	2	–	6	8	10
Mumps	75	176	279	3,471	2,528	9,071
Pertussis	13	25	19	457	456	473
Rubella(German measles)	84	52	337	1,503	1,380	8,852
Syphilis (Primary & Secondary): Civilian	501	640	394	14,274	13,218	10,576
Military	2	9	6	169	165	137
Tuberculosis	572	613	592	11,243	11,558	11,887
Tularemia	9	8	4	56	73	56
Typhoid fever	10	7	8	161	203	191
Typhus fever, tick-borne (RMSF)	60	68	52	245	346	223
Rabies, animal	110	176	103	2,692	3,366	2,107

TABLE II. Notifiable diseases of low frequency, United States

	CUM. 1982		CUM. 1982
Anthrax	–	Poliomyelitis: Total	2
Botulism (Kans. 1, Oreg. 3)	33	Paralytic (Iowa 1)	2
Cholera	–	Psittacosis (Minn. 1, Ala. 1, Tex. 1, Calif. 1)	51
Congenital rubella syndrome	5	Rabies, human	–
Diphtheria	–	Tetanus (Nebr. 1, Md. 1, Okla. 1)	32
Leptospirosis (Tex. 1)	28	Trichinosis (Ups N.Y. 1, N.J. 1, Calif. 1)	53
Plague	4	Typhus fever, flea-borne (endemic, murine) (Tex. 2)	11

N: Not notifiable

TABLE III. Cases of specified notifiable diseases, United States, weeks ending June 12, 1982 and June 13, 1981 (23rd week)

REPORTING AREA	ASEPTIC MENINGITIS	BRUCELLOSIS	ENCEPHALITIS		GONORRHEA (Civilian)		HEPATITIS (Viral), by type				LEGIONELLOSIS	LEPROSY
			Primary	Post-infectious			A	B	NA,NB	Unspecified		
	1982	CUM. 1982	CUM. 1982	CUM. 1982	CUM. 1982	CUM. 1981	1982	1982	1982	1982	1982	CUM. 1982
UNITED STATES	123	64	325	33	395,371	429,036	342	350	53	165	4	84
NEW ENGLAND	2	3	15	4	9,707	10,569	8	21	–	7	–	1
Maine	–	–	–	–	443	536	–	1	–	–	–	–
N.H.	1	–	–	–	289	364	–	–	–	–	–	–
Vt.	1	–	–	–	196	186	–	–	–	–	–	–
Mass.	–	–	5	–	4,526	4,333	3	10	–	6	–	–
R.I.	–	–	–	–	661	524	3	1	–	–	–	–
Conn.	–	3	10	4	3,592	4,626	2	9	–	1	–	1
MID. ATLANTIC	20	–	46	9	49,780	50,302	29	43	7	20	3	4
Upstate N.Y.	18	–	17	3	8,026	8,346	4	8	3	4	–	1
N.Y. City	1	–	9	–	21,083	20,554	9	3	–	3	–	1
N.J.	–	–	10	–	8,884	9,840	16	32	4	13	1	1
Pa.	1	–	10	6	11,787	11,562	U	U	U	U	2	1
E.N. CENTRAL	10	–	66	6	53,131	67,333	41	33	2	13	–	2
Ohio	2	–	21	4	16,317	23,262	21	13	2	3	–	–
Ind.	2	–	15	2	6,416	6,241	7	8	–	8	–	–
Ill.	–	–	–	–	11,335	18,258	1	–	–	–	–	2
Mich.	5	–	28	–	13,706	13,857	7	10	–	2	–	–
Wis.	1	–	2	–	5,357	5,715	5	2	–	–	–	–
W.N. CENTRAL	2	6	17	3	19,125	20,111	8	9	2	1	–	1
Minn.	–	–	2	1	2,849	3,280	2	1	–	–	–	–
Iowa	2	1	9	1	2,059	2,070	1	2	–	–	–	–
Mo.	–	2	4	–	8,768	9,080	4	3	1	1	–	1
N. Dak.	–	–	–	–	267	288	–	1	–	–	–	–
S. Dak.	–	1	–	1	538	571	–	–	–	–	–	–
Nebr.	–	–	1	–	1,223	1,584	–	1	–	–	–	–
Kans.	–	2	1	–	3,421	3,238	1	1	1	–	–	–
S. ATLANTIC	26	15	49	6	95,506	105,368	51	77	11	15	–	5
Del.	–	–	–	–	1,620	1,589	–	5	–	–	–	–
Md.	–	–	11	–	13,302	11,608	5	13	1	2	–	2
D.C.	–	–	–	–	5,604	6,660	2	3	–	–	–	–
Va.	1	6	11	1	9,066	9,592	2	5	–	–	–	1
W. Va.	–	–	–	–	1,184	1,592	1	–	–	–	–	–
N.C.	3	–	4	1	16,730	16,430	9	13	–	4	–	–
S.C.	1	2	–	–	10,060	9,883	6	5	1	2	–	–
Ga.	3	1	–	–	9,483	21,378	4	12	1	–	–	–
Fla.	18	6	23	4	28,457	26,636	22	21	8	7	–	2
E.S. CENTRAL	1	7	18	1	34,715	35,470	15	14	3	1	–	–
Ky.	–	–	–	–	4,647	4,461	2	2	1	–	–	–
Tenn.	–	4	10	–	13,245	13,285	5	4	1	–	–	–
Ala.	1	2	5	1	10,670	11,158	1	4	1	1	–	–
Miss.	–	1	3	–	6,153	6,566	7	4	–	–	–	–
W.S. CENTRAL	16	18	34	–	57,577	56,418	58	47	2	51	1	9
Ark.	–	4	1	–	4,755	3,882	2	3	1	2	–	–
La.	4	2	4	–	10,482	9,273	16	11	–	4	–	–
Okla.	4	3	10	–	6,187	5,997	5	12	1	5	1	–
Tex.	8	9	19	–	36,153	37,266	35	21	–	40	–	9
MOUNTAIN	5	–	17	1	14,353	16,824	47	7	4	14	–	2
Mont.	1	–	–	–	597	577	1	2	–	–	–	–
Idaho	–	–	–	–	674	702	1	–	–	–	–	1
Wyo.	–	–	–	–	408	387	1	–	–	2	–	–
Colo.	3	–	7	1	3,792	4,549	4	1	1	–	–	–
N. Mex.	–	–	–	–	1,771	1,837	13	1	2	4	–	–
Ariz.	1	–	6	–	3,951	5,247	17	3	–	6	–	–
Utah	–	–	–	–	656	803	6	–	–	–	–	1
Nev.	–	–	4	–	2,504	2,722	4	–	1	2	–	–
PACIFIC	41	15	63	3	61,477	66,641	85	99	22	43	–	60
Wash.	1	–	6	–	5,054	5,676	7	5	5	4	–	6
Oreg.	–	–	1	–	3,404	4,282	12	8	3	–	–	–
Calif.	34	14	52	3	50,380	53,681	65	86	14	38	–	34
Alaska	1	1	3	–	1,556	1,694	–	–	–	–	–	1
Hawaii	5	–	1	–	1,083	1,308	1	–	–	1	–	19
Guam	U	–	–	–	33	63	U	U	U	U	U	–
P.R.	3	–	1	–	1,295	1,475	6	2	–	5	–	–
V.I.	–	–	–	–	72	72	–	–	–	–	–	–
Pac. Trust Terr.	U	–	–	–	36	188	U	U	U	U	U	1

N: Not notifiable U: Unavailable

TABLE III (Cont.'d). Cases of specified notifiable diseases, United States, weeks ending June 12, 1982 and June 13, 1981 (23rd week)

REPORTING AREA	MALARIA		MEASLES (RUBEOLA)			MENINGOCOCCAL INFECTIONS (Total)		MUMPS		PERTUSSIS	RUBELLA		
	1982	CUM. 1982	1982	CUM. 1982	CUM. 1981	1982	CUM. 1982	1982	CUM. 1982	1982	1982	CUM. 1982	CUM. 1981
UNITED STATES	34	383	70	779	2,110	82	1,599	75	3,471	13	84	1,503	1,380
NEW ENGLAND	–	21	–	8	72	1	85	1	143	–	2	14	101
Maine	–	–	–	–	5	–	3	–	32	–	–	–	33
N.H.	–	–	–	1	6	1	12	–	12	–	–	8	42
Vt.	–	–	–	2	2	–	4	–	5	–	–	–	–
Mass.	–	16	–	2	51	–	22	–	70	–	2	3	16
R.I.	–	1	–	–	–	–	11	1	12	–	–	1	–
Conn.	–	4	–	3	8	–	33	–	12	–	–	2	10
MID. ATLANTIC	10	51	21	116	688	34	291	4	220	4	3	76	163
Upstate N.Y.	4	14	19	85	187	29	93	2	42	4	3	37	68
N.Y. City	–	15	2	23	48	–	50	–	34	–	–	26	44
N.J.	4	15	–	4	49	–	53	1	32	–	–	13	43
Pa.	2	7	–	4	404	5	95	1	112	–	–	–	8
E.N. CENTRAL	1	25	10	43	72	7	191	40	1,965	8	7	135	294
Ohio	–	7	–	–	15	–	76	13	1,455	8	–	–	–
Ind.	–	1	–	2	8	2	17	3	33	–	4	24	98
Ill.	–	3	1	16	21	2	48	7	137	–	–	49	68
Mich.	1	12	9	25	27	3	39	13	265	–	–	42	31
Wis.	–	2	–	–	1	–	11	4	75	–	3	20	97
W.N. CENTRAL	1	10	–	31	6	3	68	1	394	–	–	54	72
Minn.	–	–	–	–	2	1	14	–	280	–	–	5	7
Iowa	1	4	–	–	1	–	5	1	29	–	–	–	3
Mo.	–	3	–	2	1	–	20	–	13	–	–	38	2
N. Dak.	–	–	–	–	–	1	6	–	–	–	–	–	–
S. Dak.	–	–	–	–	–	–	3	–	1	–	–	1	–
Nebr.	–	2	–	–	1	1	9	–	–	–	–	–	1
Kans.	–	1	–	29	1	–	11	–	71	–	–	10	59
S. ATLANTIC	3	56	–	32	311	9	321	4	201	–	5	57	109
Del.	–	–	–	–	–	–	–	1	6	–	–	1	1
Md.	–	7	–	2	1	–	20	2	20	–	5	31	1
D.C.	–	3	–	1	1	–	2	–	–	–	–	–	–
Va.	1	22	–	14	6	1	34	–	30	–	–	8	3
W. Va.	–	2	–	1	7	–	7	–	80	–	–	1	19
N.C.	–	–	–	–	3	4	63	1	9	–	–	1	4
S.C.	–	3	–	–	–	1	38	–	11	–	–	1	7
Ga.	–	8	–	–	99	2	67	–	8	–	–	4	29
Fla.	2	11	–	14	194	1	90	–	37	–	–	10	45
E.S. CENTRAL	–	5	–	6	–	10	108	1	28	–	1	37	22
Ky.	–	4	–	1	–	4	18	–	9	–	1	21	13
Tenn.	–	–	–	4	–	2	41	–	11	–	–	–	8
Ala.	–	–	–	–	–	4	43	1	5	–	–	–	1
Miss.	–	1	–	1	–	–	6	–	3	–	–	16	–
W.S. CENTRAL	2	29	2	22	666	–	188	9	134	–	3	78	108
Ark.	–	3	–	–	1	–	11	–	6	–	–	–	2
La.	–	3	–	–	–	–	34	–	3	–	–	–	9
Okla.	–	3	–	–	5	–	16	–	–	–	–	3	–
Tex.	2	20	2	22	660	–	127	9	125	–	3	75	97
MOUNTAIN	1	9	5	5	28	–	80	–	52	1	3	49	67
Mont.	–	–	–	–	–	–	4	–	3	–	–	4	3
Idaho	–	–	–	–	1	–	6	–	3	1	–	–	2
Wyo.	–	–	–	–	–	–	4	–	2	–	–	5	1
Colo.	1	5	5	5	5	–	31	–	8	–	–	4	29
N. Mex.	–	2	–	–	8	–	11	–	–	–	–	4	5
Ariz.	–	1	–	–	4	–	14	–	23	–	–	7	17
Utah	–	1	–	–	–	–	7	–	11	–	3	16	3
Nev.	–	–	–	–	10	–	3	–	2	–	–	9	7
PACIFIC	16	177	32	516	267	18	267	15	334	–	60	1,003	444
Wash.	2	10	–	24	1	2	29	2	57	–	6	30	49
Oreg.	–	5	–	–	3	4	55	–	–	–	–	3	48
Calif.	14	160	32	488	261	12	171	13	265	–	54	962	342
Alaska	–	–	–	1	–	–	9	–	6	–	–	1	–
Hawaii	–	2	–	3	2	–	3	–	6	–	–	7	5
Guam	U	1	U	–	6	U	1	U	1	U	U	1	1
P.R.	–	4	1	63	193	–	5	2	39	–	–	4	3
V.I.	–	–	–	–	6	–	–	–	–	–	–	–	–
Pac. Trust Terr.	U	–	U	–	–	U	–	U	–	U	U	–	1

U: Unavailable

TABLE III (Cont.'d). Cases of specified notifiable diseases, United States, weeks ending June 12, 1982 and June 13, 1981 (23rd week)

REPORTING AREA	SYPHILIS (Civilian) (Primary & Secondary)		TUBERCULOSIS		TULAREMIA	TYPHOID FEVER		TYPHUS FEVER (Tick-borne) (RMSF)		RABIES, Animal
	CUM. 1982	CUM. 1981	1982	CUM. 1982	CUM. 1982	1982	CUM. 1982	1982	CUM. 1982	CUM. 1982
UNITED STATES	14,274	13,218	572	11,243	56	10	161	60	245	2,692
NEW ENGLAND	248	288	13	301	-	-	11	1	2	20
Maine	1	1	-	23	-	-	-	-	-	19
N.H.	-	12	-	10	-	-	-	-	-	-
Vt.	1	13	-	7	-	-	2	-	-	-
Mass.	173	184	12	203	-	-	8	1	1	-
R.I.	12	16	-	11	-	-	-	-	1	-
Conn.	61	62	1	47	-	-	1	-	-	1
MID. ATLANTIC	1,952	1,973	75	1,867	6	-	24	3	6	63
Upstate N.Y.	207	175	-	318	6	-	2	-	-	35
N.Y. City	1,173	1,202	22	690	-	-	17	-	-	-
N.J.	249	262	11	372	-	-	3	3	5	1
Pa.	323	334	42	487	-	-	2	-	1	27
E.N. CENTRAL	724	936	74	1,694	-	1	14	5	23	300
Ohio	136	119	13	285	-	-	6	5	22	47
Ind.	93	98	19	224	-	-	-	-	-	43
Ill.	317	511	29	671	-	-	3	-	1	141
Mich.	128	162	13	424	-	1	5	-	-	2
Wis.	50	46	-	90	-	-	-	-	-	67
W.N. CENTRAL	282	264	13	339	8	2	6	-	4	591
Minn.	54	95	4	57	-	2	3	-	-	91
Iowa	14	13	2	45	1	-	1	-	-	183
Mo.	170	131	6	155	5	-	1	-	2	61
N. Dak.	4	6	-	6	-	-	-	-	-	56
S. Dak.	-	2	-	13	-	-	-	-	-	47
Nebr.	8	3	-	15	-	-	-	-	-	72
Kans.	32	14	1	48	2	-	1	-	2	81
S. ATLANTIC	3,957	3,483	135	2,301	7	1	23	37	140	432
Del.	8	7	-	25	-	-	-	-	-	-
Md.	224	275	19	278	1	-	6	3	18	21
D.C.	243	296	9	92	-	-	-	-	-	-
Va.	278	326	21	263	1	-	2	1	12	212
W. Va.	14	9	2	69	-	-	2	-	3	20
N.C.	278	266	28	366	-	-	-	14	61	25
S.C.	195	241	17	234	4	1	3	11	35	25
Ga.	815	890	-	327	-	-	-	7	10	97
Fla.	1,902	1,173	39	647	1	-	10	1	1	32
E.S. CENTRAL	1,002	870	71	1,042	6	-	11	1	12	336
Ky.	56	43	14	271	-	-	-	-	-	65
Tenn.	269	349	24	347	4	-	2	1	7	222
Ala.	353	233	21	296	-	-	7	-	3	49
Miss.	324	245	12	128	2	-	2	-	2	-
W.S. CENTRAL	3,638	3,177	91	1,319	21	1	13	13	54	561
Ark.	94	63	6	123	13	-	1	1	7	75
La.	792	734	10	233	1	-	-	-	-	16
Okla.	77	79	22	194	7	-	2	7	27	110
Tex.	2,675	2,301	53	769	-	1	10	5	20	360
MOUNTAIN	360	322	14	328	4	-	6	-	3	89
Mont.	3	8	-	25	-	-	-	-	-	36
Idaho	18	8	-	13	1	-	-	-	1	1
Wyo.	10	5	-	2	1	-	-	-	1	5
Colo.	101	102	3	42	-	-	2	-	-	8
N. Mex.	76	67	-	60	-	-	-	-	1	10
Ariz.	87	69	8	133	-	-	3	-	-	26
Utah	11	11	2	17	2	-	1	-	-	1
Nev.	54	52	1	36	-	-	-	-	-	2
PACIFIC	2,111	1,905	86	2,052	4	5	53	-	1	300
Wash.	69	66	8	120	1	1	3	-	-	-
Oreg.	58	43	-	75	-	-	1	-	-	-
Calif.	1,920	1,754	75	1,668	3	4	48	-	1	231
Alaska	7	6	-	32	-	-	-	-	-	69
Hawaii	57	36	3	157	-	-	1	-	-	-
Guam	1	-	U	2	-	U	-	U	-	-
P.R.	273	308	-	140	-	-	1	-	-	24
V.I.	4	4	-	1	-	-	-	-	-	-
Pac. Trust Terr.	-	-	U	19	-	U	-	U	-	-

U: Unavailable

TABLE IV. Deaths in 121 U.S. cities,* week ending June 12, 1982 (23rd week)

REPORTING AREA	ALL CAUSES, BY AGE (YEARS)						P&I** TOTAL
	ALL AGES	≥65	45-64	25-44	1-24	<1	
NEW ENGLAND	597	401	144	25	7	20	50
Boston, Mass.	178	113	45	9	1	10	25
Bridgeport, Conn.	37	28	7	2	–	–	3
Cambridge, Mass.	21	17	4	–	–	–	2
Fall River, Mass.	34	26	8	–	–	–	–
Hartford, Conn.	39	27	9	2	1	–	–
Lowell, Mass.	22	16	6	–	–	–	1
Lynn, Mass.	23	16	6	1	–	–	1
New Bedford, Mass.	26	20	5	–	–	1	2
New Haven, Conn.	43	22	15	2	2	2	1
Providence, R.I.	55	31	17	2	1	4	8
Somerville, Mass.	7	6	–	1	–	–	–
Springfield, Mass.	39	29	7	–	1	2	1
Waterbury, Conn.	28	22	3	2	1	–	1
Worcester, Mass.	45	28	12	4	–	1	5
MID. ATLANTIC	2,380	1,553	543	158	70	56	66
Albany, N.Y.	59	41	8	4	3	3	1
Allentown, Pa.	20	16	4	–	–	–	–
Buffalo, N.Y.	107	63	31	8	3	2	7
Camden, N.J.	44	21	18	2	1	2	1
Elizabeth, N.J.	20	17	2	1	–	–	–
Erie, Pa.†	50	32	14	2	–	2	1
Jersey City, N.J.	41	33	4	2	1	1	1
N.Y. City, N.Y.	1,232	790	285	94	40	23	29
Newark, N.J.	61	29	18	5	3	6	4
Paterson, N.J.	27	17	3	–	3	4	2
Philadelphia, Pa.†	307	196	71	25	6	9	8
Pittsburgh, Pa.†	61	39	20	–	1	1	–
Reading, Pa.	28	23	2	2	1	–	1
Rochester, N.Y.	115	80	25	5	5	–	3
Schenectady, N.Y.	14	11	1	2	–	–	1
Scranton, Pa.†	22	20	2	–	–	–	2
Syracuse, N.Y.	98	70	21	2	2	3	1
Trenton, N.J.	25	18	5	1	1	–	–
Utica, N.Y.	26	20	4	2	–	–	1
Yonkers, N.Y.	23	17	5	1	–	–	3
E.N. CENTRAL	2,330	1,433	583	153	79	82	65
Akron, Ohio	70	38	23	3	4	2	–
Canton, Ohio	33	24	6	1	1	1	2
Chicago, Ill.	522	313	125	39	21	24	13
Cincinnati, Ohio	137	85	38	7	3	4	7
Cleveland, Ohio	179	105	45	16	7	6	3
Columbus, Ohio	180	108	46	7	10	9	1
Dayton, Ohio	118	69	34	6	4	5	2
Detroit, Mich.	263	151	72	22	8	10	13
Evansville, Ind.	48	36	10	2	–	–	3
Fort Wayne, Ind.	60	35	15	5	2	3	6
Gary, Ind.	22	15	2	3	1	1	–
Grand Rapids, Mich.	59	37	14	3	2	3	1
Indianapolis, Ind.	174	103	41	16	6	8	3
Madison, Wis.	38	25	7	5	1	–	1
Milwaukee, Wis.	138	94	36	6	2	–	–
Peoria, Ill.	36	24	8	1	–	3	5
Rockford, Ill.	45	29	8	3	5	–	1
South Bend, Ind.	49	34	11	3	1	–	2
Toledo, Ohio	92	63	25	2	1	1	2
Youngstown, Ohio	67	45	17	3	–	2	–
W.N. CENTRAL	729	488	149	37	19	36	31
Des Moines, Iowa	53	38	8	2	2	3	–
Duluth, Minn.	39	31	6	–	–	2	3
Kansas City, Kans.	32	21	6	3	2	–	1
Kansas City, Mo.	99	60	27	5	–	7	5
Lincoln, Nebr.	41	27	10	2	–	2	1
Minneapolis, Minn.	89	62	14	4	4	5	2
Omaha, Nebr.	90	54	22	5	2	7	3
St. Louis, Mo.	159	107	32	11	7	2	10
St. Paul, Minn.	60	46	10	1	–	3	1
Wichita, Kans.	67	42	14	4	2	5	5

REPORTING AREA	ALL CAUSES, BY AGE (YEARS)						P&I** TOTAL
	ALL AGES	≥65	45-64	25-44	1-24	<1	
S. ATLANTIC	1,238	757	287	78	51	65	29
Atlanta, Ga.	116	73	28	13	1	1	1
Baltimore, Md.	248	149	56	15	14	14	4
Charlotte, N.C.	51	35	9	3	1	3	2
Jacksonville, Fla.	110	54	36	7	10	3	3
Miami, Fla.	78	51	15	4	2	6	1
Norfolk, Va.	50	32	10	3	2	3	1
Richmond, Va.	87	50	24	7	2	4	5
Savannah, Ga.	31	14	7	6	3	1	1
St. Petersburg, Fla.	112	94	14	1	1	2	2
Tampa, Fla.	93	62	21	2	5	3	3
Washington, D.C.	200	107	54	14	4	21	5
Wilmington, Del.	62	36	13	3	6	4	1
E.S. CENTRAL	707	435	162	47	31	32	26
Birmingham, Ala.	125	76	29	11	5	4	–
Chattanooga, Tenn.	66	40	15	6	4	1	4
Knoxville, Tenn.	30	19	8	2	–	1	1
Louisville, Ky.	103	59	25	7	6	6	7
Memphis, Tenn.	177	119	37	9	7	5	7
Mobile, Ala.	49	27	4	3	5	10	–
Montgomery, Ala.	52	31	13	5	1	2	1
Nashville, Tenn.	105	64	31	4	3	3	6
W.S. CENTRAL	1,260	770	302	105	53	30	29
Austin, Tex.	53	33	14	4	2	–	–
Baton Rouge, La.	73	48	14	6	5	–	1
Corpus Christi, Tex.	40	25	4	4	4	3	1
Dallas, Tex.	175	98	45	22	7	3	4
El Paso, Tex.	50	29	15	4	1	1	1
Fort Worth, Tex.	110	75	18	7	5	5	4
Houston, Tex.	252	127	75	37	11	2	3
Little Rock, Ark.	77	40	25	4	3	5	2
New Orleans, La.	107	66	26	4	8	3	3
San Antonio, Tex.	168	121	31	5	4	7	2
Shreveport, La.	46	32	12	1	1	–	2
Tulsa, Okla.	109	76	23	7	2	1	6
MOUNTAIN	706	422	163	52	32	37	29
Albuquerque, N.Mex.	106	55	30	16	3	2	2
Colo. Springs, Colo.	37	21	4	6	4	2	2
Denver, Colo.	137	85	24	7	7	14	2
Las Vegas, Nev.	96	50	27	8	8	3	5
Ogden, Utah	25	20	4	–	–	1	2
Phoenix, Ariz.	134	71	40	10	4	9	1
Pueblo, Colo.	19	13	4	–	2	–	1
Salt Lake City, Utah	48	28	10	2	2	6	3
Tucson, Ariz.	104	79	20	3	2	–	11
PACIFIC	1,729	1,131	389	116	43	50	100
Berkeley, Calif.	18	17	1	–	–	–	–
Fresno, Calif.	70	40	19	4	4	3	3
Glendale, Calif.	18	17	1	–	–	–	–
Honolulu, Hawaii	46	29	14	2	1	–	–
Long Beach, Calif.	93	62	23	4	2	2	–
Los Angeles, Calif.	420	273	97	26	12	12	20
Oakland, Calif.	86	55	22	6	1	2	4
Pasadena, Calif.	26	18	8	–	–	–	4
Portland, Oreg.	134	94	26	7	2	5	9
Sacramento, Calif.	68	39	22	2	3	2	3
San Diego, Calif.	185	113	38	17	6	11	24
San Francisco, Calif.	148	94	30	21	–	3	8
San Jose, Calif.	156	100	37	12	5	2	14
Seattle, Wash.	163	104	35	13	6	5	4
Spokane, Wash.	65	50	11	1	1	2	6
Tacoma, Wash.	33	26	5	1	–	1	1
TOTAL	11,676††	7,390	2,722	771	385	408	425

*Mortality data in this table are voluntarily reported from 121 cities in the United States, most of which have populations of 100,000 or more. A death is reported by the place of its occurrence and by the week that the death certificate was filed. Fetal deaths are not included.

**Pneumonia and influenza

†Because of changes in reporting methods in these 4 Pennsylvania cities, these numbers are partial counts for the current week. Complete counts will be available in 4 to 6 weeks.

††Total includes unknown ages.

Diabetes – Continued

resultant costs. Diabetics were referred to the program by physicians to receive training in self monitoring, insulin regulation, nutrition education, foot care, and other pertinent topics. Each diabetic referred to the classes participated in a preassessment interview. Self-reported information collected from 533 diabetics at 26 of the education sites in 1980 revealed the following:

a) 59% of the participants were female, average age 57 years
b) The males averaged 53 years of age
c) 78% of all participants were ≥45 years of age
d) 53% had a high school education or better
e) The average duration of diabetes was 6.5 years
f) 45% were managed with insulin
g) 58% were ≥20% over ideal body weight (*2*)
h) 43% had not had an eye examination in the past year
i) 50% had "hypertension"
j) Of the 97 participants hospitalized for diabetes in the past year, 19% had been hospitalized at least once for diabetic ketoacidosis/coma

Although a controlled population was not available for comparison, a 12-month follow-up of the health status and hospitalization patterns was available for 461 diabetics who had completed the course. A total of 96 (33%) fewer hospitalizations occurred in the year following education than in the year preceding the training program (287 hospitalizations before training versus 191 after training). Using average-length-of-stay data from Maine's 100% hospital discharge data base and average cost data, cost savings were estimated to be $203,791 for 941 fewer hospital days among diabetics participating in the education program. The cost of educating the 461 diabetics was approximately $69,150. Thus, the estimated net savings was $134,641 or $292 per participant.

For a 3-year experimental period, Blue Cross and Blue Shield of Maine and Medicare and Medicaid have agreed to reimburse the hospitals and rural health centers that provide the education program. This training costs the third-party payers an average of $150/patient, less than the cost of 1 hospital day.

The Maine DCP has also established a surveillance system using the 100% hospital discharge file to identify morbidity caused by diabetes and Maine vital statistics to identify mortality caused by diabetes. This system will provide baseline data dating back to 1975 and will allow the impact of the education program to be monitored.

Reported by W Nersesian, MD, M Zaremba and a Diabetes Public Health Advisor, Dept of Human Svcs, Augusta, Maine; B Willhoite, MA, Medical Care Development, Inc., Augusta, Maine; Technical Services Section, Diabetes Control Activity, Center for Prevention Svcs, CDC.

Editorial Note: Maine is one of 20 states under cooperative agreement with CDC to conduct diabetes-control demonstration activities. Because self-reported questionnaires administered at specific intervals after educational interventions are commonly used to collect data for evaluation, it is important that individual health-status

Diabetes – Continued

and health-care-utilization data be verified for reliability and validity. Maine and CDC are working together to corroborate the original information from patient interviews with hospital insurance claims information. The Maine program appears to be reaching a high-risk population, because the pre-program hospitalization rate of participants was 6,225/10,000 diabetics/year compared with the estimated rate for all diabetics in Maine of 3,356/10,000 diabetics in 1980.

These preliminary results, if verified, strengthen reports from earlier studies (*3-5*) that substantial reductions in health-care utilization and costs can be achieved through more organized and intensive diabetes education activities. They also support the continuing role for public health in organizing these activities.

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Erratum, Vol. 31, No. 20

p265. In the article "National Surveillance of Cocaine Use and Related Health Consequences," the first sentence on page 268 should read: "For example, 64% of all cocaine-related emergencies reported to DAWN in 1980 were reported in combination with the use of other substances, including alcohol."—not 6% as printed. In the Editorial Note on page 273, the U.S. Pharamcopeia description of cocaine should read "white, odorless crystals."

Erratum, Vol. 31, No. 1S

p1S. In the Supplement "Prevention of Malaria in Travelers 1982," on page 12S, the Mexican state of Quintana Rao was erroneously listed as 2 separate states.

Erratum, Vol. 31, No. 22

p294. In the article "Update on Kaposi's Sarcoma and Opportunistic Infections in Previously Healthy Persons—United States," in Figure 2 on page 300, the horizontal axis was mistakenly labeled "Quarter" and numbered 1, 2, 3, and 4 for each year. Actually the subdivisions represent 4 different disease categories. Total cases for the full reporting year are shown in each category. The graph can be corrected by eliminating "Quarter" and the numbers.

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